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GENERAL INFORMATION

Saint Joseph's University, a private, comprehensive institution with a strong liberal arts core curriculum, founded by members of the Society of Jesus in 1851 and chartered by the Commonwealth of Pennsylvania in the following year, has been conducted ever since by the Jesuits as a Catholic educational institution in the Ignatian tradition.

The provisions of this catalog describe programs and policies of the College of Arts and Sciences, the Erivan K. Haub School of Business, the School of Education and Human Development, the School of Health Professions, and the School of Nursing and Allied Health within Saint Joseph's University as of time of publication. The University reserves the right to change any provision or requirement at any time.

Reservation of Rights

The Saint Joseph's University Academic Catalog serves as the source for information related to academic programs and requirements. The Catalog and its contents shall not be construed or regarded as a contract, express or implied, between the University and any other party or parties, including any prospective or enrolled student(s).

Saint Joseph's University reserves the right, in its sole discretion, to change its policies, procedures, and standards and this catalog at any time. This includes, but is not limited to, changes to course offerings, scheduling, course content, course modality, course location, fees, and graduation requirements.

Certain events beyond the University's reasonable control may arise. Such events include, but are not limited to, severe weather; natural disaster; acts of war or terrorism; and pandemic or other public health emergencies. Saint Joseph's University does not assume any, and hereby disclaims all, liability for delay or failure to provide, or suspension or modification of, educational services or access to its facilities if one or more such events occur.

If an event beyond the University's reasonable control occurs and in furtherance of its efforts to maintain the wellbeing of its community, Saint Joseph's University may modify or suspend its operations, in whole or in part. This includes, but is not limited to, changing the course modality or location of educational services offered (e.g., switching from physically present instruction on campus to fully online). Students remain responsible for all tuition, fees, or other charges regardless of the modality used to provide the educational services. The University is not obligated to issue refunds, discounts or credits for tuition, fees, or other charges in the event of any failure, modification or suspension of operations, but may elect to do so in its sole discretion and without further obligation.

Location

Hawk Hill Campus:

Situated on the western boundary of Philadelphia, Saint Joseph's one hundred and fourteen acre campus combines accessibility to the city with the proximity to the Main Line. In this urban-suburban environment, students share in the educational, cultural, and entertainment resources of a great metropolitan area. Students, faculty and staff alike enjoy the Philadelphia Orchestra, the Pennsylvania Ballet, the Philadelphia Museum of Art, the Barnes Foundation, the Pennsylvania Academy of Fine Arts, the Franklin Institute, the University Museum, the Free Library, theatre, world class dining and major league baseball, football, basketball, and hockey.

The city itself is at once a museum of American history and culture and a laboratory for contemporary economics, sociology, politics and religion.

University City Campus:

Saint Joseph's University City campus sits in the heart of West Philly, Philadelphia's innovation district—home to health science start-ups, established biotech firms and influential higher education institutions. The campus is home to our graduate and professional programs in Pharmacy and Pharmaceutical Sciences, and our Health Professions programs, in Occupational Therapy, Physical Therapy and Physician Assistant Studies. It is also the historic location of the Philadelphia College of Pharmacy, and houses some of our core research facilities in the Natural Sciences and Pharmaceutical Sciences.

Lancaster Campus:

Our Lancaster location is situated in the heart of picturesque Central Pennsylvania. Steeped in rich history, Lancaster is known for its beautiful 18th-century architecture and red-brick row homes that line its streets. Beyond its historic and cultural significance, Lancaster also offers art galleries, theaters, markets and a burgeoning farm-to-table culinary scene. In addition to its lively downtown area, Lancaster also offers a wide range of healthcare facilities including Penn Medicine Lancaster General Health, Penn State Health, Milton S. Hershey Medical Center, Lehigh Valley Hospital and more.

History

On the morning of September 15, 1851, some thirty young men gathered in the courtyard outside Saint Joseph's Church, located in Willing's Alley off Walnut and Fourth Streets and one block from Independence Hall. After attending High Mass and reciting the Veni Creator in the church, these young men were assigned to their classes in a building adjacent to the church. That September morning marked the beginning of a rich and exciting history for Saint Joseph's University.

As far back as 1741, a Jesuit College in Philadelphia had been proposed and planned by Rev. Joseph Greaton, S.J., the first resident pastor of Saint Joseph's Church. The suppression of the Jesuits (1773-1814) and lack of human and financial resources delayed for over a hundred years the realization of Fr. Greaton's plans for a college. Credit for founding the college is given to Rev. Felix Barbelin, S.J., who served as its first president. He, along with four other Jesuits, formed the first faculty of Saint Joseph's College. Before the end of the first academic year, the enrollment rose from fewer than forty to ninety-seven students. In the following year (1852), when the college received its charter of incorporation from the Commonwealth of Pennsylvania, the enrollment grew to 126 students.

In January, 1856, Saint Joseph's College moved to a more spacious site on the fashionable Filbert Street. Due to financial difficulties and the serious illness of the college's second president, the college returned to its Willing's Alley location in 1860. Shortly thereafter, the civil strife between the North and South became the first of many wars that would greatly diminish the college's enrollment. Through the Civil War and post-bellum years, Saint Joseph's College struggled to remain in existence.

With the purchase in 1866 of a city block between Seventeenth and Eighteenth Streets fronting on Stiles Street as a new site for the college, its future began to look brighter. Rev. Burchard Villiger, S.J., one of the original members of the college faculty, became its president in 1866. It was during his tenure that new college buildings, made possible largely

through a generous bequest from the estate of Francis Anthony Drexel, were constructed on the Stiles Street location.

A sporadic but continuing growth, both in student enrollment and academic excellence, is recorded for the new life of Saint Joseph's College from September 2, 1889, when the college moved from Willing's Alley to Stiles street, until 1927, when a still larger campus was judged necessary.

In November 1922, an ambitious building fund campaign to raise \$1,000,000 was organized by Rev. Matthew Fortier, S.J. His work in this difficult undertaking was successful and the pledges did exceed that goal, but the actual contributions did not. Subsequently, Saint Joseph's College was able to purchase twenty-three acres in a beautiful residential area at the western edge of the city. Construction of a handsome building in modern Collegiate Gothic architectural style was begun in November 1925. Its dedication took place on November 14, 1927. From that time to the present, the location of Saint Joseph's has been 54th and City Avenue.

During the Second World War, the college's enrollment was again greatly reduced. Following the war, aided by the "G.I. Bill of Rights," enrollment grew rapidly. In 1943, an Evening College was founded. It was also after the war that Saint Joseph's acquired several spacious homes adjacent to the campus, which were converted to its first residences for students.

Through the decade of the sixties, Saint Joseph's experienced unprecedented physical growth. Five more properties were added to the campus including the nine-acre estate of Margaret Gest, a Jesuit faculty residence, the Post classroom building, a science center, the Drexel Library building, a six-story student dormitory and expansion of the Student Center. All enhanced the modern facilities of the campus.

In the fall of 1970, the undergraduate day college opened its doors to women, bringing to an end its tradition as an all-male institution. Saint Joseph's was recognized as a university by the Secretary of Education of the Commonwealth of Pennsylvania on July 24, 1978. The corporate charter was formally changed to reflect university status on December 27, 1978. Shortly thereafter the University added a College of Business and Administration to complement the College of Arts and Sciences, and it also expanded graduate programs. At the same time, Saint Joseph's built a new Student/Sports Recreation Complex. The need for a larger library prompted the expansion of the University's Drexel Library into a Library/Learning Resources Center. The campus was enlarged to 49 acres with the purchase of Saint Mary's and Bronstein halls.

The last decade has marked an era of significant change in student enrollment; development of new undergraduate and graduate programs in all three colleges; integration of state-of-the-art technology of every kind, in the classroom and throughout the campus; upgrading of science laboratories; hiring of new faculty; and new campus construction.

Among the most important building projects undertaken are the following:

- the Chapel of St. Joseph;
- the McShain Student Residence and its footbridge traversing City Avenue and linking the city and suburban campuses;
- Mandeville Hall, home of the Erivan K. Haub School of Business;
- three large new student residence halls and a parking garage;
- and a new boathouse on Philadelphia's famed Kelly Drive.

In the summer of 2005, the University agreed to purchase the Merion campus of neighboring Episcopal Academy. The acquisition added 38

acres containing 52 classrooms, eight laboratories, 113 offices, and 14.5 acres of playing fields. Subsequent to the announcement of the agreement, alumnus James J. Maguire '58 donated \$10 million to help fund the purchase, and this section of the university is known as the Maguire Campus. Maguire's gift was later matched by a donation of the same amount by Brian Duperreault '69; the two donations are the largest alumni gifts in Saint Joseph's history.

In 2012, the University purchased the adjacent Cardinal's Residence on 54th and Cardinal Avenue from the Archdiocese of Philadelphia. The building now serves as the Welcome Center for Admissions.

In June of 2022, the university completed a comprehensive merger with the University of the Sciences, adding the School of Health Professions, including the Philadelphia College of Pharmacy. In January of 2024, the university completed its acquisition of the Pennsylvania College of Health Sciences, in Lancaster, PA, adding a School of Nursing & Allied Health, as well as a third campus location to its Hawk Hill and University City locations.

Mission Statement

As Philadelphia's Jesuit Catholic University, Saint Joseph's University provides a rigorous, student-centered education rooted in the liberal arts. We prepare students for personal excellence, professional success, and engaged citizenship. Striving to be an inclusive and diverse community that educates and cares for the whole person, we encourage and model lifelong commitment to thinking critically, making ethical decisions, pursuing social justice, and finding God in all things.

Colleges and Accreditation Colleges and Schools

The University is organized as follows:

The College of Arts and Sciences which offers the traditional undergraduate programs leading to the degrees of Bachelor of Arts and Bachelor of Science, a flexibly-structured Adult Learner program leading to a Bachelor of Liberal Studies, graduate programs leading to the degrees of Master of Arts and Master of Science, and Doctor of Philosophy programs

The Erivan K. Haub School of Business, which offers traditional undergraduate programs leading to the degree of Bachelor of Science in Business Administration, a flexibly-structured Adult Learner program leading to a bachelor degree or associate degree, and graduate programs leading to the degrees Master of Business Administration and Master of Science.

The School of Education and Human Development, which offers traditional undergraduate programs leading to the degree of Bachelor of Science, a flexibly-structured Adult Learner program leading to a Bachelor of Liberal Studies, and graduate programs leading to the degrees of Master of Science and Doctor of Education.

The School of Health Professions, which offers traditional undergraduate programs leading to the degree of Bachelor of Science, graduate programs leading to the Masters degrees and Doctoral degrees which include Doctor of Philosophy, Doctor of Pharmacy, Doctor of Occupational Therapy, and Doctor of Physical Therapy.

The School of Nursing and Allied Health, which offers a wide varies of undergraduate Certificate and Associate programs, Bachelor of Science

in Nursing, as well as a RN to BSN program, graduate programs leading to the Master of Science in Nursing-Nursing Practitioner and Post-Master's Certificate programs.

Accreditations, Approvals, and Memberships

Saint Joseph's University is approved by the Commonwealth of Pennsylvania Department of Education. It is accredited by the Middle States Commission on Higher Education:

Middle States Commission on Higher Education

1007 North Orange Street
4th Floor, MB #166
Wilmington, DE 19801
267-284-5000

The Middle States Commission on Higher Education is an institutional accrediting agency recognized by the U.S. Secretary of Education and the Council for Higher Education Accreditation. The Haub School of Business and its Accounting program are accredited by the AACSB—The Association to Advance Collegiate Schools of Business. The Chemistry Department is on the approved list of the American Chemical Society. The Teacher Education program was granted *Program Approved Status* by the Pennsylvania Department of Education and is recognized by the New Jersey Department of Education for issuance of certificates.

The University is also a member of the American Council on Education, the Association of Jesuit Colleges and Universities, the National Catholic Educational Association, the National Association of Independent Colleges and Universities, the Pennsylvania Association of Colleges and Universities, the American Library Association, the Association of Liberal Arts Colleges of Pennsylvania for the Advancement of Teaching, the American Association of Colleges for Teacher Education, and the Middle Atlantic Association of Colleges of Business Administration. The Haub School of Business is also a member of Beta Gamma Sigma, the honor society of business programs accredited by AACSB International.

Professional Licensure Disclosures

Federal regulations [34 CFR § 668.43(a)(5)(v)] require colleges and universities that offer programs designed to lead to professional licensure to disclose if those programs meet the educational requirements for licensure in the state where a student is located.

It is important to note that:

1. Each state has the legal authority to independently determine its requirements and processes for professional licensure;
2. The educational requirements necessary to pursue professional licensure in a given state are subject to change; and,
3. States often have other eligibility requirements, in addition to education, that must be satisfied in order to seek professional licensure.

For a full list of disclosures, please visit: <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>).

Naming Conventions Course Numbering System

In 2009 the university governance system approved a mandate that alters the course catalog numbering system. The new coding structure calls for the following general outline for course numbering:

- 100s: Courses that are designed primarily for but not limited to first-year students or that otherwise are the first undergraduate courses in a sequence in a field of study.
- 200s: Courses designed primarily for but not limited to sophomores.
- 300s: Courses designed primarily for but not limited to juniors.
- 400s: Courses designed primarily for but not limited to seniors.
- 500s: Lower-level graduate courses.
- 600s & 700s: Upper-level graduate courses.
- 800s: Courses open only to doctoral students.

Undergraduate Course Numbers

At the undergraduate level, the following types of course offerings are available across many disciplines and the numbers across from them classify each group appropriately:

Cooperative Education	488, 489 & 490
Internship	490, 491
Special Topics	170, 270, 370 or 470 (can be repeated for credit, topic will vary when offered)
Independent Research	493, 494
Lab Courses	Add an "L" to the end of the number of the course to which the lab corresponds wherever possible (e.g. CHM 101 & CHM 101L)
Capstone (only as required by some)	495
Transfer Courses without SJU equivalent	196 to 199, 296 to 299, 396 to 399, 496 to 499 (used for transfer articulation where course transferring in is not part of the SJU catalog of offerings)

Course numbers for remaining courses are left to the department's discretion. Some additional notes about certain undergraduate course types and offerings:

Independent Study: Special topic independent study courses can be offered using the Special Topics numbers outlined above. An independent study for an existing course can use the existing number. There is no need for special independent study numbers.

Graduate Coursework

Due to the large numbers of graduate catalog entries in certain areas of the university, it has been determined that graduate course numbers will follow this convention which is a modification of that approved by academic governance:

1. 500s: Lower-level graduate courses.
2. 600s & 700s: Upper-level graduate courses.

3. 800s: Courses open only to doctoral students.

Curriculum at the graduate level is typically divided along the lines of foundation, core, and major or specialization coursework. Some programs have a thesis/research course, some do not. Some programs have a capstone course, some do not. These items are defined as follows:

Foundation: that part of a graduate program that may be waived given a student's prior undergraduate or graduate education. Waivers are granted at the time of admission to a given program. Transfer credit is not awarded for Foundation courses. Foundation courses cover fundamental concepts to the specific discipline. Foundation courses are not counted in the minimum credits needed to graduate.

Core: that part of a graduate program required of all students pursuing the degree. Core courses provide additional depth beyond foundation work for fundamental concepts in the specific discipline.

Major/Specialization: that part of a graduate program that allows the development of expertise in a specific area of interest.

Thesis/Research: a course designed to **allow** the student to pursue independent research with a faculty member in a specific area of interest within the discipline. Often, it serves as a prelude to doctoral study.

Capstone: a course that serves as the culmination of the academic program, pulling together concepts from across the entire discipline.

At the graduate level, the following numbers are proposed to classify each group and selected other course types appropriately:

Foundation	500 to 549
Core	550 to 599
Major/Specialization	600 to 785
Special Topics	770
Internship	791 & 792
Thesis/Research	793 & 794
Capstone	795
Lab Courses	Add an "L" to the end of the number of the course to which the lab corresponds wherever possible (e.g. BIO 500L)
Transfer Courses without SJU equivalent	796 to 799 (graduate programs have transfer credit limitations; numbers are not used for regular SJU offerings)

Some additional notes about certain course types and offerings:

Independent Study: Special topic independent study courses can be offered using the Special Topics numbers outlined above. An independent study for an existing course can use the existing number. There is no need for special independent study numbers.

Graduation Requirement: Pennsylvania Department of Education regulations stipulate that a master's degree must be comprised of a minimum of 30 credits. Certain SJU programs have a minimum of more than 30. Commonly accepted academic protocol indicates that Foundation courses are not part of the announced minimum number of credits required to graduate. Foundation courses, if required, add to the student's number of credits required to graduate.

Section Naming Conventions

In order to readily identify different types of offerings, the following conventions be used when naming certain sections.

Section Type	Naming Convention	Example
Undergraduate Program	starts with D	D01, D02, etc.
Graduate and Doctoral Programs	starts with G	G01, G02, etc.
On-Line	starts with OL	OL1, OL2, etc.
Health Professional	starts with HP	HP1, HP2, etc.
Hybrid	starts with HY	HY1, HY2, etc.
Independent Study	starts with IS	IS1, IS2, etc.
Internship	starts with IN	IN1, IN2, etc.
Lancaster Campus	starts with L	L1, L2, etc.
Online Courses for Lancaster based students only	starts with LO	LO1, LO2, etc.
Honors	starts with HN	HN1, HN2, etc.
Service Learning	starts with SL	SL1, SL2, etc.
Co-op	starts with CO	CO1, CO2, etc.
Tutorial	starts with TU	TU1, TU2, etc.

N.B. -- Additional abbreviations will be made as the schedule develops and will be posted comprehensively on the Registrar's Office webpage (<https://www.sju.edu/offices/academic-admin/registrar/faculty-staff/course-scheduling-catalog-resources/scheduling/#section-naming-conventions>).

POLICIES AND PROCEDURES

Academic Policies

Students are expected to be familiar with the policies and regulations summarized in the Academic Catalog and with any supplementary or modified policies and regulations which may be promulgated during the academic year. More detailed information is available from faculty advisors, department chairs, or the offices of the Deans.

Notice of Non-Discrimination

Saint Joseph's University is committed to a policy of equal opportunity in every aspect of its operations. The University values diversity and seeks talented students, faculty, and staff from a variety of backgrounds. Accordingly, the University does not discriminate on the basis of sex/ gender, race, age of 40 or over, color, religion, national origin, ethnic origin, sexual orientation, gender identity, disability, genetic information, pregnancy, marital status, and military and military veteran status, and any other status protected by law in the administration of its admission, educational, financial aid, employment, athletic, or recreational policies or programs. Sexual harassment, sexual assault, dating and domestic violence, and stalking are considered forms of discrimination and are strictly prohibited by University policy.

To learn more about the University's policies regarding discrimination, the process for filing a report or formal complaint, and the University's response to reports and/or formal complaints, please visit the Office of Title IX & Equity Compliance's website (<https://www.sju.edu/offices/titleix-equity/>). Inquiries may also be directed to the Federal agency responsible for enforcing civil rights laws, the U.S. Department of Education Office for Civil Rights (<https://www2.ed.gov/about/offices/list/ocr/>). For more information, please contact:

The Director of the Office of Title IX & Equity Compliance

610-660-1145

titleix@sju.edu / bias@sju.edu

Campion 247 (Hawk Hill)

Annual Security & Fire Safety Reports

The University's Annual Security Report and Annual Fire Safety Report (<https://www.sju.edu/offices/student-life/public-safety/policies-reports/>) is available online on the Office of Public Safety & Security webpage. This report contains information about campus security policies, programs designed to prevent and respond to certain crimes, and specific statistics for certain criminal incidents, arrests, and disciplinary referrals. A paper copy is also available upon request to the Office of Public Safety & Security, 5600 City Avenue, Philadelphia, PA 19131 or by calling (610)-660-1111.

Definition of a Course

For the purpose of fulfilling curricular requirements, a course is any semester unit to which a value of one credit or more is assigned. A laboratory associated with a course, field experiences, etc. are not considered a separate course, even when it carries a separate course number and grade. Audit (non-credit) courses do not fulfill any requirements.

Syllabus

The instructor should provide a copy of the syllabus in advance or during the first class meeting of the course that includes the following:

- A detailed description of the course
- Course objectives, learning outcomes pertaining to assessment, and grading policies
- Required texts and other materials
- Sequence of topics or themes
- Assignments
- Frequency and nature of exams, quizzes, essays, projects, or other modes of evaluation
- Attendance policy
- University policy on academic honesty
- Policy for accommodations for students with disabilities
- Other policies of the discipline, unit, or institution pertinent to the class

Classification of Students

Matriculated Students

Students who have met all admission entrance requirements and are accepted with full standing into a degree program are classified as matriculated students.

Visiting Students

Undergraduate students who attend other colleges or universities and are in good academic standing may enroll in courses at Saint Joseph's University to transfer back to their respective home institution. A visiting student application and letter from the student's home institution indicating good academic standing are required. Visiting students who wish to take courses with prerequisites must submit official transcripts that include the necessary prerequisite. Under this classification, a visiting student may enroll in up to 12 credits.

Students in good standing in a graduate program at another accredited educational institution may take graduate courses on a visiting student basis if they provide a letter from the head of the graduate program of their degree-granting school stating that they are in good standing and that the institution will accept the course for credit. Visiting students must complete a graduate school application and pay the appropriate application fee.

Isolated Credit/Non Matriculated Students

Non-degree applicants may enroll in up to 12 credits prior to formally matriculating into a degree program. Under this classification, students are admitted to Saint Joseph's University, but not to a specific degree granting program. No financial aid is available. A formal application and academic transcripts are required prior to being admitted as an isolated credit student.

Graduate Non-Degree Credit Admission (Isolated Credit and Visiting Students)

Graduate non-degree applicants may enroll in graduate-level coursework for professional development, certification, and personal enrichment. Under this classification, students are admitted to Saint Joseph's University, but not to a specific degree-granting, graduate program. Non-degree or isolated credit applicants must complete the online graduate application process.

Non-degree students are not eligible to take graduate courses in all programs. Non-degree students should seek the permission of the Graduate Program Director in the department offering the course(s) before applying. A maximum of six credit hours (two courses) of coursework taken as a non-degree student may apply toward the credit requirement of the degree program.

Requests for degree credit for courses completed as a non-degree student are considered for admission to a graduate degree program. All non-degree coursework accepted for degree credit must be approved by the program director of the student's department.

Credit earned while enrolled in a graduate certificate program may be transferred into a degree program with the approval of the unit offering the degree program.

Adding and Dropping Courses

During the add/drop period, students may make changes to their schedule through the Nest. A student who drops a course from their schedule during the add/drop period will not have the course listed on their official record. After the add/drop period has ended, a student who does not wish to continue in a course must submit a request to withdraw from the course no later than the withdrawal deadline. Add/drop and withdrawal deadlines are listed on the Saint Joseph's University academic calendar. In no case will dropping or withdrawing from a course be permitted in contravention of penalties imposed through the University's Academic Honesty Policy. For more information on withdrawing from courses after the drop/add deadline, please see the Withdrawal from Courses policy for your level.

Cancellation of Courses

The University reserves the right to cancel a course for which there is insufficient enrollment. When such a cancellation becomes necessary, students will be notified in advance and given the choice of receiving a full refund or enrolling in another available course without penalty.

Attendance Policy

The course syllabus includes a clear statement on the attendance policy, specifying the maximum number of absences permitted in the course. If the course syllabus does not include an attendance policy, students may assume a policy of unlimited non-attendance. Absence from class does not release students from in-class work, quizzes, exams, presentations, group work, etc. Instructors with an unlimited non-attendance policy may not use unannounced examinations as a means of enforcing attendance. Students are responsible for the timely performance of all class assignments, including examinations. If students are required to be absent from class to participate in a University-sponsored activity, the director of the activity will provide written notice to the instructor in advance.

Change of Grade

Requests by teachers for changes in grade must be submitted to the Registrar in writing within thirty days after the last examination date of the semester. Regular semesters are considered to be the fall and spring semesters. Requests by teachers for changes in grade after this time must be submitted in writing to the appropriate Dean, with well-defined reasons for the change of grade. Only in exceptional circumstances will such changes be permitted.

Grade Replacement Policy

A student may only request grade replacement for a course for which they received a grade of C- or below for undergraduates, or B- or below for graduate students. Students should discuss and obtain approval from their academic advisor. When a student repeats a course, both the new and old grade will appear on the student's transcript. Credit toward graduation requirements will be counted only once.

Students who repeat a course may then apply for grade replacement using the appropriate form. Approval is granted by the relevant Dean's office based on the student's major program of study. If grade replacement is approved, both the new and old grade will appear on a student's transcript, but only the higher grade will be factored into the student's GPA and count for course credit. A student may not repeat the same course more than once using the grade replacement policy.

First year seminar courses may not be repeated. An undergraduate student may not replace a grade for more than four distinct courses total. Students in graduate programs may not replace a grade in more than two distinct courses total.

The second course typically must have the same course name and number as the course being replaced; dean's approval is required for a course to be replaced with a different course that fulfills the same GEP/CCC or program requirement (or, for a student who is changing major, a comparable requirement of the new major). Repeating a course by transfer of a comparable course from another institution requires dean's approval and is only allowed if there is no other way for the student to stay on track towards degree completion. Transfer credit is not calculated into a student's cumulative GPA (See Transfer Credit policy). Undergraduate and graduate programs and departments may impose additional restrictions on repeat courses and grade replacement due to accreditation and/or state licensure, state certification, or state registration requirements.

A student may not request grade replacement for a course in which an academic honesty violation was recorded.

Grade Reports

Grades are available to all students at the end of each semester via the web. Quarterly grades for freshmen are distributed through academic advisors; upper class students will be able to access their quarterly grades through the web. Quarterly grades are not recorded and are issued solely to advise students of their academic progress. "NG" (no grade) is not a permanent grade and is assigned in the infrequent instances when an instructor is late in returning grades or has not recorded a grade for a given student.

Transcripts

Students may obtain their official transcripts provided their financial obligations to Saint Joseph's University have been fulfilled. Official transcripts bear the signature of the Registrar and the seal of the University. Official transcripts are sent upon request of the student directly to other institutions or organizations. A fee is charged for official transcript orders, and they can be ordered online:

National Student Clearinghouse (<https://tsorder.studentclearinghouse.org/school/ficecode/00336700/>) (www.getmytranscript.com)

Courses Taken Elsewhere Policy

Matriculated students may be permitted to take courses for degree credit in other two or four-year colleges and institutions with written approval from their Dean. No more than 18 credits of the 120 credits required may be taken at another school and credited toward the degree unless an approved degree program provides otherwise. Additionally, students may not take courses that exceed the residence requirement of 60 credits, with the final 30 credits completed at Saint Joseph's University. Students engaged in study abroad or in an approved exchange program may be granted degree credit for a maximum of 30 credits with pre-approval from their Dean. Students on academic suspension from the University under the Academic Honesty Policy and students on temporary separation from the University may not receive credit for courses taken elsewhere during their time of academic suspension or temporary separation.

Credit Hour Definition

Saint Joseph's University follows the guideline set by the Pennsylvania Department of Education for determining the amount and level of credit awarded for courses, regardless of format or mode of delivery. These guidelines are in compliance with policies set forth by both the federal government and the Middle States Commission on Higher Education.

Saint Joseph's University follows a semester system with the fall and spring semesters consisting of approximately 15 weeks, which includes one week for exams. Summer terms are variable in length and adhere to this policy.

Implementation of Credit Hour Policy

Regardless of the format in which it is delivered, all courses taught at Saint Joseph's University require equivalent student-instructor and student-student interaction. The online modality achieves equivalent interaction and learning through asynchronous discussions and group work, and a number of online courses also incorporate some face-to-face meetings. In addition, the expectation exists for online courses to include the same content and learning outcomes as traditionally taught courses. To ensure equivalency, faculty develop the online structure and content following the policy of the Middle States Commission on Higher Education, Standard 11: Educational Offerings, "*The institution's educational offerings display academic content, rigor, and coherence appropriate to its higher education mission. The institution identifies student learning goals and objectives, including knowledge and skills, for its educational offerings.*" (Characteristics of Excellence [2006], p 10.)"

Nationally Accepted Standards for Credit Hours and Semester Length

Every Saint Joseph's course requires the equivalent of 50 minutes of instruction per week and a minimum of two hours of out-of-class student work, per credit hour, based on the Integrated Postsecondary Education Data System (IPEDS™) definition for credit hour, which states that a credit hour is a unit of measure representing the equivalent of an hour (50 minutes) of instruction per week over the entire term. The University also follows the semester system as defined by IPEDS: a calendar system that consists of two sessions called semesters during the academic year with about 15 weeks for each semester of instruction. There may be an additional summer session.

Practices to Determine Amount and Level of Credit

The faculty is responsible for the curriculum. Credit values for courses are determined at the department level based on faculty expertise and course objectives. Upon departmental approval the course is entered into the online curriculum action system and undergoes additional evaluation as it moves through the course approval system. All curriculum and review/approval committees and bodies of Saint Joseph's University

are charged with following the policy on credit hours in their review and approval of all courses and for certifying that the expected student learning for the course meets the credit hour standard. Initial review is done within the colleges, and final review and approval is the function of the University Council. Approved courses are sent to the Registrar's Office for inclusion in the University Catalog. The Registrar's Office reviews the class schedules prior to the start of each semester to ensure that all classes are scheduled for the minimum number of minutes. Any discrepancies are brought to the attention of the appropriate department for correction.

Credit Hour Standard by Instructional Method

Lecture and Seminar : courses with multiple students that meet to engage in various forms of group instruction under the direct supervision of a University faculty member. A typical 3 hour course will meet 2100 minutes over 14 weeks.

Laboratory and Studio: courses with a focus on experimental learning under the direct supervision of a University faculty member wherein the student performs substantive work in a laboratory or studio setting. The minimum contact time per credit is twice that of a lecture (2:1 ratio)

Independent Study: courses of study in which a University faculty member regularly interacts and directs student outcomes with periodic contact. Minimum credit hours are determined based on lecture contact minutes with the face-to-face meetings and student work being equivalent to the values found in the lecture contact table.

Internship/Practica/Field Experience: courses of study in which a University faculty member regularly interacts and directs student outcomes with periodic contact. The learning experience may also contain a site supervisor and directed activity/learning outside of a lecture setting. Contact time requirements follow those of the laboratory/studio guideline.

Accelerated Courses: courses offered outside of a standard 15 week semester in which the credit hours offered are the same as standard semester courses. The content and substantive learning outcomes are the same as those in the standard semester. These courses must meet the definition of standard lecture contact time within the time frame the accelerated version is offered.

Online Courses: courses offered entirely online without regard to face-to-face meetings. These courses have the same learning outcomes and substantive components of a standard lecture course with alternate delivery method. Contact time is satisfied by several means which can include, but is not limited to, the following: a.) regular instruction or interaction with a University faculty member once a week for each week the course runs. b.) Academic engagement through interactive tutorials, group discussions moderated by faculty, virtual study/project groups, engaging with class peers and computer tutorials graded and reviewed by faculty.

Hybrid Courses: courses offered in blended format with 1 or more face-to-face class sessions and at least one or more online sessions, both containing direct interaction with a University faculty member. University faculty members demonstrate through the syllabi that the content and activities equate to a standard assignment of lecture credit.

FERPA Confidentiality of Student Records

The University's policy with respect to the confidentiality of and access to student records is in conformity with the relevant state and federal regulations.

The Family Educational Rights and Privacy Act (FERPA) (20 U.S.C. § 1232g; 34 CFR Part 99) grants eligible students the right to inspect and review certain education records, and safeguards students against improper or unauthorized disclosure of such education records or personally identifiable information contained therein.

Complaints with respect to this policy or its administration may be registered with:

Family Policy Compliance Office
United States Department of Education
400 Maryland Avenue, SW
Washington, DC 20202-5901

What is FERPA?

FERPA is the Family Educational Rights and Privacy Act (<https://www2.ed.gov/policy/gen/guid/fpco/ferpa/>).

The Family Educational Rights and Privacy Act of 1974 helps protect the privacy of student education records. The Act provides eligible students the right to inspect and review educational records, the right to seek to amend those records, and to limit disclosure of information from the records. The intent of the legislation is to protect the rights of students and to ensure the privacy and accuracy of education records. The Act applies to all institutions that are the recipients of federal aid administered by the Secretary of Education.

Who is Protected under FERPA?

FERPA protects the education records of students who are currently enrolled or formerly enrolled regardless of their age or status with regard to parental dependency. The educational records of students who have applied to, but have not attended an institution, are not subject to FERPA guidelines, nor are deceased students.

Parents of a deceased student termed as "dependent" for income tax purposes may have access to the student's education records. A copy of the parent's most recent Federal Income Tax return (where the parents declared the student as a dependent) must be submitted to the Office of the Registrar to document "dependency".

In Reference to FERPA, who is Considered a Parent?

The term "parent" refers to either parent, including custodial and non-custodial.

What are and are not Education Records?

With certain exceptions (noted below), an education record is any record (1) which contains information that is personally identifiable to a student, and (2) is maintained by the University. With the exception of information about other students, financial records of parents and confidential letters of reference to which the student has waived access, a student has the right of access to his/her education records.

Education records include any records in whatever medium (handwritten, print, email, etc.) that are in the possession of any school official. This includes transcripts or other records obtained from a school in which a student was previously enrolled.

What information is not considered part of an education record?

- Sole possession records or private notes held by school officials that are not accessible to released to other personnel.
- Law enforcement or campus security records that are solely for law enforcement purposes and maintained solely by the law enforcement unit.
- Records relating to individuals who are employed by the institution (unless contingent upon attendance).
- Records relating to treatment provided by a physician, psychiatrist, psychologist, or other recognized professional or paraprofessional and disclosed to individuals providing treatment.
- Records of an institution that contain only information about an individual obtained after that person is no longer a student at that institution, i.e. alumni records.

What Rights does FERPA Afford Students with Respect to their Education Records?

The right to inspect and review your education record within a reasonable time after the University receives a request for access. If you want to review your record, contact the University office that maintains the record to make appropriate arrangements.

The right to request an amendment of your education record if you believe it is inaccurate or misleading. If you feel there is an error in your record, you should submit a statement to the University Registrar who is responsible for the record, clearly identifying the part of the record you want changed and why you believe it is inaccurate or misleading. The Office of the Registrar will notify you of their decision and advise you regarding appropriate steps if you wish to appeal.

The right to consent disclosure of personally identifiable information contained in your education records, except to the extent that FERPA authorizes disclosure without consent. Once exception which permits disclosure without consent is disclosure to school officials with "legitimate educational interests". A school official has a legitimate educational interest if the official has a "need to know" information from your education record in order to fulfill his/her official responsibilities. Examples of people who may have access depending on their official duties (and only within the context of those duties):

- University faculty and staff
- Agents of the institution
- Students employed by the institution or who serve on official institutional committees
- Representatives of agencies under contract with the University

The right to file a complaint with the U.S. Department of Education concerning alleged failures by the University to comply with the requirements of FERPA. This can be done by contacting:

Family Policy Compliance Office
United States Department of Education
400 Maryland Avenue, SW
Washington, DC 20202-5901

When is the Student's Consent not Required to Disclose Information?

When the disclosure is (one or more of the following):

- To school officials (defined in policy) who have a legitimate educational interest
- To federal, state, and local authorities involving an audit or evaluation of compliance with educational programs
- In connection with financial aid, including veteran's benefits
- To organizations conducting students for or on behalf of educational institutions
- To accrediting organizations
- To comply with judicial order or subpoena if specified that the disclosure is not to be made due to the interest of justice
- In a health of safety emergency
- Releasing directory information
- Releasing the results of a disciplinary hearing to an alleged victim of a crime of violence

What is Considered Directory Information at Saint Joseph's University?

Certain information, known as directory information, may be disclosed by anyone without the prior written consent of the student. While FERPA defines a list of what can be considered directory information, it is at the discretion of the institution to define what is considered directory information. At SJU, directory information is defined as:

- Student name
- Major/Minor/Certificate field of study
- Degree(s) sought or earned
- Dates of attendance
- Current enrollment status (full/part time)
- Class standing
- Academic awards received (Dean's List, Latin Honors)
- Photographs
- Activities/clubs
- Height and weight of athletic team members
- Most recent educational institution attended

Please note, if an item is not on this list, it may not be disclosed without prior written consent of the student. Addresses, phone numbers, and email addresses of students are *not* directory information at SJU.

Transfer Credit Policies

Undergraduate Transfer Credit Policies

To qualify for a degree, students transferring from on the following categories must fulfill the General Education Program and departmental requirements, either by transfer credit or by courses completed in the day colleges. Approved transfer credit may come from:

- Another college or university,
- The Professional and Liberal Studies program of Saint Joseph's University,
- Or college level credits achieved in the areas of Dual Enrollment/Diocesan Scholars/AP/IB exams.

First Year/Transfer Students

In order for credit to be awarded, Saint Joseph's University requires the course(s) meet the following criteria

- Taken through an accredited college or university
- Earned 3.00 credit hours or higher and the grade of "C" or better

The acceptance or denial of transfer credit is not determined exclusively on the basis of the accreditation of the sending institution or the mode of delivery, but, rather, will consider course equivalencies, including expected learning outcomes, with those of the receiving institution's curricula and standards. Final determination of transferable college-level credit is awarded by the Deans' offices.

Students must submit all materials by the end of the academic year of initial enrollment in order for the course to be applied to the Saint Joseph's University Degree. All incoming freshmen students must complete a Transfer Credit Request Form requiring the above criteria be verified by the college or university Registrar's Office. All students must also submit an official college transcript and course description or syllabus for evaluation.

Block Transfer

Students who transfer to Saint Joseph's University with a completed Associate of Art, Associate of Science, or Associate of Applied Science degree in the Health Professions from an accredited institution will not be required to complete the Saint Joseph's University Cornerstone Core Curriculum. Rather, the Associate degree holder will receive credit for having completed their general education requirements with the addition of a maximum of nine credit hours of Saint Joseph's University mission and identity related coursework as described below. Additionally, if a student has completed a course that would, in a course-by-course transfer evaluation, count for one of the courses identified below, that course will be considered completed.

- Philosophy Level One: Ethics Component (Moral Philosophy) (3 credits)
- Theology: any Theology course (3 credits)
- Any course certified as a Mission Specific overlay course (3 credits)

This proposal does not equate the AA, AS, or AAS degree with the Saint Joseph's University Cornerstone Core. Rather, it provides an alternative path for transfer students to continue their education at Saint Joseph's University in their chosen discipline while still completing foundational coursework in the Jesuit Liberal Arts tradition that is central to Saint Joseph's University's educational mission.

Residence Requirement

The standard residence requirement for a degree at Saint Joseph's University is 60 credits. The final 30 credits must be completed at Saint Joseph's University, except where an approved degree program or an approved plan of acceleration provides otherwise.

Summer and Intersession Courses

Degree credit is granted for courses taken in summer sessions and the intersession. Summer session courses that are a part of the GEP or major course requirements must be taken at Saint Joseph's University. However, if the course is not being offered that summer and is necessary for a student to maintain standard academic progress or the proper sequence of courses in their major field of study, an exception may be granted.

For information on the maximum number of credits allowed to be taken elsewhere, please see the Courses Taken Elsewhere (p. 13) Policy.

The approved uses of summer session courses for matriculated students are as follows:

- To make up academic deficiencies, i.e., courses failed or not completed during a required semester
- To make up course deficits, i.e., additional courses needed as result of change of major, or, in some instances, transfer
- To enrich the student's educational program
- To reduce the student's course load in an ensuing semester

Permission to register for summer courses does not constitute permission to accelerate a degree program. For all students registered in CAS, HSB, and SHSE, the maximum number of credits allowed for any one summer part of term will typically be six. For exceptional reasons, the Dean may grant permission for a third course/an additional 3-4 credits. Registration and payment for summer courses are governed by the regulations and procedures of the summer sessions.

Degree Completion Program Transfer Credit Policies

Advanced Standing for Transfer Students

A candidate for admission to a degree or certificate program with credits from another college must request official transcripts be sent to Saint Joseph's University from each college or university previously attended.

International students must provide official transcripts from each high school and university previously attended, translated into English, and a course-by-course evaluation from an approved international credential evaluation service. For more information please see the section on International Students in the catalog.

Only grades of C (not C-) or higher from accredited colleges or universities will be considered for transfer. Students may transfer a maximum equivalent of 75 credits towards the undergraduate adult learner bachelor's degree at the time of admission. Some courses may require a review by specific academic departments for evaluation of transfer credit.

There are two exceptions to the 75 credit limit on transfer credits for undergraduate adult learner bachelor degree programs. The following students may transfer the equivalent of 90 credits toward the undergraduate adult learner bachelor's degree:

- Students who are transferring from the Saint Joseph's University Undergraduate Day program, or
- Students who have earned a 120-credit bachelor's degree from a previous college or university and are pursuing a second degree at Saint Joseph's University

Students may transfer a maximum equivalent of 30 credits for the associate's degree. Student may transfer a maximum equivalent of six credits for the certificate programs.

Admissions maintains articulation agreements with local and regional community colleges designed to facilitate the transfer process.

Credits for Prior Learning

A student in good academic standing may be eligible to earn college credit for prior learning through College Level Examination Program (CLEP) or Experiential Learning Assessment Program (ELAP). A student

cannot earn CLEP or ELAP credit for a course in which they are currently enrolled or for a course when they have completed a more advanced course in the same subject.

To be considered for CLEP or ELAP, a student must:

- Be in good academic standing, and
- Have more than 30 credits remaining in their degree program

A student may not use a CLEP exam or ELAP portfolio review for credit if they have already transferred the maximum number of credits allowed.

College Level Examination Program (CLEP)

Degree completion students have the opportunity to earn college credit by achieving a passing score on exams in specific subject areas through CLEP. Administered by the College Board, CLEP offers 33 exams in five subject areas, covering material generally taught in the first or second year of college. Students must obtain approval from their respective advising office before taking a CLEP exam in order to ensure the applicability of CLEP credits to their degree program. After a CLEP request is approved, the exam must be taken and a CLEP transcript submitted before the end of the next consecutive semester. A listing of exams and minimum required scores is available on the advising office websites.

Experiential Learning Assessment Program (ELAP)

ELAP provides students the opportunity to validate college level knowledge acquired through study, work, and other life experiences. Degree completion programs offer a portfolio assessment process by which prior learning can be documented and assessed for credit. ELAP applicants may apply for portfolio assessment credit for experiences that are similar to a specific course.

Approval of all ELAP requests is at the discretion of each academic department. This process, including portfolio preparation and academic department/faculty review, may take up to two to three months to complete. If the student is awarded credit, the credit will be recorded on the student's permanent record as a transfer course with a grade of "TR." ELAP applications may be submitted after a student has been fully accepted and enrolled in the program.

Credits awarded by Assessment through American Council on Education (ACE)

A student may be granted transfer credit for courses evaluated and approved for college credit by the American Council on Education (ACE), if the course meets the content equivalent of a three-credit course offered at Saint Joseph's University. ACE recommendations for 1-credit or 2-credit courses may not be transferred to fulfill a three-credit course requirement. Credit is not awarded for vocational/technical level recommendations. Listings of ACE approved courses and credit recommendations can be referenced in two publications: A Guide to the Evaluation of Educational Experiences in the Armed Forces and The National Guide to Educational Credit for Training Programs. Credits awarded are subject to the same policies as those of any other transfer credits. To initiate an evaluation of ACE credits, a student must request an official ACE transcript.

Military Credits

Transfer credit may be granted for college-level coursework earned while in military service if the credit is recommended by the American Council on Education (ACE) and if the course meets the content equivalence of a three-credit course offered at Saint Joseph's University. ACE

recommendations for 1-credit or 2-credit courses may not be transferred to fulfill a three-credit course requirement. Credit is not awarded for Basic Training or for vocational/technical level recommendations. To initiate an evaluation of military credits, a student must request an official military transcript from their respective service branch. Students may access additional information regarding military transcripts and ACE evaluations at <http://www.acenet.edu/militaryprograms/transferguide> (<http://www.acenet.edu/militaryprograms/transferguide/>)

Residence Requirement

The residency requirement for an associate degree is fulfilled by the satisfactory completion of at least 36 credits towards the BBA immediately preceding the date of graduation. Students enrolled in an associate degree program must complete at least three upper division credits in their major and at least half of their Business core courses at Saint Joseph's University. Business majors must complete at least half of their Business core/concentration courses at Saint Joseph's University.

The residency requirement for a bachelor's degree is fulfilled by the satisfactory completion of at least 45 credits towards their BLS immediately preceding the date of graduation.

For a bachelor's degree, at least 12 upper division credits (level as defined by each academic department) in the major must be completed through the degree completion program unless specifically waived by the Department Chairperson or Program Director.

The residency requirement may not be satisfied by credits earned through CLEP, ELAP, or courses completed elsewhere.

Once matriculated into a degree completion program, students are required to complete all remaining courses at Saint Joseph's University. Exceptions for up to six credits may be considered in extenuating academic circumstances by written request to the appropriate Associate Dean.

Graduate Transfer Credit Policies

With the approval of the Graduate Program Director, students may transfer between 8 and 14 credits based on the graduate program's total credit hours (see Table 1 below). Transfer credit may only be reviewed for graduate-level work in graduate programs that are 30 credits or more in length. Course credit may be transferred only from graduate programs at regionally accredited institutions and only courses with a grade of B or higher may be transferred. Courses with grades of B- or lower will not be evaluated for transfer.

Applicants must submit an official transcript, course description, and syllabus. It is the student's responsibility to initiate the review process for potential credit transfers by contacting the Graduate Program Director. Transfer credit must be evaluated by the end of the first semester a student is enrolled in the degree program. Continuing education credits will not be considered for transfer credit.

Once a student is enrolled in a graduate program at Saint Joseph's University, courses may not be taken at another institution for the purpose of transfer credit, unless approved by the Program Director and Dean.

The proposed policy does not apply to graduate professional programs (PharmD, DPT, DrOT, DBA, MOT and MS Physician Asst.)

Grades Pass/Fail Grade Option

Programs may designate courses as pass/fail for the grading of students taking competency-based courses. The instructor will submit a grade of either a P or F to be reflected on the student's transcript. Final grades of P are not calculated into the student's grade point average (GPA), and credits will be awarded only if a passing grade is attained. A grade of F will be calculated into the student's GPA. A comprehensive description of grades is outlined in the Grades section of the catalog.

Pass/No Penalty Grade Option

In order to encourage students to challenge their interests and limitations in areas outside their chosen field of study, the University has a Pass/No Penalty grade option. A standard passing grade submitted by an instructor will be converted to a grade of **P** on the student's transcript, and a failing grade will be converted to a grade of **NP** on the student's transcript. Neither of these final grades are calculated into the student's grade point average (GPA), and credits will be awarded only if a passing grade is attained. A comprehensive description of grades is outlined in the Grades section (p. 17) of the catalog.

Students may select the P/NP grading option for a course if the following conditions are met:

- The course selected is a free elective, not counting toward the student's general education requirements, or prescribed major or minor program requirements.
- Students are permitted to take 2 (two) such courses under this grading option during their undergraduate career at Saint Joseph's University, and no more than 1 (one) such course in a given semester.
- The student must be an undergraduate student, and the course must be on the undergraduate level.
- The student must be in sophomore, junior or senior class standing at Saint Joseph's University.

The deadline to declare a course to be graded using the P/NP Grade Option via the electronic form is the withdrawal deadline defined on the academic calendar.

Incomplete Grades

The grade of Incomplete, noted as "I" on the official transcript, is reported by an instructor to the Program Director or Department Chair and to the Registrar's Office only under the following circumstances (all must apply):

1. The student has requested an Incomplete
2. Course requirements have not been completed for reasons beyond the student's control (e.g., illness or family emergency)
3. The student has completed the majority of the work for the class, and the student can accomplish the remaining requirements within 30 days of the end of the final exam period.

Please note that if the work for the course is not completed by the agreed time, the "I" grade will convert to an "F" grade. A student may not be given an "I" grade if an incomplete grade from a previous semester is still outstanding.

Faculty are allowed to request approval to extend the incomplete period for one additional 30 day period when there are extraordinary

circumstances preventing a student from completing the course in the Incomplete time period noted in the catalog.

Audit

Audited courses appear on the student's official transcript and on the official record with the grade "X". Students must petition the appropriate Dean to be permitted to take a class on an audit basis. The appropriate Dean may allow a student to change from credit to audit status no later than the withdrawal deadline for the semester, but not to avoid penalties imposed through the University's Academic Honesty Policy. The reverse change, from audit to credit status, is not permitted.

Grade Appeal

A student who wishes to appeal the final grade in a course should first contact the instructor of the course in an attempt to remedy the situation. If after talking with the instructor the student still thinks they have been inappropriately evaluated in the course, the student may make a written request for review to the Department Chairperson or Program Director, depending on the program of study. The written request must describe, in detail, the situation and reason for appealing the course grade. The Department Chairperson or Program Director will consult with the instructor and if a grade change is warranted, make a recommendation to the Associate Dean for approval.

Grade Point Average (GPA)

The grade point average is the ratio of the total grade points (sum of products of course credits and grade points for each course) earned at Saint Joseph's University to the total credits attempted at Saint Joseph's University (including grades of F and FA, but excluding grades of P, NP, I, IP, W, WA, X, AF, and NG.) Only courses taken at Saint Joseph's University after matriculation are included in this calculation, even if transfer credit has been awarded.

Undergraduate Level Grades

The following system of grades, with their grade point equivalent in parenthesis, is used in all courses offered by the University:

Letter	GPA	Description
A	4.0	Excellent performance in all or most aspects of the course
A-	3.7	Excellent performance in many aspects of the course
B+	3.3	Very good performance in all or most aspects of the course
B	3.0	Good performance in all or most aspects of the course
B-	2.7	Good performance in many aspects of the course
C+	2.3	Acceptable performance; more than adequate performance in in some aspects of the course
C	2.0	Acceptable performance in all or most aspects of the course
C-	1.7	While acceptable overall, course performance is inadequate in one or more areas
D+	1.3	While acceptable, course performance is inadequate in several areas
D	1.0	Meets minimal performance standards required for passing
F	0.0	Failure; overall performance has not meet the basic standards of the course
FA		Failure; due to excessive absence

P	Pass. No grade points. Credit. The grade P carries credit but is not included in the calculation of the grade point average.
NP	No Penalty. No grade points. No credit. The non-passing grade NP carries no credit and does not affect the calculation of the grade point average.
I	Incomplete. A temporary grade which may be assigned when a student has permission of the instructor to complete requirements within a short time after the end of the course. This grade is not used when a student's work is qualitatively deficient. The I grade must be resolved within 30 days of the last day of the final exam period. "I" grades will not appear on a final record. At the end of the stated period unresolved incomplete grades become failure grades. Extensions may be granted only by the Dean of the appropriate college.
IP	In Progress. A temporary grade assigned to all students of a given course that extends meeting requirements beyond the grading period for a traditional semester. A final grade will be assigned by the appropriate faculty member at the conclusion of the given course or within 180 days from the initial issuance of the IP grade. At that point, the University Registrar is instructed to change all outstanding IP grades to F grades. Extensions may be granted only by the Dean of the appropriate college.
W	Withdrawal.
WA	Administrative Withdrawal. Equivalent to W; given by the Dean of the college to which the student belongs in consultation with the University Registrar or with the Vice-President/Associate Provost of Student Life in selected involuntary cases, or both, following consideration of exceptional situations where a standard withdrawal from all courses is or was not possible. Students who must withdraw from the university after the end of the last day to withdraw should consult with their academic advisors for appropriate procedures, justification, and documentation to request an administrative withdrawal. Further, Administrative withdrawals are approved only in circumstances with sufficient documentation of impacted academic performance because of medical illness, death or critical illness of an immediate family member, or military service, or when it is deemed that the University can no longer provide education services to a given student (involuntary withdrawal). Administrative withdrawal petitions based upon extraordinary circumstances are only considered for all courses in a semester (not selected courses) and are only considered for courses in the calendar year immediately preceding the date of the petition. Petitions for withdrawal from a second successive semester based on the same circumstances will not be approved.
X	Audit. No grade points. No credit. Does not affect the calculation of the grade point average.
AF	Academic Forgiveness. No grade points. No credit. Does not affect the calculation of the grade point average.

NG	No Grade. A grade that is only used by the University Registrar to indicate that no grade has been submitted by the instructor. This grade will automatically convert to an F grade if it is not resolved within four weeks from of the last day of the final examination period for the semester in question.
NA	Never Attended. Equivalent of F; given by the instructor when the student never attended or did not attend after the add/drop period. This grade may be changed by an administrative withdrawal only within one calendar year from when it is issued.
VF	Equivalent of F; given by the instructor when the student stopped attending after the add/drop period. This grade may be changed by an administrative withdrawal only within one calendar year from when it is issued.

IP	A temporary grade assigned to all students of a given course that extends meeting requirements beyond the grading period for a traditional semester. Other grades on the scale will be assigned by the appropriate faculty member at the conclusion of the given course or within 180 days from the initial issuance of the IP grade. At that point, the University Registrar is instructed to change all outstanding IP grades to F. Extensions may only be granted by the Dean of the college through which the course is offered.
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W	Withdrawal.
WA	Administrative Withdrawal. Equivalent to W; given by the Dean of the college to which the student belongs in consultation with the University Registrar or with the Vice-President/Associate Provost of Student Life in selected involuntary cases, or both, following consideration of exceptional situations where a standard withdrawal from all courses is or was not possible. Students who must withdraw from the university after the end of the last day to withdraw should consult with their academic advisors for appropriate procedures, justification, and documentation to request an administrative withdrawal. Further, Administrative withdrawals are approved only in circumstances with sufficient documentation of impacted academic performance because of medical illness, death or critical illness of an immediate family member, or military service, or when it is deemed that the University can no longer provide education services to a given student (involuntary withdrawal). Administrative withdrawal petitions based upon extraordinary circumstances are only considered for all courses in a semester (not selected courses) and are only considered for courses in the calendar year immediately preceding the date of the petition. Petitions for withdrawal from a second successive semester based on the same circumstances will not be approved.

X	Audit. No grade points. No credit. Does not affect the calculation of the grade point average.
AF	Academic Forgiveness. No grade points. No credit. Does not affect the calculation of the grade point average.
NG	No Grade. A grade that is only used by the University Registrar to indicate that no grade has been submitted by the instructor. This grade will automatically convert to an F grade if it is not resolved within four weeks from of the last day of the final examination period for the semester in question.

NA	Never Attended. Equivalent of F; given by the instructor when the student never attended or did not attend after the add/drop period. This grade may be changed by an administrative withdrawal only within one calendar year from when it is issued.
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VF	Equivalent of F; given by the instructor when the student stopped attending after the add/drop period. This grade may be changed by an administrative withdrawal only within one calendar year from when it is issued.
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Graduate/Doctoral Level Grades

The following system of grades, with their grade point equivalent in parenthesis, is used in all courses offered by the University:

Letter	GPA	Description
A	4.0	Distinguished; exceptional performance in all aspects of the course
A-	3.7	Exceptional performance, but somewhat less than that rated as A
B+	3.3	Very good; meritorious work; exceptional performance in several aspects of the course; notably above average expected of students
B	3.0	Good; sound performance in all aspects of a course; completely fulfilling and satisfying the requirements of the course
B-	2.7	Good performance in many aspects of the course
C+	2.3	Acceptable performance; more than adequate performance in in some aspects of the course
C	2.0	Acceptable performance in all or most aspects of the course
F	0.0	Failure; overall performance has not meet the basic standards of the course
FA		Failure; due to excessive absence
P		Pass. No grade points. Credit. The grade P carries credit but is not included in the calculation of the grade point average.
NP		No Penalty. No grade points. No credit. The non-passing grade NP carries no credit and does not affect the calculation of the grade point average.
I		Incomplete. A temporary grade which may be assigned when a student has permission of the instructor to complete requirements within a short time after the end of the course. This grade is not used when a student's work is qualitatively deficient. The I grade must be resolved within 30 days of the last day of the final exam period. "I" grades will not appear on a final record. At the end of the stated period unresolved incomplete grades become failure grades. Extensions may be granted only by the Dean of the appropriate college.

Graduation & Commencement

Graduation Application

Students who will complete all of the requirements for a degree in a given semester must submit a graduation application in the Nest by the deadline specified on the academic calendar. Failure to submit the graduation application by the specified deadline will result in delayed degree conferral, and will be reviewed in the term for which they apply. The deadlines are as follows: Spring: March 1st, Summer: July 1st, Fall: November 1st.

Once a graduation application has been submitted, a student can no longer update their curriculum. This means that their major(s), minors(s), and/or certificate(s) at time of application are final and cannot be changed.

Awarding of Degrees and Diplomas

Degrees are conferred three times per year: May 18 for Spring, August 31 for Summer, and January 15 for Fall. Students are awarded the degree of their primary major. Double majors are recorded on the transcript; however, students are awarded one degree and receive one diploma listing that degree. Diplomas are ordered two weeks after the conferral date and take 4-6 weeks to process and ship.

Commencement Ceremony

The commencement ceremony is held annually in the spring. Diplomas are not distributed at Commencement. Students receiving degrees in August or January are invited to participate formally in the commencement ceremony of the following May. The date of the commencement ceremony may be different than the date when your degree is conferred.

Eligibility for Walking in the Commencement Ceremony

Students must meet the following criteria to be eligible to walk in the May Commencement Ceremony:

- Students must have no more than two courses remaining at the end of the spring semester
- Students are required to apply to graduate by March 1st for the summer term
- Students may only attend the Ceremony for their current primary program. Attendance at multiple ceremonies is not permitted.
- Students with outstanding requirements are to be registered for the remaining two courses in the summer semester by March 15th.
- Students must be good academic standing:
 - Good academic standing for undergraduate students is a cumulative GPA of at least a 2.0
 - Good academic standing for graduate students and doctoral students (in a PhD or Ed.D.) students is a cumulative GPA of at least a 3.0

Doctoral students (PhD or EdD) are required to have successfully defended their dissertation and will finish all remaining requirements (post defense and/or progression milestones) in the summer to be able to walk in the commencement ceremony.

Early Graduation/Acceleration

While the traditional undergraduate degree program requires the attendance of eight semesters, students may seek the Dean's approval for an accelerated program.

Extraordinary academic achievement on the pre-college level, through Advanced Placement and similar programs, may, at the discretion of the appropriate Dean, significantly reduce the traditional semester requirement. Students should request the Dean's evaluation of their pre-college work before the end of their first year.

Students may, for sound academic reason, request permission to accelerate their degree programs. Such acceleration is limited to 30 credits or one academic year. After consultation with their faculty advisors and department chairs, interested students petition their Dean, ordinarily in the spring semester of the sophomore year but not later than the fall semester of the junior year, to approve a plan of acceleration. If the plan of acceleration includes summer session courses, not more than nine credits may be scheduled for any one summer. The traditional limitation of 18 degree credits in other institutions applies to accelerated programs. Transfer students with 18 credits or more in other institutions are not eligible for program acceleration.

Delayed Graduation

Students may request their Dean's permission to extend their degree program beyond the traditional eight semesters. Extensions beyond ten semesters are granted only for extraordinary reason.

Graduation Process for EdD Programs

After a successful defense of the final dissertation and before there is a grade change on the student's transcript, all graduation requirements must be met. This includes completion of the following: Registrar Requirements, Signature Pages, Approved and Completed Manuscript, IRB Protocol, the Library Dissertation Requirements for Graduation (i.e., Bindery and ProQuest processes), Bound Dissertation Copies, and Final Approval to Graduate.

Undergraduate Policies

Academic Policies

Degree Requirements

The University offers four bachelor degrees: the Bachelor of Arts, the Bachelor of Science, the Bachelor of Liberal Studies and the Bachelor of Science in Business Administration. The degree awarded is determined by the student's major field. The standard requirements for the degree include the following:

- Completion of a minimum of 120 credits
- Completion of additional credits specified by the major
- Completion of the General Education Program
- Completion of approved requirements for the major field
- Cumulative grade point average of 2.0

The University offers two associate degrees: the Associate Degree in Science and the Associate Degree in Business Administration. The degree is determined awarded is determined by the student's major field. The standard requirements for the degree include the following:

- Completion of a minimum of 60 credits
- Completion of additional credits specified by the major
- Completion of the General Education requirements for Associate degrees
- Completion of approved requirements for the major field
- Cumulative grade point average of 2.0

Residence Requirement

The residence requirement for a Bachelor's degree at Saint Joseph's University is 60 credits. The final 30 credits must be completed at Saint Joseph's University, with the exception of an approved degree program or an approved plan of acceleration.

The residence requirement for an Associates degree at Saint Joseph's University is 30 credits. The final 15 credits must be completed at Saint Joseph's University, with the exception of an approved degree program or an approved plan of acceleration.

Final Examinations

Students are required to take a final examination in each subject during the scheduled examination period at the end of each semester. With the approval of the department chair, an instructor may exempt from the final examination all students who have earned the grade of "A" in the course. Individual teachers who wish to substitute an alternative mode of evaluation for the final examination must submit a specific request in advance through their department chairperson for the approval of the appropriate Dean. The syllabus must include information on the alternative mode selected.

Grade Appeal

A student who wishes to appeal the final grade in a course should first contact the instructor of the course in an attempt to remedy the situation. If after talking with the instructor the student still thinks they have been inappropriately evaluated in the course, the student may make a written request for review to the Program Director or Department Chair, depending on the program of study. The written request must describe, in detail, the situation and reason for appealing the course grade. The program director or department chair will consult with the instructor and if a grade change is warranted, make a recommendation to the Associate Dean for approval.

Withdrawal from Course/Courses

A student who wishes to withdraw from a course after the add/drop period must obtain approval from their academic advisor no later than the withdrawal deadline for the semester as stated on the academic calendar. All withdrawn courses will be noted with a grade of "W" on the official transcript, and are not included in the grade point average calculation. Students who are withdrawing from a course that has a co-requisite will be withdrawn from both courses. A request to withdraw past this deadline requires an extraordinary reason and the approval of the respective Associate Dean overseeing the student's primary major. A withdrawal will not be permitted after the last day of classes for the semester or in contravention of the penalties imposed through the University's Academic Honesty Policy.

Class Standing

A student's class standing is separate from the definition of "Satisfactory Academic Progress". Advancement through the first year, sophomore, junior, and senior levels is predicated on the number of credits completed

and hours earned toward completion of the degree program. traditionally, eight semesters are required to finish a baccalaureate degree program. Therefore, class standing at Saint Joseph's University is based on the following scale for students in a 4-year bachelor's degree program:

Class Standing	Credit Hours Earned
First Year	fewer than 24
Sophomore	24 to 53
Junior	54 to 83
Senior	84 or more

Sixth Course Overload

The standard course load for full-time bachelor's degree students is five courses of 3-4 credits, up to a maximum of 17 credits, unless a student's major program of study has an approved higher credit limit. Students with superior records (traditionally 3.3 GPA and above) may petition the Dean of the appropriate college for permission to register for a sixth course. No student may register for more than six courses in a single semester. Additional tuition may be charged for a course overload.

Independent Study/Directed Readings and Research/Tutorials

Students who have completed four required semesters with an overall grade point average (GPA) of 3.0 or higher, or cumulative grade point average (GPA) of 3.4 or higher for courses in the major field of study, may register each semester for one upper division course in the major field (or a closely related field) to be taken in the Independent Study/Directed Readings or Research/Tutorial format. Students are required to develop a comprehensive plan of study in consultation with the faculty member directing the course of study and receive prior approval of the department chair and the Dean's office before registering for the course. . Such courses are offered to enrich the student's major program and not as a special arrangement to facilitate a student's fulfillment of course or credit requirements.

Minors

Students may have a minor listed on their academic record in areas where the department has an approved minor, or in an interdisciplinary program. For a minor, at least 18 credits in the specified area must be successfully completed. Students choosing a minor must seek the approval of the chair in the department of the minor prior to applying to graduate. Students should also be aware that their choice of a minor may be restricted based on their major or primary area of study.

Second Major

Qualified students may request permission to pursue a second major for sound academic reasons. Such a request requires the approval of the chair of the secondary major department and of the appropriate Dean. Certification of completion of requirements for the second major will be the responsibility of the chair of the secondary major department. The official transcript will record the completion of the second major. The degree granted will be the degree appropriate in the primary major. Two separate degrees will not be granted to students who complete a second major. Students cannot declare a second major after they have already applied to graduate.

Second Degree

Students who have earned one bachelor's degree may request permission to return to study for a different bachelor's degree. This is the awarding of two distinct credentials. Applications for a second degree require the approval of the major department and the appropriate Dean. Candidates for a second degree must meet all standard degree requirements. Credits applied toward a first degree may be applied toward a second degree, as if the candidate were a transfer student, but at least 30 additional credits must be successfully completed for a second degree. Students who have completed a bachelor's degree are advised that a second degree is rarely, if ever, required for certification or pre-professional qualification. Specific course requirements for certification or pre-professional qualifications can usually be met by enrolling in the required courses as a non-matriculated student. Many institutions offer graduate credit for courses which may be applied toward certification requirements.

Conduct Suspension

If you are suspended for any conduct related incident before the end of term and no final grades are entered any course without a grade with be given a WA for an administrative withdrawal.

Special Program

A set of requirements leading to a specific objective secondary to the degree, either vocational or liberal, with the required courses simultaneously satisfying degree requirements, constitutes a Special Program. A minimum of 24 credits and two disciplines are necessary for a Special Program. Completion of a Special Program is noted on the student's academic record.

Leave of Absence (LOA)

A Leave of Absence (LOA) is for students who are taking time off from their formal education, with the intent to return to Saint Joseph's University. Students may not take classes at another institution and transfer those credits back to Saint Joseph's University while they are on a leave of absence.

When approved, a leave of absence is granted for one semester and may be renewed once for a consecutive semester or a total of two leave of absences during a student's time at Saint Joseph's University. To show continuity in the academic record, a comment of "Leave of Absence" will be placed on the official transcript for the term the student is on a leave of absence.

Students on a leave of absence are reported to lenders and loan service agencies as "not enrolled" and the student needs to contact lenders for information on possible repayment requirements.

Withdrawal from the University

Undergraduate Day students should consult with their academic advisor before beginning the withdrawal process from Saint Joseph's University. The first step of the withdrawal process is to contact success@sju.edu or call 610-660-2956. Students will submit the withdrawal form and have an exit interview with a staff member from the Office of Student Success to complete the withdrawal process.

Summer and Intersession Courses

Degree credit is granted for courses taken in summer sessions and the winter intersession. Summer session courses that are part of the GEP or major course requirements must be taken at Saint Joseph's University.

However, if the course is not being offered that summer and is necessary for a student to maintain standard academic progress or the proper sequence of courses in their major field of study, an exception may be granted. (Please see the Courses Taken Elsewhere policy) (p. 13)

The approved uses of summer session courses for matriculated students are as follows:

- To make up academic deficiencies, i.e., courses failed or not completed during a required semester
- To make up credit deficits, i.e., additional credits needed as result of change of major or transfer
- To enrich the student's educational program
- To reduce the student's course load in a subsequent semester

Permission to register for summer courses does not constitute permission to accelerate a degree program. For all undergraduate students the maximum number of credits allowed for any one summer part of term will typically be eight. For exceptional reasons, the Dean may grant permission for an additional three credits. For all undergraduate students the maximum number of courses allowed for any Intersession term will be one. Overloads are not permitted during Intersession.

Academic Honors Latin Honors

Undergraduate students will be awarded Latin honors upon conferral of the Bachelor degree if they have completed a minimum of 60 semester hours in residence and achieved the following cumulative grade point average:

summa cum laude	3.85
magna cum laude	3.70
cum laude	3.50

Dean's List

Students in bachelor's degree programs who achieve a grade point average of 3.5 for a semester in which they are registered as a full-time student and complete a minimum of 12 credits at Saint Joseph's University will be included on the Dean's List.

Students in associate degree programs and degree completion programs must complete at least 30 credits at Saint Joseph's University before becoming eligible. A cumulative grade point average of 3.50 is required to achieve and to remain on the Dean's List. A minimum of six credits must be completed during the semester to be eligible for Dean's List. A failing semester grade in the current semester disqualifies a student from achieving Dean's List.

Academic Honor Societies Phi Beta Kappa Society

Phi Beta Kappa was established in 1776 as a philosophical society. Eventually, it evolved into the paramount honor society for the liberal arts in America. Its major goal is to support, foster, and recognize the excellence of liberal arts scholarship in the institutions of higher education in America. There are presently 262 chapters in the United States; the Saint Joseph's University chapter was established in 2001 and comprises faculty and staff members who are members of the

Society. These members carry on the business of the chapter and elect the student members each year.

Student members are elected in the second semester of the junior or senior year primarily on the basis of broad cultural interests, scholarly achievement, and commitment to the intrinsic value of learning. Eligible students must complete a minimum of 90 credit hours of liberal studies among the 120 or more credit hours required for the bachelor's degree. In addition, they must have completed at least three full semesters of work (45 credits) in residence at Saint Joseph's University and be fully registered, as a full time student, for the fourth semester. They must also have obtained the minimum grade point average at Saint Joseph's University specified by the chapter. While the minimum grade point average requirements may vary slightly from year to year, usually it is 3.75 for juniors and 3.5 for seniors.

Liberal studies shall be considered to be courses designed principally for knowledge, understanding or appreciation of the natural and social world in which we live. Grades earned in applied or professional work may not be counted toward the liberal arts hours or the grade point average for eligibility. Applied and professional work shall be understood to include all training intended to develop skills or vocational techniques; this work often leads to licensure or certification. Such courses generally are taken by students who are preparing for a specific professional career. Examples of courses not recognized by the national office of Phi Beta Kappa under the heading of "liberal studies" would be those in business administration, accounting, education, journalism, library science, military science, applied physical education, speech, applied art, applied music, social work, applied communication, and computer science.

Weight will be given to the breadth of the program of each candidate as shown by the number and variety of courses taken outside of the major. Weight will also be given to the balance and proportion of the liberal arts in the student's degree program as a whole. Students who have violated the academic honesty policy of Saint Joseph's University will not be eligible for membership.

Students who complete their college studies at the end of the summer of fall terms, shall be considered for membership during the following spring.

Election to membership in Phi Beta Kappa is wholly within the discretion of the local chapter, subject only to the limitations imposed by the Constitution and By-Laws of the Chapter. No right to election shall adhere to any student solely by reason of fulfillment of the minimum grade point average for election to "membership in course," and no reason need be given for non-election.

Beta Gamma Sigma

In the spring of 1907, a group of commerce students at the University of Wisconsin received permission from the faculty to organize a commerce honor society, which they called Beta Gamma Sigma. The purpose of the Society was to encourage and reward scholarship and accomplishment in the field of business studies among commerce students at the University. At about the same time, students at the University of Illinois and the University of California felt the need for such an organization on their campuses and respectively organized Delta Kappa Chi (1910) and The Economics Club (1906). In 1913, having become aware of their coexistence and common purpose, representatives of the three societies met at Madison, Wisconsin, to consummate a merger which made Beta Gamma Sigma into a national organization.

Action was initiated in 1919 to establish Beta Gamma Sigma as the only scholastic honor society recognized by the American Assembly of Collegiate Schools of Business (AACSB). This organization, which was renamed AACSB International - The Association to Advance Collegiate Schools of Business, includes in its membership collegiate schools of business that meet high standards of eligibility required of accredited member institutions with respect to curricula, teaching staff, teaching loads, library and laboratory facilities. Beta Gamma Sigma amended its constitution in 1921 to restrict the installation of new chapters to collegiate schools of business which are accredited members of AACSB International.

The Mission of the International Honor Society Beta Gamma Sigma is to encourage and honor academic achievement in the study of business, to foster personal and professional excellence, to advance the values of the Society, and to serve its lifelong members.

Other Honors Societies

Distinguished achievement is also recognized by admission to Alpha Sigma Nu, national Jesuit honor society, and the following more specialized national honor societies:

- Phi Theta Kappa (Associate Degree programs)
- Alpha Sigma Lambda (Adult Learners)
- Upsilon Pi Epsilon (Computer Science),
- Omicron Delta Epsilon (Economics),
- Alpha Upsilon Alpha (Education),
- Kappa Delta Pi (Education),
- Alpha Eta (Health Sciences, Exercise Physiology)
- Delta Phi Alpha (German),
- Upsilon Phi Delta (Healthcare Administration)
- Phi Alpha Theta (History),
- Pi Mu Epsilon (Mathematics),
- Phi Sigma Iota (Modern Languages/Classics),
- Sigma Theta Tau (Nursing),
- Rho Chi (Pharmacy),
- Phi Sigma Tau (Philosophy),
- Sigma Pi Sigma (Physics),
- Pi Sigma Alpha (Political Science),
- Alpha Epsilon Delta (Premedical),
- Psi Chi (Psychology),
- Lambda Nu (Radiological and Imaging Sciences)
- Lambda Beta (Respiratory Therapy),
- Alpha Kappa Delta (Sociology),
- Sigma Delta Pi (Spanish), and
- Sigma Xi (Student Research), and
- Theta Alpha Kappa (Theology).

Academic Probation and Dismissal Board of Student Academic Review

The Board of Student Academic Review (BOSAR) reviews the academic performance of all students in bachelor's degree programs whose grade point average (GPA) falls below a 2.00 to make recommendations on academic warnings, academic probation and academic dismissal. The membership of BOSAR shall consist of:

- Five (5) Associate Deans, one from each college and school: the College of Arts and Sciences, the Haub School of Business, the School of Education and Human Development, the School of Health Professions and the School of Nursing and Allied Health. One of the Associate Deans shall serve as Chair and another Associate Dean shall serve as co-Chair.
- Seven (7) faculty members
- One (1) student member

Minimum Standards for Retention

A cumulative grade point average of 2.0 is the minimum required to be awarded a bachelor's degree from Saint Joseph's University. Students with a grade point average below 2.0 (cumulative or semester) at the end of any given semester will be warned by Dean, at the recommendation of the Board on Student Academic Review (BOSAR), that their level of performance may be insufficient to satisfy the requirements for graduation.

At the end of the fall or spring semester, students who have completed their second semester and following, and who have a cumulative grade point average below the minimum level indicated in the table below will be reviewed by the Board on Student Academic Review (BOSAR), which could lead to a further recommendation for academic probation, suspension, or dismissal.

Semester completed	Minimum GPA
At the end of the 1st semester	1.8
At the end of the 2nd semester	1.8
At the end of the 3rd semester	1.8
At the end of the 4th semester	1.8
At the end of the 5th semester	1.9
At the end of the 6th semester	1.9
At the end of the 7th semester	2.0

Transfer students are required to maintain the minimum cumulative GPA for the semester level to which they are assigned. Courses at other institutions for which they received academic credit at SJU upon transferring and which contribute to their SJU cumulative grade point average are included in these calculations.

Academic Probation

Students who fail to maintain the required cumulative grade point average or an acceptable level of progress toward the degree are placed on probation by their Dean, acting on the recommendation of the Board on Student Academic Review (BOSAR). A student on probation is required to report to the Dean, who may prescribe appropriate remedial measures, and is not permitted to register for more than five courses a semester. If circumstances warrant, the Dean may require a student on probation to limit their course load to four with no reduction in tuition.

The standard period of probation will extend one semester, during which time the student must show sufficient improvement to raise their GPA above the minimum level. In extraordinary cases, one additional semester of probation may be allowed by the Board on Student Academic Review (BOSAR) if the improvement during the first probationary semester indicates that the student will probably reach the necessary level by the end of the second probationary semester. A student may be permitted as many as three semesters of probations, provided that no more than two are consecutive.

A student on academic probation is ineligible to participate in major extracurricular activities, including intercollegiate athletics, or to serve as officer or director of any student activity.

Academic Suspension

A student who fails to raise their cumulative GPA above the minimum level, or who fail to make sufficient improvement in their rate of progress during the period of probation may be subject to academic suspension by the appropriate Dean on the recommendation of the Board on Student Academic Review (BOSAR). While a student is generally granted at least one academic probation before suspension, the Board on Student Academic Review (BOSAR) may recommend academic suspension without any probation when the student's cumulative grade point average or rate of progress is so low that the Board on Student Academic Review (BOSAR) determines an academic probation would not be in the student's best interest. A student who has been placed on suspension by the appropriate Dean may return to Saint Joseph's University only after being away for the period of suspension, but not more than three years. Students who have been away for more than three years must reapply to the university.

Academic Dismissal

A student who fails to make sufficient improvement in their level of performance or rate of progress during the period of probation, or after coming back from suspension, may be subject to academic dismissal by the appropriate Dean.

Students may appeal academic dismissal in writing or in person to the Board of Student Academic Review (BOSAR) by a date to be set by the Associate Deans in consultation with the Registrar. BOSAR may then recommend one of the following:

- Student is placed on academic probation
- Student is suspended from Saint Joseph's University
- Student is dismissed from Saint Joseph's University

While a student is generally granted at least one academic probation or suspension before dismissal, the Board on Student Academic Review (BOSAR) may recommend academic dismissal without any probation or suspension if the student's cumulative grade point average or rate of progress is so low that the Board on Student Academic Review (BOSAR) determines an academic probation and/or suspension would not be in the student's best interest. A student who has been academically dismissed may not be a student at Saint Joseph's University in the future without formally re-applying to the University.

In the case of any action by a Dean, the student will be notified. The student's faculty advisor is notified as well. The student will be informed of their options and is required to meet with their advisor.

Academic Forgiveness

Undergraduate and graduate students who return following an absence of at least one calendar year may request academic forgiveness. If academic forgiveness is granted, each grade of C- or below for undergraduate students, and B- or below for graduate students will be eligible to be replaced with a grade of "AF". Courses with a grade of AF will no longer count for credit or be included in the GPA calculation. Additionally, the student's transcript will have a comment added denoting that academic forgiveness was granted in the applicable semesters. To apply for academic forgiveness, the student must submit a letter to the appropriate Dean explaining how they will achieve successful degree.

completion. This explanation may involve addressing the reasons for their poor original performance and lessons learned during their time away. Application for Academic Forgiveness must be completed at least 4 weeks before registration for courses. Please see application form for additional details. (<https://sju.teamdynamix.com/TDClient/1942/Portal/Requests/ServiceDet/?ID=51080>)

Guidelines

- Students may only receive academic forgiveness once.
- Courses that a student withdrew from are not eligible for academic forgiveness.
- Once a student has been approved for academic forgiveness, the action is irreversible and final.
- Failing grades that result from violations of the Academic Honesty Policy cannot be changed under the terms of this policy.
- Federal guidelines allow Title IV Federal Financial Aid to be applied for only one retake of a course with a passing grade. Questions related to financial aid eligibility following academic forgiveness can be directed to finaid@sju.edu.
- A student's Satisfactory Academic Progress is not impacted by academic forgiveness as it relates to federal, state, and institutional financial aid requirements. Please review the SAP policies relative to financial aid at sju.edu/sap (<http://sju.edu/sap/>).

Satisfactory Academic Progress Satisfactory Academic Progress (SAP)

The standard academic program in the undergraduate day colleges at Saint Joseph's University requires students to progress toward their degree in eight standard (fall and spring) semesters in which 15 credits are taken each semester. Following such a program a student will have completed 120 credits by the end of the eighth semester. Transfer students must complete a minimum of 60 credits at Saint Joseph's University.

Satisfactory academic progress at Saint Joseph's University requires students to earn a minimum of 24 credits in at least eight courses in each academic year, beginning in September and ending in August.

It is the policy of Saint Joseph's University to allow for a ninth and sometimes a tenth semester if significant reasons or a change in major justify such an extension. Permission for a ninth or tenth semester will ordinarily be obtained from the associate academic Dean of the appropriate college. The Deans of the Colleges reserve the right to consider special cases differing from the above statement.

Students who receive federal, state, or University aid need to maintain satisfactory academic progress in order to keep their eligibility. Evaluation of a student's academic progress to determine financial assistance eligibility will be made at the end of the spring semester. Students not meeting criteria for satisfactory progress will be informed in early summer that their current academic record disqualifies them for financial assistance.

Students should not assume that Saint Joseph's University will recommend and/or award financial assistance for more than eight semesters. Students intending to complete their degree program in more than eight semesters should first consult with the appropriate academic Dean and the Student Financial Services Office.

In addition to the quantitative parameter of 24 earned credits within each academic year as a requirement for retaining financial assistance, Saint Joseph's University also adheres to the qualitative parameter defined as follows:

Utilizing the academic probation structure as described in this catalog, the recommendation of the Board on Student Academic Review (BOSAR) and approval of the appropriate Dean to impose an academic dismissal on a student automatically includes the termination of financial assistance by Saint Joseph's University. Under no circumstances will a student be eligible for financial assistance beyond the second consecutive academic probation.

Academic dismissal is mandatory if the student has not achieved the required cumulative grade point average at the end of the second academic probation. The Board on Student Academic Review (BOSAR) may recommend the continuation of a second academic probation only for a student who has completed six semesters of study or for a student who has changed their major during the second probation. Academic dismissal may also occur after the first probation if sufficient improvement in studies has not been shown. In rare instances academic dismissal may be given without any previous probation if the student's academic standing is so poor that academic probation would not be in the student's best interest.

The qualitative parameter for financial assistance is linked to the academic dismissal procedures of the Saint Joseph's University. Since these judgments involve issues of academic qualifications and performance as well as federal and state regulations concerning financial assistance, decisions about the loss of financial assistance will be made jointly by the Student Financial Services Director and the appropriate academic Dean, acting on the recommendation of the Board on Student Academic Review (BOSAR).

Degree Completion Program Policies

Degree completion students (those pursuing a BBA or BLS degree) must adhere to all policies outlined in Undergraduate Policies (p. 20), with some additions outlined below.

Second Degree Candidates

Students who have earned a bachelor's degree in a program that required a minimum of 120 credits from a previous college or university may pursue a second undergraduate degree through a degree completion program. These students are required to complete a minimum of 30 credits at Saint Joseph's University, including any general education requirements not yet satisfied and a minimum of 12 upper division credits in their major, unless specifically waived by the appropriate Department Chairperson or Program Director.

Second Major

Students may request permission to pursue a second major for sound academic reasons. Such a request requires the approval of the Advising Office and Department Chairperson or Program Director for the major. The student must meet all the prerequisites and other requirements for both majors. The final transcript, not the diploma, will record the completion of the second major. The degree granted will be the degree appropriate to the primary major. Two separate degrees will not be awarded to students who complete a second major.

A Student whose primary major is Business Administration is not permitted to declare a secondary major in another business discipline.

Likewise, a student whose primary major is in a business discipline other than Business Administration is not permitted to declare a secondary major in Business Administration.

Minors

Bachelor's degree students may pursue a minor or multiple minors. Approval from the Department Chairperson or Program Director for the minor is required. At least one-half of the courses required for the minor(s) must be completed at Saint Joseph's University. More information about minor options and requirements can be found under the Undergraduate Day Programs section of the catalog.

A Student whose major is Business Administration is not permitted to declare a minor in another business discipline. Likewise, a student whose major is in a business discipline other than Business Administration is not permitted to declare a minor in Business Administration.

Student Deactivation

After two years of non-attendance, degree completion students are deactivated and are required to apply for readmission if and when they decide to return to their studies at Saint Joseph's University. Students are subject to all curricular requirements at the time of readmission.

Leave of Absence (LOA)

Students may request a leave of absence for up to two years. After two years, a student will be deactivated and will be required to re-apply to be considered for readmission to a degree completion program. Students are required to submit a completed Leave of Absence form to their Advising Office.

Withdrawal from the University

A student may withdraw from Saint Joseph's University provided any indebtedness to Saint Joseph's University is settled, and they are not liable for dismissal because of an academic violation or disciplinary action. Students are required to submit a completed Withdrawal from University form to their Advising Office.

Satisfactory Academic Progress

Satisfactory Academic Progress (SAP)

Degree completion students who are receiving federal, state, or University aid are required to maintain satisfactory academic progress (SAP) and also meet the Minimum Requirements for Retention in order to keep their financial aid eligibility.

Satisfactory academic progress (SAP) is reviewed after the spring semester each academic year. Both cumulative GPA and the ratio of credits earned to credits attempted are used to determine academic progress. Students who do not meet the criteria for satisfactory academic progress will be informed at the end of each spring semester that their current academic record disqualifies them for financial assistance. These students will be given the opportunity to file an academic plan with the Dean's Office to be considered for financial aid for the coming academic year.

Students must maintain the following minimum cumulative GPA for satisfactory academic progress (SAP). These standards are in accordance with the Academic Probation Policy.

- 1.8 cumulative GPA up to 60 credits earned
- 1.9 cumulative GPA for 61-90 credits earned
- 2.0 cumulative GPA above 90 credits earned

In addition to maintaining the required GPA, degree completion students must earn a passing grade in a minimum of 67% of overall credits attempted in order to be considered as making satisfactory academic progress. For example, if a student registers for 12 credits/four courses, the student must earn a passing grade in at least three of these courses to meet this requirement. Withdrawals are considered when calculating the ratio of credits earned to credits attempted. Although withdrawals do not impact grade point average (GPA), they do negatively impact the measure of satisfactory academic progress.

Students not achieving satisfactory academic progress (SAP) based on the above criteria must submit an academic plan explaining the circumstances that led to the failure to meet the standards and the changes that will allow the student to be successful. The student should identify and provide documentation of any extenuating circumstances (e.g., loss of job, a major financial life event, personal illness, illness or death of family member, or other special circumstances) that may have hindered their ability to achieve satisfactory academic progress (SAP). The appropriate Associate Dean will review plan to determine if the student will be allowed to continue to receive federal financial assistance. For a student's academic plan to be considered, it must be submitted by the first day of classes of the traditional full-term semester for which the student is requesting federal aid.

Probation & Dismissal

Minimum Standards for Retention

Degree Completers and Associate Degree students are permitted to take courses at a rate that is appropriate and convenient for them, normally without incurring any penalties for delay in completing degree program requirements. Students pursuing Teacher Certification, however, are required to complete their certification within the time stipulated in departmental regulations. Grades for Degree Completers and Associate Degree students are reviewed at the end of the fall, spring, and summer semesters. Students with a Saint Joseph's University cumulative grade point average below 2.0 will be reviewed by the Undergraduate Adult Learner Academic Review Board, which could lead to a recommendation for academic probation, suspension, or dismissal. Saint Joseph's University grade point average is calculated by dividing quality points by GPA hours for courses completed at Saint Joseph's University. Failures are calculated into the GPA, but withdrawals are not. PLS and HDC students who, after attempting their first 12 credits at Saint Joseph's University, and have a cumulative grade point average below 1.0 will be recommended for academic dismissal. They will be informed of the relevant policies, including the right to appeal their dismissal to the Undergraduate Adult Learner Academic Review Board. Please see the section on Academic Dismissal for additional information.

Academic Probation

Degree Completers and Associate Degree students who are not achieving satisfactory academic progress according to the standards listed above (i.e., cumulative GPA <2.0) will be placed on academic probation. Students who have a GPA above a 2.0 but below a 2.25 will be given an academic warning. When on academic probation, a degree seeking student may be given 1-2 semesters, maximum of 15 additional credits, to raise their GPA to the required 2.0 standard. In

extraordinary cases, one additional semester of probation may be granted if the improvement during the first probationary period indicates that the student will probably reach the necessary level by the end of an additional probationary semester. If the student does not raise their GPA to the required level within this timeframe, they will be subject to dismissal. Post-Baccalaureate Certificate students who are placed on academic probation will have up to six additional credits or one semester to raise their GPA to 2.0. If the student does not raise their GPA to the required level, they will be subject to dismissal. PLS and HDC students placed on probation are required to meet with their advisor, and in some instances, the Associate Dean at the beginning of each semester to review their academic schedule and discuss a plan for success. Students on academic probation may have a variety of conditions placed on them. These conditions include, but are not limited to the following:

- Registration may be limited to a maximum of two courses per semester, unless full time enrollment is required for financial aid or other reasons.
- Required consultation with an advisor prior to registering for courses for the following semester.
- Enrollment in the INT101 Learning Strategies course
- Attainment of a minimum term GPA required to return to good academic standing.
- Any other appropriate remedial measures that will help ensure the student's academic success.

Students may lose their financial aid if they do not attain the required GPA after being placed on probation. In rare instances, the loss of financial aid may be stipulated without any previous probation if the student's academic standing is so poor that academic probation would not be in the student's best interest. Since these judgments involve issues of academic qualifications and performance, as well as federal and state regulations concerning financial aid, decisions about the loss of financial aid will be made jointly by the Director of Student Financial Services and the appropriate Associate Dean acting on the recommendations of the Undergraduate Adult Learner Academic Review Board. Please see Satisfactory Academic Progress and Financial Aid for additional information. Students on probation making inquiries must address them to the Director of Advising for PLS or HDC. For further information regarding financial aid, please contact the Office of Financial Aid.

Academic Suspension

A student who is showing slow improvement in their level of performance or rate of progress during the period of probation may be subject to academic suspension by the appropriate Dean on the recommendation of the Undergraduate Adult Learner Academic Review Board. While a student is usually granted at least one academic probation before suspension, the Undergraduate Adult Academic Review Board may recommend academic suspension without any probation when the student's cumulative grade point average is so low that it is determined academic probation would not be in the student's best interest. A student placed on suspension by the appropriate Dean may return to Saint Joseph's University only after being away for at least one semester but not more than two academic years. If a student wishes to return after two years, the student will be required to reapply for admission.

Academic Dismissal

A student who fails to make sufficient improvement in their level of performance or rate of progress during the period of probation, or after returning from suspension, may be subject to academic dismissal by the appropriate Dean. While a student is usually granted at least one

academic probation or suspension before dismissal, the Undergraduate Adult Learner Academic Review Board may recommend academic dismissal without any probation or suspension when the student's cumulative grade point average is so low that it is determined academic probation and/or suspension would not be in the student's best interest. When dismissal is recommended, the student will be informed of the relevant policies, including the right to appeal their dismissal to the Undergraduate Adult Learner Academic Review Board. Students who appeal the recommendation for academic dismissal must do so in writing within ten business days of the date of their dismissal letter from the Dean. The Undergraduate Adult Learner Academic Review Board will consider extenuating circumstances that may have entered into a student's situation and will decide whether and under what circumstances the student may be readmitted. If readmitted, the Undergraduate Adult Learner Academic Review Board may recommend the student be placed on academic probation for the next semester or serve a suspension period before returning to their studies. A student may also be dismissed or suspended from the University under the provisions of the Academic Honesty Policy. Please see Academic Honesty Policy section.

Readmission Following Withdrawal or Dismissal

Students seeking readmission who have voluntarily withdrawn from the university are required to reapply to the university after a two-year absence, following all of the requirements for readmission into their desired program. Students who have been dismissed from either the Degree Completion, Associate Degree or Certificate programs due to failure to meet academic standards or because of an academic integrity violation will not be reconsidered for readmission into an undergraduate program at Saint Joseph's University.

Graduate Policies Academic Policies Academic Standing

Good Academic Standing is defined as students enrolled in master's or non-degree programs who maintain a 3.00 or above cumulative grade point average, as calculated at the end of the fall, spring, and summer terms.

Course Load

Full-time graduate students are those who enroll for six or more credits each semester. Half-time graduate students are those who enroll for at least three credits, and fewer than six credits each semester. A student who is employed full-time is encouraged to take six credits (two courses) each semester, and must receive permission from the student's Graduate Program Director before registering for nine or more credits (three or more courses) each semester.

Course Overload

Requests to enroll in 15 credit hours (five courses) in a fall or spring semester from a full-time graduate student with a cumulative grade point average (GPA) below 3.50 will not typically be approved. All graduate course overloads must be approved by the Graduate Program Director and Associate Dean. No overload requests will be considered for the summer term. Certain graduate programs restrict students from registering for more than nine credit hours (three courses) in the summer

terms. Students enrolled in a first semester of graduate study are not granted permission to take course overloads.

Course Repeat

A graduate student may voluntarily repeat one course while enrolled in a program, and it can only be a course in which a grade of C or below was received. The course may be repeated only once. Students who are placed on academic probation may be required to repeat one or more courses as part of their plan for reinstatement to good academic standing—see policy on Levels of Academic Progress, Probation, and Dismissal. Courses that students are required to repeat as part of their academic probation or reinstatement do not count as “voluntarily” repeated courses. When a course is repeated, both the original and repeated grade appear on the academic record; both grades will be used in calculating the grade point average. Course credit may be applied toward degree requirements only once, even if a course is repeated.

Time to Completion

Each student is expected to make academic progress toward the degree or certificate to remain in good standing. After the establishing of degree candidacy, a maximum of five years will be allowed for the completion of the degree requirements. Under extenuating circumstances, a student may request an extension of this time frame.

Students who exceed the time limit to complete their program will be dismissed from the program.

Haub School of Business

Students enrolled in the MBA or MS programs have six years to complete their MS degree from Saint Joseph's University. This six-year limit begins with the student's first core course. Extensions beyond this limit may be made only with the approval of the Program Director, and only for unusual and serious circumstances.

Students who exceed the time limit to complete the MS Program will be dismissed from the program. Such students must reapply for admission into the program as new students and start the program with no credit from previous courses taken.

Concurrent Degrees

Graduate students may enroll in two graduate degree programs concurrently and up to 12 eligible credits may be shared for double counting towards each program. For example, for a student enrolled in two programs “A” and “B”, program A may accept up to 12 credits that may be shared with program B, and program B may simultaneously accept up to 12 credits shared with program A.

Departments and programs may impose more stringent requirements for their dual degree programs. A degree program may overlap with only one other program for the purposes of credit sharing. Credits may never be used for three or more programs. Students can only apply for credit sharing for courses taken at Saint Joseph's University for programs for which they are currently enrolled and the dual-degree policy does not apply to degrees that have already been conferred.

In the event that a student leaves the program before completion of the dual degrees or is dismissed from one of the programs in the dual degree program, the student must fulfill all of the requirements of the degree program they wish to complete. Students will receive separate diplomas for each degree program. The degrees may be awarded concurrently or separately, as each is completed. In addition, all standard

policies relating to time to degree, residency requirements, academic standards, and minimum GPA required to graduate apply to any dual degree arrangement.

Second Degree

Students who have earned one graduate degree may request permission to return to study for a second graduate degree. This is the awarding of two distinct credentials. Furthermore, the individual must formally apply and be accepted for admission to the second graduate program and must obtain that program's approval for the course(s) to be accepted from the other degree. Finally, any specific requirements beyond coursework in the second program must be completed.

Candidates for a second degree must meet all standard degree requirements. Credits applied toward a first degree may be applied toward a second degree, as if the candidate were a transfer student, but additional credits must be successfully completed for a second degree. Please see the Graduate Transfer Credit Policy (p. 15) for transferable credit amounts.

For example, if a student completes a 30-credit graduate degree, and then returns for a second 30-credit graduate program, they may apply up to 8 credits from the first program towards the second program, with the approval of the program's director.

Grievance Procedure

Students who have a concern regarding an academic matter may seek assistance. The procedure for resolving academic program concerns (see note of grade appeal process below) begins with the course instructor. A student who has a concern about a final course grade should first consult the grade appeal process in the following section. If the student is not satisfied with the response or resolution achieved at this first level, or if speaking with the faculty member presents a conflict of interest for the student, the student should proceed to speak with their Graduate Program Director. If the student is not satisfied with the response or resolution achieved through the Graduate Program Director, the student should proceed to speak with the Department Chairperson. If the student is still not satisfied with the response or resolution achieved through the Department Chairperson, or if speaking with the Department Chairperson presents a conflict of interest for the student, the next step is to request a review of the concern in writing to the Associate Dean. All requests to present a concern to an Associate Dean must be first summarized in writing in the form of a petition by the student and submitted. A decision on a grievance by the College Dean represents a final level of review. During all stages of the process, the Graduate Program Director or representative designated by the Dean's Office will serve as the point of contact for the student filing the complaint.

Appealing a Course Grade

The instructor for a course has the responsibility for setting the requirements for a course and making an evaluation of students' work. Once a grade has been given, the instructor is not free to change the grade unless the instructor indicates to the Registrar that an error was made in the original grade transmitted. If a student believes that an error has been made, they must take the initiative in bringing about the necessary correction before the conclusion of the semester or immediately following the semester in which the course was taken. The typical procedure for requesting a correction would be through direct discussion between the student and the instructor. If redress cannot be attained through such discussions, the student may next

appeal to the Graduate Program Director. If resolution cannot be attained through appeal, the student may next appeal in writing to the Department Chairperson. All requests to present a concern to an Associate Dean must be first summarized in writing in the form of a petition by the student and submitted.

Leave of Absence (LOA)

Under special circumstances (illness, family hardship, work or military service, etc.), a student may request a leave of absence from their graduate program. An approved leave of absence does not automatically cancel a student's registration for courses. If the student has active registrations for the term(s) included in the approved leave of absence, a student must drop or withdraw their registration(s). Failure to do so will result in billing and assigned grades for the term(s). Students are not permitted to enroll at another institution while under a leave of absence status. The maximum time permitted for a leave of absence is two years. After a two-year period, the student will be deactivated and will be required to re-apply to be considered for reinstatement to a program. Students are required to submit a completed Graduate Leave of Absence form.

MSPAS students should consult the PA Student Handbook for all options for Leave of Absence or Temporary Separation.

Withdrawal from a Course/Courses

It is strongly suggested that students seek counsel from their Graduate Program Director or Advisor before submitting a course withdrawal. All withdrawn courses will be noted with a grade of "W" on the official transcript, and are not included in the grade point average calculation. Withdrawing from a course can have financial and academic implications that should be taken into consideration when making this decision. Changes in financial aid rules and veterans education benefits have further complicated the course withdrawal process; only trained representatives have the knowledge to help students make the best decision(s)—financially and academically.

Withdrawal from a Course/Courses for MSPAS Program

Students must advance sequentially within their cohort; therefore, individual course withdrawal is not allowed without automatically decelerating. Please see the Program Deceleration Policy (p. 353) for details regarding deceleration. All other course withdrawals effectively end matriculation in the program. For additional details, please see PA Student Handbook.

Withdrawal from the University

A student may elect to file a total withdrawal from a graduate program of study at Saint Joseph's University. The student must not have any outstanding tuition debt, and must not meet the conditions for dismissal due to an academic violation or disciplinary action. Students are required to submit a completed Withdraw from University form.

Administrative Withdrawal

Graduate students may be administratively withdrawn from Saint Joseph's University, after due notice, for an academic or disciplinary action or failure to satisfy overdue financial obligations or to comply with administrative requirements of Saint Joseph's University.

Readmission After Withdrawal or Dismissal

When seeking readmission, students who have voluntarily withdrawn from Saint Joseph's University or are no longer active due to prolonged absence from the University are required to reapply. Students should contact graduate@sju.edu for more information.

Students who have been dismissed from a Graduate Arts and Sciences program due to failure to meet academic progress or because of an academic integrity violation may not reapply to their previous program or any other graduate program offered by the College of Arts and Sciences.

Statistics Proficiency

All students in the MSBIA Program must demonstrate proficiency in statistics prior to the start of DSS 610 through an online learning module (ALEKS). Students with strong statistical background may test out. Students must complete 100% of the module before the start of DSS 610. Further details can be obtained from the MSBIA Program Director or the HSB Graduate Program Office.

Academic Probation and Dismissal

Academic Probation and Dismissal

Students in graduate certificate and master's programs are placed on academic probation when their cumulative GPA falls below 3.00.

At the end of each semester, the appropriate Graduate Office will notify the students who are either placed on academic probation or are academically dismissed via email. Probation notices will direct students to meet with their designated graduate advisor at the beginning of the probation period to create an academic performance improvement plan.

Graduate students placed on academic probation are given a maximum of two probationary semesters to raise their cumulative GPA to the minimum standard of 3.00.

Haub School of Business

The grading system in effect at Saint Joseph's University will apply to courses in master's programs. As per University guidelines for graduate study, a student enrolled in a master's program who receives a single grade of C or below for three credit hours will receive a warning letter. Students who receive a grade of C or below for six credit hours will be placed on academic probation and will be so notified in writing. Students who receive a grade of C or below for nine credit hours will be dismissed from the program.

Graduate students must fulfill all credit hour requirements for the master's degree. Each candidate for graduation must have at least a 3.0 cumulative GPA, no more than two grades of C, and no F grades outstanding in order to be certified for graduation. The student, with support from the Program Director and Student Records Offices, is responsible for monitoring their own academic progress throughout the course of the program.

Continued Academic Probation - Second Probation

When placed on academic probation, graduate students are given one probationary semester to raise their cumulative GPA. Graduate students are required to achieve required achieve an overall GPA of 3.00 to be taken off probation, regardless of progress made during the probationary

semester. Failure to do so will result in the student being placed on continued or second academic probation.

If the overall GPA remains below 3.00 after a second probationary semester, the student may be academically dismissed.

Students on academic probation may be asked to repeat the course(s) that caused the cumulative GPA to drop below 3.00. The course(s) should be taken within the next two semesters of enrollment after the academic probation status is applied. The Graduate Program Director will make this determination as part of the student's performance improvement plan.

Academic Dismissal

The University reserves the right to refuse the privilege of further attendance to graduate students who fail to meet minimum academic requirements with or without a probationary period.

The University also reserves the right to change the requirements for retention and graduation for graduate or doctoral students, and every candidate for a degree or certificate program shall be held in compliance with changes, as far as the remaining portion of their course of study is affected.

Certain graduate programs may have more stringent retention and dismissal standards. Students enrolled in these programs should consult with their program advisors for retention and graduation requirements.

College of Arts and Sciences

Master of Science in Psychology: Students enrolled in this program who receive two final course grades of C+ or below will be dismissed from the program.

Other Master's Degree Programs (M.A. & M.S.):

30-36 credits: Students enrolled in master's programs requiring between 30-36 credits who receive one final course grade of C+ or below for three graduate courses (nine credits) will be dismissed from the program.

42-48 credits: Students enrolled in master's programs requiring 42-48 total credits who receive four final course grades of C+ or below (or 12 credits) will be dismissed from the program.

School of Education and Human Development

Certificate Programs and Graduate Teacher and Administrative Certifications: Students enrolled in a certification bearing program requiring 16 or fewer credits who receive one final course grade of C+ or below will be dismissed from the program. Students enrolled in a certificate or certification program requiring 18-30 credits who receive two final course grades of C+ or below will be dismissed from the program.

School of Health Professions

See MSPAS Program Policies (p. 353).

Graduate Appeal of Academic Dismissal

A formal written appeal may be submitted to the Graduate Program Director by a student based on one or more of the following grounds:

- Violation of official policy or procedural error by academic or administrative personnel.
- Special mitigating circumstances beyond the student's control affecting the student's academic progress.

The following circumstances could prevent a student from satisfactorily completing a course:

- A severe illness or other debilitating condition.
- A student who is the primary care provider for a sick, injured, or needy person in family or friend circle.
- The death of a family member, friend, or someone in their relationship circle.
- The active duty service as a member of the National Guard or the armed forces of the United States.
- The change of the student's work schedule beyond the control of the student.
- Other good cause as determined by the Dean of the College or their designee.

Poor performance in coursework, poor work/study habits, missed deadlines, or change of major or concentration are not appropriate grounds for appeal. A student submitting an appeal based on mitigating circumstances is also required to provide specific evidence in support of the issue or event that impaired the student's academic performance.

The student must also provide objective documentation about the events and/or situations with respect to the subsequent impact on their learning.

Document Examples:

- Newspaper notice, copy of death certificate or obituary.
- Physician's letter explaining a medical condition and its effects or medical records.
- Photos, witness statements, copy of police report, etc.
- Court documents, bail documents, letter from a lawyer, police, reports, etc.
- Clinic notes, prescription receipts, and physician's notes are not considered sufficient documentation.

Students are not required to appear in-person for a formal appeal hearing.

Graduate Dismissal Appeals Process

First Level Review

Submitted academic dismissal appeal forms will be reviewed by the Graduate Program Director and Department Chair. The reviewers will make a decision to either recommend or reject the appeal. Recommended appeals will be forwarded to the second level of review. Appeals with a rejection status will be considered final, and the dismissal action will stand. The Graduate Program Director will notify the student in writing of the decision.

Second Level Review

If recommended for a second level of review by the academic department, an active appeal will be reviewed by the divisional Associate Dean. The Associate Dean will make a decision to recommend or reject the appeal for further consideration for the third level of review.

Third Level Review

The College of Arts and Sciences Graduate Appeals Reviews Committee headed by the Dean of the College constitutes the final level of review of an academic dismissal appeal. If an appeal is approved, the student may be considered for reinstatement to a graduate program with probationary standing.

If an appeal is denied, the dismissal action will stand. Students who have been dismissed from a Graduate Arts and Sciences graduate program

due to failure to meet academic standards or because of an academic integrity violation may not reapply to any graduate program within the College of Arts and Sciences.

Student Point of Contact During the Appeals Process

During all phases of the appeal review process, the student's Graduate Program Director will serve as the point of contact for the student. Students will be notified by letter about the outcome of their appeal.

Reinstatement

Students who are approved for reinstatement will be placed on academic probation and must return to good academic standing within one semester.

Students approved to resume their current program of study may be required to repeat the course(s) with earned grades that caused their cumulative GPA to drop below 3.00.

Additional conditions may be placed on students who have been approved for reinstatement including, but not limited to, referrals to learning resources support or tutoring, enrollment in the appropriate course(s), etc.

Reinstated students who fail to meet the specified criteria of the academic performance improvement plan, and/or do not achieve a cumulative GPA of 3.00 or higher, or who achieve a term GPA of below 3.00 during the probation term will be academically dismissed without possibility of a second appeal or reinstatement.

Academic Forgiveness

Undergraduate and graduate students who return following an absence of at least one calendar year may request academic forgiveness. If academic forgiveness is granted, each grade of C- or below for undergraduate students, and B- or below for graduate students will be eligible to be replaced with a grade of "AF". Courses with a grade of AF will no longer count for credit or be included in the GPA calculation. Additionally, the student's transcript will have a comment added denoting that academic forgiveness was granted in the applicable semesters. To apply for academic forgiveness, the student must submit a letter to the appropriate Dean explaining how they will achieve successful degree completion. This explanation may involve addressing the reasons for their poor original performance and lessons learned during their time away. Application for Academic Forgiveness must be completed at least 4 weeks before registration for courses. Please see application form (<https://sju.teamdynamix.com/TDClient/1942/Portal/Requests/ServiceDet/?ID=51080>) for additional details. (<https://sju.teamdynamix.com/TDClient/1942/Portal/Requests/ServiceDet/?ID=51080>)

Guidelines

- Students may only receive academic forgiveness once.
- Courses that a student withdrew from are not eligible for academic forgiveness.
- Once a student has been approved for academic forgiveness, the action is irreversible and final.
- Failing grades that result from violations of the Academic Honesty Policy cannot be changed under the terms of this policy.
- Federal guidelines allow Title IV Federal Financial Aid to be applied for only one retake of a course with a passing grade. Questions

related to financial aid eligibility following academic forgiveness can be directed to finaid@sju.edu.

- A student's Satisfactory Academic Progress is not impacted by academic forgiveness as it relates to federal, state, and institutional financial aid requirements. Please review the SAP policies relative to financial aid at sju.edu/sap (<http://sju.edu/sap/>).

Satisfactory Academic Progress

Satisfactory Academic Progress (SAP)

In addition to the academic levels of progress outlined in the Policy, graduate financial aid recipients are also required to meet the standards outlined in the Satisfactory Academic Progress (SAP) policy.

Satisfactory academic progress for financial aid recipients enrolled in degree programs is assessed annually at the conclusion of the spring semester. For eligible programs of one academic year or less, satisfactory academic progress (SAP) is evaluated at the conclusion of the fall and spring semesters. Failure to maintain satisfactory academic progress will result in cancellation of financial aid awards and the subsequent repayment of the funds already received.

Doctoral Policies

Academic Policies

Academic Standing

Good Academic Standing is defined as students enrolled in a doctoral program who maintain a 3.0 or above cumulative GPA, as calculated at the end of the fall, spring, and summer terms.

Course Registration

Doctoral students register for courses following the doctoral program curriculum. If students do not complete their progression milestones, including defending the dissertation, they will need to register for 899 doctoral research every fall and spring semester until they defend their dissertation or reach the maximum of eight years in the academic program (Ed.D. students have a maximum of ten years). Doctoral students are required to register for a minimum of one credit during their terminal semester. The terminal semester is defined as the semester in which the student completes all degree requirements, not the semester in which the student is to graduate. If the requirements are to be completed in the summer term, students should register for 1 credit.

Time to Completion

Each student is expected to make academic progress toward the degree or certificate to remain in good standing. Students who exceed the time limit to complete their program will be dismissed from the program.

Haub School of Business

The Doctor of Business Administration is a three-year program. If necessary, the dissertation research may be extended into a fourth year.

College of Arts & Sciences

Students enrolled in PhD programs in the Departments of Biology or Chemistry have eight years to complete their doctoral program. The time limit begins when the student enrolls in the doctoral program and begins their first course.

School of Education & Human Development

Students have a total of five years from the start of coursework to defend the dissertation proposal and ten years from the start of coursework to defend the dissertation and complete all degree requirements or be dismissed from the program.

School of Health Professions

Students enrolled in PhD programs in the Departments of Pharmaceutical Sciences have eight years to complete their doctoral program. The time limit begins when the student enrolls in the doctoral program and begins their first course.

Students enrolled in the Doctor of Pharmacy (PharmD) program have a maximum of six years to complete their program, once in the professional curriculum (P1-P4).

Grievance Procedure

Students who have a concern regarding an academic matter may seek assistance. The procedure for resolving academic program concerns (see note of grade appeal process below) begins with the course instructor. A student who has a concern about a final course grade should first consult the grade appeal process in the following section. If the student is not satisfied with the response or resolution achieved at this first level, or if speaking with the faculty member presents a conflict of interest for the student, the student should proceed to speak with their Program Director. If the student is not satisfied with the response or resolution achieved through the Program Director, the student should proceed to speak with the Department Chairperson. If the student is still not satisfied with the response or resolution achieved through the Department Chairperson, or if speaking with the Department Chairperson presents a conflict of interest for the student, the next step is to request a review of the concern in writing to the Associate Dean. All requests to present a concern to an Associate Dean must be first summarized in writing in the form of a petition by the student and submitted. A decision on a grievance by the College Dean represents a final level of review. During all stages of the process, the Graduate Program Director or representative designated by the Dean's Office will serve as the point of contact for the student filing the complaint.

Appealing a Course Grade

The instructor for a course has the responsibility for setting the requirements for a course and making an evaluation of students' work. Once a grade has been given, the instructor is not free to change the grade unless the instructor indicates to the Registrar that an error was made in the original grade transmitted. If a student believes that an error has been made, they must take the initiative in bringing about the necessary correction before the conclusion of the semester or immediately following the semester in which the course was taken. The typical procedure for requesting a correction would be through direct discussion between the student and the instructor. If redress cannot be attained through such discussions, the student may next appeal to the Program Director. If resolution cannot be attained through appeal, the student may next appeal in writing to the Department Chairperson. All requests to present a concern to an Associate Dean must be first summarized in writing in the form of a petition by the student and submitted.

Leave of Absence (LOA)

Under special circumstances (illness, family hardship, work or military service, etc.), a doctoral student may request a leave of absence

from their doctoral program. An approved leave of absence does not automatically cancel a student's registration for courses. If the student has active registrations for the term(s) included in the approved leave of absence, a student must drop or withdraw their registration(s). The maximum time permitted for a leave of absence is two years (Ed.D. students have a maximum of 3 semesters). After the maximum period, the student will be deactivated and will be required to re-apply to be considered for reinstatement to a program. Doctoral students should discuss the impact of a LOA on their institutional support if such funding is received. Students are required to submit a completed Graduate Leave of Absence form.

Withdrawal from a Course/Courses

It is strongly suggested that students seek counsel from their Program Director or Advisor before submitting a course withdrawal. All withdrawn courses will be noted with a grade of "W" on the official transcript, and are not included in the grade point average calculation. Withdrawing from a course can have financial and academic implications that should be taken into consideration when making this decision. Changes in financial aid rules and veterans education benefits have further complicated the course withdrawal process; only trained representatives have the knowledge to help students make the best decision(s)—financially and academically.

Withdrawal from the University

A student may elect to file a total withdrawal from a graduate program of study at Saint Joseph's University. The student must not have any outstanding tuition debt, and must not meet the conditions for dismissal due to an academic violation or disciplinary action. Students are required to submit a completed Withdraw from University form.

Administrative Withdrawal

Students may be administratively withdrawn from Saint Joseph's University, after due notice, for an academic or disciplinary action or failure to satisfy overdue financial obligations or to comply with administrative requirements of Saint Joseph's University.

Academic Probation and Dismissal

Students in doctoral programs are placed on academic probation when their cumulative GPA falls below 3.00.

At the end of each semester, the appropriate Graduate Office will notify the students who are either placed on academic probation or are academically dismissed via email. Probation notices will direct students to meet with their designated graduate advisor at the beginning of the probation period to create an academic performance improvement plan.

Graduate students placed on academic probation are given a maximum of two probationary semesters to raise their cumulative GPA to the minimum standard of 3.00.

The University reserves the right to refuse the privilege of further attendance to graduate students who fail to meet minimum academic requirements with or without a probationary period.

The University also reserves the right to change the requirements for retention and graduation for doctoral students, and every candidate for a

degree or certificate program shall be held in compliance with changes, as far as the remaining portion of their course of study is affected.

Certain programs may have more stringent retention and dismissal standards. Students enrolled in these programs should consult with their program advisors for retention and graduation requirements.

College of Arts and Sciences

PhD students who fail to maintain a cumulative grade point average of 3.00 or higher or receives a non-pass grade ("NP") in research from the Research Advisory Committee will be placed on academic probation. A doctoral student placed on academic probation because of a non-passing grade in research for two consecutive semesters or for any three semesters throughout the degree program will be dismissed from the graduate program. Students who fail to complete their program within 8 years may also be dismissed from the program.

School of Education and Human Development

Ed.D. students will be dismissed from the program for any of the following reasons: (a) students who do not meet a minimum of a 3.0 GPA after two semesters of academic probation, (b) students who receive the grade of C+ or lower in four or more classes, (c) students who do not defend their dissertation proposal within five years from the start of coursework, and/or (d) students who do not defend their dissertations within 10 years from the start of coursework. Students with a GPA of less than a 3.0 will not be permitted to sit for the comprehensive exam during their third year.

School of Health Professions:

PhD programs in School of Health Professions

PhD students who fail to maintain a cumulative grade point average of 3.00 or higher or receives a non-pass grade ("NP") in research from the Research Advisory Committee will be placed on academic probation. A doctoral student placed on academic probation because of a non-passing grade in research for two consecutive semesters or for any three semesters throughout the degree program will be dismissed from the graduate program. Students who fail to complete their program within 8 years may also be dismissed from the program.

Doctor of Physical Therapy

Doctor of Physical Therapy students must achieve a minimum grade of "B-" in all graded courses or a "Pass" in Pass/Fail courses in the professional phase of the curriculum in order to progress to any other course for which the completed course is a prerequisite. Grades below a B- are considered "Unsuccessful." Students who earn grades less than B- in two or more courses at any time in the professional curriculum will be dropped from the program and cannot reapply.

Students who do not pass a clinical experience may participate in the next clinical experience timeframe but will repeat the course in which they were unsuccessful.

Any student who does not achieve the minimum grade requirement in a didactic course in the professional phase of the program will not be permitted to progress in the professional curriculum. The student may be offered the opportunity to take the same course the following academic year. This situation will delay the student's progression for one year. The student should refer to the readmission policy in the Student Handbook and adhere to guidelines for submission of appropriate paperwork. Readmission is not guaranteed.

Doctor of Pharmacy

The expectations for student performance in the Doctor of Pharmacy program are more stringent than what is seen in undergraduate curricula. The following Academic Standards are in place to ensure successful completion of the Doctor of Pharmacy Program:

- The "C rule" for Doctor of Pharmacy students dictates that successful (satisfactory) completion of required non-elective PCP courses (with prefix PRX) is achieved by a minimum grade of "C". Pharm D students who achieve less than a "C" in a given course are given a second and final chance to demonstrate competency by retaking the course at its next offering.
- Since most professional courses are offered only once during an academic year, if a student requires a second attempt to be successful, most likely progression will be delayed and the student's graduation date will change. Students who are unsuccessful (i.e., achieve less than a C) the second time will be withdrawn (dropped) from the program. Students who are successful the second time will proceed with subsequent coursework.
- In the professional years of the PharmD program (i.e., P1-P4), students who achieve less than a semester GPA of 2.30 will receive a program probation. Students who exceed two program probations or do not complete program requirements within the maximum allowable residency time will be withdrawn from the program.
- All required PRX courses (except ESAR) must be successfully completed, including learning support reassessment expectations, before the start of the next semester in order to progress to the next semester.
- All ESAR courses, including learning support reassessment expectations, must be successfully completed before the start of the next academic year in order to progress to the next academic year.
- All StEPP requirements for each academic year must be completed by the end of the spring semester in order to progress to the next academic year.

Appeal of Academic Dismissal

A formal written appeal may be submitted to the Program Director by a student based on one or more of the following grounds:

- Violation of official policy or procedural error by academic or administrative personnel.
- Special mitigating circumstances beyond the student's control affecting the student's academic progress.

The following circumstances could prevent a student from satisfactorily completing a course:

- A severe illness or other debilitating condition.
- A student who is the primary care provider for a sick, injured, or needy person in family or friend circle.
- The death of a family member, friend, or someone in their relationship circle.
- The active duty service as a member of the National Guard or the armed forces of the United States.
- The change of the student's work schedule beyond the control of the student.
- Other good cause as determined by the Dean of the College or their designee.

Poor performance in coursework, poor work/study habits, missed deadlines, or change of major or concentration are not appropriate

grounds for appeal. A student submitting an appeal based on mitigating circumstances is also required to provide specific evidence in support of the issue or event that impaired the student's academic performance.

The student must also provide objective documentation about the events and/or situations with respect to the subsequent impact on their learning.

Document Examples:

- Newspaper notice, copy of death certificate or obituary.
- Physician's letter explaining a medical condition and its effects or medical records.
- Photos, witness statements, copy of police report, etc.
- Court documents, bail documents, letter from a lawyer, police, reports, etc.
- Clinic notes, prescription receipts, and physician's notes are not considered sufficient documentation.

Students are not required to appear in-person for a formal appeal hearing.

Dismissal Appeals Process

First Level Review

Submitted academic dismissal appeal forms will be reviewed by the Graduate Program Director and Department Chair. The reviewers will make a decision to either recommend or reject the appeal. Recommended appeals will be forwarded to the second level of review. Appeals with a rejection status will be considered final, and the dismissal action will stand. The Program Director will notify the student in writing of the decision.

Second Level Review

If recommended for a second level of review by the academic department, an active appeal will be reviewed by the divisional Associate Dean. The Associate Dean will make a decision to recommend or reject the appeal for further consideration for the third level of review.

Third Level Review

The College of Arts and Sciences Appeals Reviews Committee headed by the Dean of the College constitutes the final level of review of an academic dismissal appeal. If an appeal is approved, the student may be considered for reinstatement to a graduate program with probationary standing.

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Students who are approved for reinstatement will be placed on academic probation and must return to good academic standing within one semester.

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Additional conditions may be placed on students who have been approved for reinstatement including, but not limited to, referrals to learning resources support or tutoring, enrollment in the appropriate course(s), etc.

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Academic Forgiveness

Students who return following an absence of at least one calendar year may request academic forgiveness. If academic forgiveness is granted, each grade of C- or below for undergraduate students, and B- or below for graduate & doctoral students will be eligible to be replaced with a grade of "AF". Courses with a grade of AF will no longer count for credit or be included in the GPA calculation. Additionally, the student's transcript will have a comment added denoting that academic forgiveness was granted in the applicable semesters. To apply for academic forgiveness, the student must submit a letter to the appropriate Dean explaining how they will achieve successful degree completion. This explanation may involve addressing the reasons for their poor original performance and lessons learned during their time away. Application for Academic Forgiveness must be completed at least 4 weeks before registration for courses. Please see application form for (<https://sju.teamdynamix.com/TDClient/1942/Portal/Requests/ServiceDet/?ID=51080>) additional details. (<https://sju.teamdynamix.com/TDClient/1942/Portal/Requests/ServiceDet/?ID=51080>)

Guidelines

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Satisfactory Academic Progress

Satisfactory Academic Progress (SAP)

In addition to the academic levels of progress outlined in the Policy, doctoral financial aid recipients are also required to meet the standards outlined in the Satisfactory Academic Progress (SAP) policy.

Satisfactory academic progress for financial aid recipients enrolled in degree programs is assessed annually at the conclusion of the spring semester. For eligible programs of one academic year or less, satisfactory academic progress (SAP) is evaluated at the conclusion of the fall and spring semesters. Failure to maintain satisfactory academic progress

will result in cancellation of financial aid awards and the subsequent repayment of the funds already received.

CORNERSTONE CORE CURRICULUM (CCC)

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		

Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

First Year Course Requirements Rhetoric and Composition

The Jesuit tradition in higher education has long emphasized the virtue of *eloquentia perfecta*, the realized ability to communicate reasonably, responsibly, ethically, and with eloquence, through both speech and writing. In ENG 101, students will develop written and oral communication skills, learning how to compose effectively in a variety of formats for both academic and public audiences. Additionally, students will utilize rhetorical principles to engage in critical analysis of a range of texts by diverse authors across genres and mediums.

World History

The courses that count for the World History requirement examine the development of human societies in multiple places around the globe across extended periods of time. The focus on World History is consistent with training students to be global citizens, emphasizing the study of cross-cultural and global interactions. The courses that satisfy the World History requirement will involve a common assignment sequence that includes a library use/information literacy component, introducing students to academic research.

Students select one of the following three courses, each of which satisfies the World History requirement:

- Globalization in World History
- Empires in World History
- Movements in World History

Philosophy Requirements Philosophy Level One (one course; 3 credit hours)

The study of philosophy is central to Jesuit education. So too are the skills that philosophy cultivates, especially the ability to reason well and to appreciate rival perspectives concerning value and meaning.

All students take a Level One philosophy course (100s level designation), which serves as the pre-requisite for a second course (Level Two). Exactly one of a student's CCC philosophy courses must be ethics designated. So if a student takes a non-ethics Level One course, then their Level Two course must be ethics. If a student takes an ethics Level One course, then their Level Two course must be non-ethics.

If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level One and as a Mission Overlay course.

Philosophy Level Two (one course; 3 credit hours)

The study of philosophy is central to Jesuit education. So too are the skills that philosophy cultivates, especially the ability to reason well and to appreciate rival perspectives concerning value and meaning.

All students take a Level Two philosophy course (200s or higher level designation), for which their Level One course serves as a prerequisite. Exactly one of a student's CCC philosophy courses must be ethics designated. So if a student takes a non-ethics Level One course, then their Level Two course must be ethics. If a student takes an ethics Level One course, then their Level Two course must be non-ethics.

If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Theology & Religious Studies Requirements

Theology (one course; 3 credit hours)

Inspired by St. Ignatius Loyola, founder of the Society of Jesus, all Jesuit colleges and universities reserve a central curricular place for the study of theology. Theology courses help students to understand how Christian and Catholic traditions have developed over time, addressing both ethical and theologically fundamental questions. Students are required to take any course designated as CCC Theology.

If approved, such courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Religious Studies (one course; 3 credit hours)

Religious Studies courses prepare students to act as global citizens in a religiously diverse world and to understand the responsibilities and commitments of persons with different faith traditions. Students are required to take any course designated as CCC Religious Studies.

If approved, Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Religious Studies and as a Mission Overlay course.

Diversity & INT 151 Requirements

Diversity (one course; 3 credit hours)

Diversity courses may be offered by any department in the university. Students will have a mutually reinforcing educational experience with the 1-credit Inequality in American Society course by examining issues of diversity through the lens of a particular discipline.

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement.

Inequality in American Society (one course; 1 credit hour)

Inequality in American Society (INT 151) is a one-credit stand-alone seminar course required for all undergraduate day students in their first

two years. The course will be Pass/No Penalty. The purpose of the course is to help students learn about the intersection of racial, economic, and gender inequality and how to be an engaged citizen in response.

This course may not count for any other CCC requirements. This course must be taken in the first two years.

Math & Natural Science Requirements

Mathematics (one course; 3 or 4 credit hours)

Mathematics is a discipline that involves the study of numbers, patterns, relationships, and structures and provides the tools and language for describing natural phenomena in precise terms. It provides a foundation for logical thinking, problem-solving, and quantitative analysis across various disciplines.

Students take one approved course – three credit hours or four credit hours – offered by the Math Department. If approved, courses may count toward overlay requirements.

Natural Science (one course; 4 credit hours)

Natural Science courses promote scientific literacy through the study of fundamental scientific principles and concepts, the method of scientific inquiry, and the role/application of science in everyday life. Students study nature and the interactions that humans have with it including creating new materials, engineering products deemed useful to humans, and recognizing the impact of human activities on the natural world including human life.

All courses that satisfy the Natural Science requirement are four credit hours (with roughly six contact hours per week). Courses may take the form of a lecture course plus a lab section, or a more integrated experiential format in which lecture and lab are combined during the same meeting times.

Information about lecture-lab courses designed for non-science majors can be found by clicking [HERE](https://www.sju.edu/offices/academic-admin/gep/sciences-courses/) (<https://www.sju.edu/offices/academic-admin/gep/sciences-courses/>).

If approved, Natural Science courses may count toward overlay requirements.

Social Science Requirement

Social Science (one course; 3 credit hours)

Courses that count for the Social Science Course Area requirement introduce students to methods for analyzing human behavior at the individual, group, or societal levels. Students learn theoretical approaches for studying human behavior, as well as the methodologies used to gather social scientific data and craft interpretive arguments from that data.

Approved courses may be offered by the following departments or programs:

- Economics
- Education

- Linguistics
- Political Science
- Psychology
- Sociology

If approved, such courses may count toward a student’s overlay requirements.

Non-Native Language Requirement

Non-native Language (one course; 3 or 4 credit hours)

Non-native language study is an important component of a liberal arts education and prepares students for participation in a diverse and multicultural world. Students must take one course though a second course (in sequence) fulfills a student’s Mission Overlay requirement.

Placements in language courses are based on the student’s high school record and score on the SJU placement test. A student must take the course(s) in which s/he was placed in order for those courses to satisfy the GEP language requirement. Level changes for foreign language classes will be considered only in extraordinary situations. If a student believes that they cannot successfully complete the course in which they were placed, the student in most instances will not be permitted to change to a lower level. The only alternative is for the student to begin a new language.

A single course may not count as an overlay course but a second language course fulfills a student’s Mission Overlay requirement.

Literature Requirement

Literature (one course; 3 credit hours)

Analyzing literary works that are rich with ambiguity and potential develops more refined critical sensibilities, working against formulaic or conventional habits of thought. In this way, the study of literature contributes not only to critical thinking skills but cultivates the central Ignatian value of “discernment.”

Approved courses may be offered by the following departments:

- English, Writing, and Journalism
- Languages and Linguistics

If approved, Literature courses may count toward a student’s overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

Fine and Performing Arts, Creativity, and Design (one course; 3 credit hours)

Courses in this area engage students in the arts through their own creative products or their critical reflection on works of art, design, writing, music, theater, and/or film. Approved courses may be offered by the following departments:

- Art and Art History
- Communication and Media Studies

- English, Writing, and Journalism
- Music, Theater, Film

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student’s overlay requirements.

Overlay Requirements

Writing-Intensive (one overlay course)

Writing-Intensive courses build and refine student writing skills and prepare students to effective writers in their professional lives. Students have the opportunity to study and practice effective writing through a particular disciplinary lens.

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay (one overlay course)

Mission Overlay courses pursue one or more of SJU’s Jesuit, Catholic mission-based values. Students are required to take one overlay course from any of the following sub-categories:

- Ethics and Social Justice
- Faith and Reason
- Global Citizenship

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

While a student’s first Non-Native Language course may not double count as Mission Overlay, a student may take a second Non-Native Language course in sequence to satisfy the Mission Overlay requirement

CCC for Associate Degrees

The Cornerstone Core Curriculum for associate degree students applies to students who are completing an Associate of Applied Science degree (AAS) in Allied Health or an Associate of Science in Nursing degree (ASN). Students who are awarded an associate degree in Health profession are eligible to enroll in SJU bachelor degree programs under the Block Transfer policy.

Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
Philosophy Level One Ethics or Theology		3
Math & Natural Science Requirements		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3

Diversity**3****Total Hours****19-20**

CCC: Policies & Procedures

Double Counting

While some courses may double count for overlay requirements and a course area requirement, students may not count a single course for more than one course area requirement. Some courses may be approved for more than one course area requirement. In such a case, a student may count the course toward either requirement but not both. For example, a course that is both Diversity and Philosophy Level One certified may be counted as either Diversity or Philosophy Level One but not as both Diversity and Philosophy Level One (for the same student)

1. If approved, a Writing Intensive overlay course may double count for any course area requirement except for World History and Rhetoric and Composition
2. If approved, a Writing Intensive course may also count as Mission overlay course
3. If approved, a Mission overlay course may double count as any of the following course area requirements: Fine and Performing Arts, Creativity, & Design, Literature, Mathematics, Natural Science, Social Science

Some courses may count as either a course area requirement or a Mission overlay requirement but not both. For example, a course that is both Theology and Faith and Reason (Mission overlay) certified may be counted as either Theology or Mission overlay but not as both Theology and Mission Overlay (for the same student)

The following course areas may not double count as Mission Overlay courses (for the same student) even if such courses are approved as Mission overlay: Diversity, Philosophy Level One, Philosophy Level Two, Religious Studies, Theology

Advanced Placement

Saint Joseph's University awards credit for some Advanced Placement (AP) examinations. Credit is given only upon receipt of an official report from the College Board. The AP course credit may count toward the 120 credits graduation requirement. A score of 4 or 5 on certain AP exams may fulfill some Cornerstone Core requirements. Depending on the exam taken, course areas in which students may apply sufficient AP credit include:

- World History
- Rhetoric and Composition
- Fine and Performing Arts, Design, and Creativity
- Mathematics
- Non-Native Language
- Social Science
- Natural Science

Transfer Credit

For Block Transfer policies, please see the Block Transfer section under Transfer Credit Policies. (p. 15)

The following policies apply to other forms of transfer credit, including regular course transfers and study abroad:

- Transfer credit is not possible for the Inequality (INT 151) and Diversity course areas
- Philosophy, Religious Studies, and Theology course areas: Students may transfer credit from an approved study abroad program; or where there is a block transfer agreement in place; or approved transfer credit from another institution. A course in one course area – Philosophy, or Religious Studies, or Theology – may not satisfy any other core course area requirement.
- Transfer credit may be received for the overlay requirements and for other Cornerstone Core course area requirements, subject to the above course area restrictions

Overlay Requirements

There are two overlay requirements (p. 38), Writing Intensive and Mission.

The Mission overlay includes three sub-categories (any one of which satisfies the Mission overlay requirement)

1. Ethics and Social Justice, or
2. Faith and Reason, or
3. Global Citizenship

If approved, courses may count for both the Writing Intensive overlay and the Mission overlay. Overlay courses may count for some but not all course area requirements, as follows:

1. If approved, Writing Intensive courses may double count for any course area requirement except for World History and Rhetoric and Composition
2. If approved, a Mission Overlay course may double count as any of the following course area requirements: Fine and Performing Arts, Creativity, & Design, Literature, Mathematics, Natural Science, Social Science

Some courses may count as either a course area requirement or a Mission overlay requirement but not both. For example, a course that is both Theology and Faith and Reason (Mission overlay) certified may be counted as either Theology or Mission overlay but not as both Theology and Mission overlay (for the same student)

SPECIAL PROGRAMS AND RESOURCES

Student Resources

Center for International Programs

The Center for International Programs (CIP) at Saint Joseph's University is strongly committed to internationalization and globalization, both on our campuses and elsewhere. We provide information and services to students who wish to study abroad on a short-term or long-term academic program. We are also responsible for the implementation of new international education initiatives and the support of the University's International Travel Policy.

The Center for International Programs is located in the La Farge Student Residence, Suite 10 and the office hours are Monday through Friday, 9am to 5pm. Please visit the following website for more information: <https://www.sju.edu/offices/student-life/cip> (<https://www.sju.edu/offices/student-life/cip/>).

Student Disability Services

In accordance with Section 504 of the Rehabilitation Act of 1973 and the Americans with Disabilities Act (ADA) of 1990, the Office of Student Disability Services coordinates support services and recommends reasonable academic adjustments based on appropriate documentation and the needs of the student. The Office is responsible for promoting access to facilities and programs, ensuring equal educational opportunities, acting as an information and referral source, and serving as a liaison between faculty and student.

The office of Student Disability Services is located in:

Bellarmino G10
610-660-1339
TTY 610-660-1620
sds@sju.edu
Visit the website: www.sju.edu/sds/ (<http://www.sju.edu/sds/>)

Office of Student Success

By supporting students as they face obstacles associated with college life, the Office of Student Success assists students in making connections with campus resources and provides coaching on strategies for having a positive transition to college and an enjoyable experience at SJU.

Every SJU student is fully capable of earning a degree from Saint Joseph's University. At times, students experience difficulties: academic, emotional, social, health-related, family emergencies, and disciplinary actions. There are many resources on campus available to support our students, and the Office of Student Success is here to help.

The Office of Student Success is located in:

G10 Bellarmine Hall
610-660-2956
success@sju.edu
or visit the website www.sju.edu/studentsuccess/ (<http://www.sju.edu/studentsuccess/>)

Office of International Students and Scholars

ISS is responsible for meeting the needs of international students from the time they apply until they graduate. ISS serves as the primary advising office for non-academic issues for international students. Areas of assistance for international students include:

- Initial issuance of the I-20 form to apply for a student (F-1) visa
- Issuing the DS-2019 form to apply for an exchange visitor (J-1) visa
- Organizing orientation for international students and other cross-cultural activities
- Signing immigration documents for travel in and out of the United States
- Assisting with change of status applications to F-1 status
- Processing the immigration paperwork for off campus work permission requests
- Assisting international students in acclimating to SJU and Philadelphia

The Office of International Students and Scholars is located in the Campion Student Center, room 211, and is open Monday through Friday, 9am to 5pm. Please visit the website www.sju.edu/iss/ (<http://www.sju.edu/iss/>) or email internationalstudents@sju.edu for more information.

Veterans Services

The SJU Office of Veterans Services is dedicated to serving the unique needs of our veterans, spouses and family members. We are a nationally recognized "veteran friendly" university, as well as a full participant in the Post-9/11 GI Bill® and Yellow Ribbon programs. Our mission is to create a welcoming environment for veterans and their families, and to ensure veterans gain access to all eligible federal, state and local programs and services. We are located in Mandeville Hall, Suite 394. Additional information is available on our website at www.sju.edu/veterans/ (<http://www.sju.edu/veterans/>)

GI Bill® is a registered trademark of the U.S. Department of Veterans Affairs (VA). More information about education benefits offered by VA is available at the official U.S. government Web site at www.benefits.va.gov/gibill.

Writing Center

The Department of English, Writing & Journalism, in conjunction with the Office of the Provost, also supports The Writing Center, where students, faculty, staff, and alumni receive free assistance with their writing. The main center is in Merion Hall on the Hawk Hill campus, with additional locations in the Post Learning Commons on Hawk Hill and in Griffith Hall on the University City campus. Writers can choose from face-to-face and synchronous online appointments as well as asynchronous online (eTutoring) appointments. The Center is staffed by trained undergraduate peer tutors of all majors who assist writers at any level of expertise, in any stage of the writing process, from brainstorming and prewriting, to topic selection and focus, to drafting, revising, and editing. They work with any type of academic, personal or professional writing, including creative writing, group projects, slide share presentations, lab reports, resumes, cover letters, application letters for scholarships or graduate school, as well as personal statements.

Undergraduate students who are interested in becoming peer tutors apply to take ENG 345 Tutor Practicum, Writing Center Theory and Practice. The

Tutor Practicum course is open to students in any major. Applications for the course are available under the Employment tab on the Writing Center's website: www.sju.edu/writingcenter (<http://www.sju.edu/writingcenter/>).

Cooperative Education (Co-op)

Cooperative Education (Co-op) Overview

The Haub School of Business offers students in all business majors the option to participate in one of two Co-op programs: 1) the Haub School of Business Co-op program or 2) the Food Marketing, Pharmaceutical & Healthcare Business, and Healthcare Administration Co-op program. Both programs offer students the opportunity to gain one year of full-time work experience within the traditional four-year degree program.

Students who participate in Co-op engage in challenging, relevant, paid corporate work rotations; utilize work experience to determine career interests and selection of college major; gain first-hand knowledge of, and develop skills in, a profession; learn job search skills, such as resume writing and interview skills; develop a professional network—and advance professionally; earn between \$30,000 and \$60,000 across two work terms (\$18 to \$35 an hour); and become substantially more competitive job candidates by senior year—or often secure a full-time job offer through a Co-op employer.

The Co-op employment process is competitive. Students are not placed in jobs nor are they guaranteed jobs. Students must engage in an authentic job search and earn jobs based upon their education, previous experience, interview preparation/success, and fit for the role. The Co-op program offers extensive job search preparation for students, including: Co-op orientation; individual resume reviews; mock interviews; in-program student-to-student mentoring; and company information sessions.

The Co-op program maintains hiring relationships with established Co-op employers, some of which are proximate to campus and some of which require students to relocate for the duration of a Co-op work term. Students are responsible for their own transportation to and from work.

Co-op Program Work Terms

The Co-op program includes two full-time work terms: 1) fall of the sophomore year; and 2) spring/summer following the completion of junior year studies. Students may work for the same employer for both work terms or opt to work for different employers.

The first work term (mid-year sophomore year) is designed to provide students with exposure to a corporate environment, help them determine what is of interest to them professionally, and develop soft skills, such as: communication, teamwork, time management, motivation, and critical thinking.

The second work term is comparatively more in-depth, and allows students to participate in higher-level, more focused responsibilities that relate more sharply to their major field of study.

Students have three options for joining Co-op: 1) register as a first year and participate in both work terms (sophomore and junior); 2) register as a first year and participate in only the first work term (sophomore); 3) register as a sophomore and participate in only the second work term (junior).

Co-op Program Eligibility

To apply for admission to the Co-op program, and remain in good standing in the program, students must meet the following criteria:

- Be a full-time, undergraduate day student in the Haub School of Business.
- Be a United States veteran enrolled in the Haub School of Business.
- Have a minimum cumulative of GPA 3.0.
- Complete the first semester of the sophomore year before starting the first Co-op.
- Complete the junior year before starting the second Co-op.
- Attend the Co-op summer semesters to remain on track for four-year graduation.
- Be a first year, sophomore, or United States Veteran.

Co-op Program Application

Students who seek admission to the Co-op program must complete an application that is available through the Co-op office. Applications must be submitted by November 1. The Co-op program prefers to identify applicants by November 1 to assure they are advised properly prior to selecting spring semester courses, which typically occurs in mid-November. Admission to the Co-op program is not guaranteed; enrollment will be based upon student GPAs and the ratio of applicants to available jobs.

Co-op's Impact on Student Status, Tuition, Financial Aid and Housing

Student Status: During Co-op work terms, students are considered full-time students.

Tuition: Co-op students pay the same eight semesters of tuition as non-Co-op students; Co-op students pay summer semester tuition in lieu of paying tuition during the Co-op work terms, so tuition payments occur at different times for Co-op students.

Financial Aid: Co-op rarely impacts financial aid packages negatively, but all Co-op students are required to meet with a Financial Aid Counselor to discuss their specific financial aid situation as it relates to Co-op enrollment.

Housing: Students can reside in campus housing during Co-op work terms. Students can be released from their housing contracts, at no charge, during Co-op work terms for Co-op jobs that are not proximate to campus, as determined by the Co-op program and the Office of Residence Life.

Additional Information

Dr. Todd Krug
Co-op Program Director
610-660-1103
krug@sju.edu
Mandeville 150
<https://www.sju.edu/co-ops-internships> (<https://www.sju.edu/co-ops-internships/>)

Other Special Programs Fellowships

The Fellowships Office assists undergraduate students and recent graduates to apply for major fellowships, including awards for undergraduate study, study abroad, graduate study, and research internships. The Office works closely with fellowship applicants on every step of the application process, from deciding which fellowships to apply for to discussing the steps to take along the way. The mission of the Office is to help our students perform to the best of their ability and leverage their Jesuit education at Saint Joseph's University into service for others and transformative, life-long success for themselves. The Fellowships Office prioritizes the University's commitment to diversity, equity, and inclusion. Within the roster of scholarships and fellowships, there are several dedicated to expanding access to historically underrepresented groups. For more information, please contact fellowships@sju.edu or visit <https://www.sju.edu/offices/academic-admin/fellowships> (<https://www.sju.edu/offices/academic-admin/fellowships/>).

Service-Learning Program

Integral to the mission of Saint Joseph's University, Service-Learning challenges students to combine traditional academic coursework with community-based experiences. The student engaged in Service-Learning works in two classrooms, one here at the University and the other in the city of Philadelphia. Classroom lectures, texts, assignments, and critical reflection on social justice issues are enhanced by a community-based learning commitment through weekly volunteering or a mutually designed project with community partner schools and agencies that relate to course material.

Service-Learning courses are offered in all schools and colleges at the university. A unique First Year Service-Learning Program engages first-year students through a two-course sequence embedded in General Education courses for an entire academic year. Upper-class students can enroll in semester-long course offerings in their major, minor, or general education requirements. A team of staff and student leaders assist the faculty in the recruitment, placement, and orientation of students enrolled in Service-Learning courses. To learn more about the Service-Learning Program and a current list of open courses, please visit www.sju.edu/servicelearning (<http://www.sju.edu/servicelearning/>) or contact the Faith-Justice Institute.

The Washington Center Internship Program

Through The Washington Center for Internships and Academic Programs (TWC), Saint Joseph's University offers a unique experiential learning program for students interested in semester-long and summer internships in Washington D.C. TWC is a nonprofit, nonpartisan educational organization that provides integrated academic and work experience aimed at preparing students for careers in private, public, and related professions.

As participants in the program, students spend a semester or a summer in our nation's capital where they gain valuable career experience working as an intern, taking a class specific to their major and professional field of interest, and benefiting from personalized career readiness coaching, leadership development, and professional skill building, as well as access to a dynamic network of peers and professionals in Washington, D.C., all while retaining full-time SJU status. The program is especially

recommended to majors in the College of Arts and Sciences, and provides guaranteed housing in a state-of-the-art facility, and includes training in leadership and professional skill-building.

TWC offers a variety of internships through hundreds of private, public, and non-profit organizations, and students are able to choose from seven different professional tracks that cater to their interest and career aspirations:

- Advocacy, Service & Arts
- Business & Global Trade
- International Affairs
- Law & Criminal Justice
- Media & Communications
- Politics & Public Policy
- Science, Technology & Society

Recent SJU student internship placements include:

- Congressional Coalition on Adoption Institute
- GuidePost Strategies
- Kalik and Associates, Inc.
- Inclusive America
- SKD Knickerbocker
- RetireSafe
- BIED Society, Foreign Service Institute
- U.S. Marshal Service
- Potomac Associates
- and many private law firms, think tanks, lobbying firms, and congressional offices.

To learn more about The Washington Center Internship Program at SJU, contact Dr. Lisa A. Baglione and Dr. Katherine A. S. Sibley, the campus liaison/coordinators, at lbaglione@sju.edu, sibley@sju.edu, or visit <https://www.sju.edu/college-arts-and-sciences/washington-center> (<https://www.sju.edu/college-arts-and-sciences/washington-center/>).

Undergraduate Internship

Undergraduate internships may be either paid or unpaid and typically involve work experiences related to a student's major field of study. Students may be eligible to receive academic credit for an internship; however, they must first meet with their academic advisor, program director, or internship coordinator and complete any necessary application process—prior to securing the internship—to determine whether they satisfy their department or program's requirements (such as minimum GPA, enrollment status, and any necessary prerequisites). It is important to note that not all departments or programs allow internships to count toward academic credit.

4+1 Programs

Double Counting Policy

No more than 9 graduate credits should be double counted towards both an undergraduate and a Master's degree, for Master's programs requiring a total of 30 credits, with up to 15 total for programs requiring 36 or more credits. Please see the table below for details.

Only courses with a grade of B or higher will be double counted towards a Master's degree program.

Courses can only be double counted when a student moves immediately from the bachelors program into the masters program. For example, if a student graduates from their undergraduate program in the spring semester, then they must start their master's program in the next consecutive term that the program is available.

4 + 1 Programs outside the Haub School of Business

For program options and admission information click here (<https://www.sju.edu/academics/undergraduate/four-plus-one/>).

SJU undergraduate students are eligible to apply for select masters degrees as part of our 4+1 Program.

In this competitive work environment, having a master's degree can lead to higher-level positions, more responsibility and greater earning potential.

The 4+1 Program allows students to complete both a bachelor's and a master's degree in five years. Students share up to nine credit hours between their undergraduate and graduate degrees.

Here's how the 4+1 program works:

- Apply to the graduate program in your Senior Year – Here is the link to Apply (<https://admission.sju.edu/apply/?pk=GR>).
- The Graduate & Extended Studies Office will request your official transcript and your application fee will be waived.
- Work with your current undergraduate advisor and Graduate Program Director to determine which graduate courses to register for during your senior year.
- Earn your undergraduate degree and your master's degree in just 4+1 years.
- Graduate classes may be done on campus or online (varies by program).
- Enjoy the 10% Alumni tuition discount upon receiving your Bachelor's Degree.
- 4+1 offerings vary by program. Contact the Graduate Program Director of your interested program during the first semester of your Junior year to determine eligibility.

4 + 1 Programs at the Haub School of Business

For Admission Procedures click here (<https://www.sju.edu/admission/graduate-business/>)

SJU undergraduate students are eligible to apply for the MBA and Specialized Masters Programs as part of our 4+1 Program.

In this competitive business environment, having a master's degree can lead to higher-level positions, more responsibility and greater earning potential.

The 4+1 Program allows students to complete both a bachelor's and a master's degree in five years. Students share nine specific credit hours between their undergraduate and graduate degrees.

Here's how the 4+1 program works:

- Apply in your Junior or Senior Year – Here is the link to Apply (<https://admission.sju.edu/apply/?pk=GR>)

- The Graduate Business Office will request your official transcript and your application fee will be waived.
- Business undergraduate course can be used to waive foundation courses.
- Earn your undergraduate degree and your MBA in just 4+1 years
- Take up to nine credits in your senior year that can count toward your MBA
- Increase your value in a competitive marketplace and earn a higher starting salary
- Classes can be done completely online or on campus (All evening classes)
- Enjoy the 10% Alumni tuition discount upon receiving your Bachelor's Degree
- GMAT waived based on academic excellence and letters of recommendation from faculty
- Merit Scholarships are available

Academic Advising Undergraduate Advising

Undergraduate Advising for Full-Time Students

At SJU, academic advising responsibilities for traditional undergraduate students are shared between faculty advisors and the Undergraduate Advising Support staff. In this shared model, advisors and the advising staff have distinct roles in the advising process but work collaboratively to help students succeed academically, develop educational plans that are consistent with their life goals, and benefit fully from their college experience. Faculty advisors focus primarily on mentoring and academic/career planning related to the student's major. They also serve as mentors to guide the intellectual development of students. Undergraduate Advising Support provides generalized support for students including help with the transition to college, course registration, and general education course selection interpreting/understanding University policies and navigating university procedures.

Undergraduate Advising Support is an especially important resource for students during their transition to Saint Joseph's University and for help understanding the registration process. First-year students, in particular, are expected to participate in the academic portion of Orientation and other workshops designed for first-year students. These workshops cover topics like academic planning for general education courses, major requirements and registration procedures. Undergraduate Advising Support is the primary advising resource during the summer before transition to the faculty advisor in the first semester.

Incoming first-year and transfer students who have declared a major are assigned an advisor in their major. Incoming students who are undeclared are usually assigned an advisor in their division (e.g., Social Science, Humanities, Natural Science) or College (e.g., Haub School of Business, School of Health Professions, School of Education and Human Development). Once they have declared a major, these students are assigned to a faculty advisor in that major.

All students are encouraged to develop a relationship with their advisor and to meet with them throughout the school year. With exceptions for select majors in the junior and senior years, all students are required to meet with their advisors at least once each semester for guidance related to registration for the following semester and to obtain their PIN for registration. Students also are encouraged to meet with their advisors

at other times to review their academic progress and discuss plans for experiential education opportunities, graduate school, and/or careers.

In the second semester of junior year, students are expected to meet with their faculty advisor to review course requirements completed and course requirements not yet fulfilled for their bachelor's degree. This review is necessary to ensure that the proper set of courses will be taken in the senior year and that graduation can occur at the expected time. Although faculty advisors and Undergraduate Advising Support provide information and counsel, it is ultimately the student's responsibility to ensure that they have completed all of the requirements for their degree.

SJU Undergraduate Advising Support maintains two offices on the University's Hawk Hill campus: the William F. Leahy Advising Office in Mandeville Hall 150 and the Barbelin Advising Office in Barbelin Hall 117. Although we do not maintain an office on the University City (UC) Campus, we are available to meet with UC students via Zoom or phone. Students may direct questions to Undergraduate Advising Support at sjuadvising@sju.edu.

Undergraduate Advising for Part-Time Adult Learner Students

For most undergraduate adult learner students, advising is provided by professional advisors in Undergraduate Advising Support. The following majors are assigned a faculty advisor within their academic department: English & Professional Writing, Elementary Education PreK-4, and Child and Family studies.

The role of an advisor:

- Assist with orienting the student during their transition to Saint Joseph's University;
- Review how transfer credits will apply to degree requirements and assist with developing an academic plan for completing requirements for graduation;
- Inform students of scholarship opportunities and various campus resources that promote student success;
- Support students in long-range educational and career planning; and,
- Direct students to opportunities and resources that will enrich their education, including honor societies, internships, etc.

Advising appointments are available for all undergraduate adult learners, in-person or via email, zoom session or phone. The student is responsible for planning a program of courses that satisfies all degree requirements. Students are encouraged to review DegreeWorks and their curriculum worksheets carefully before selecting courses to make sure they have the prerequisites or proper background for each course. All students are encouraged to talk with an advisor to review course selections prior to registration each semester.

Undergraduate Advising - Lancaster Location

Undergraduate students at the Lancaster location are advised by professional advisors in the Undergraduate Advising Support Offices through a holistic developmental philosophy. Undergraduate students are assigned their advisor, based on their program of study, at the outset of their time at the University.

Through the advising process, advisors help students:

- Manage their transition to Saint Joseph's University
- Develop an academic plan to complete program requirements for graduation
- Assist students with interpreting and understanding academic policies, processes, and procedures
- Equip students with the tools and resources that are available to help them succeed
- Identify opportunities and services that will enrich their education

Note that graduate students and students enrolled in the Bachelor of Health Sciences degree program are assigned a faculty advisor within their program of study. Undergraduate students in the Nursing program are also assigned a faculty advisor at the outset of their clinical coursework. A student can find their advisor's name and contact information by viewing their Student Profile in the Nest.

Graduate Advising

Graduate Advising for the College of Arts & Sciences and School of Education and Human Development

The Graduate Program Director of each academic program is responsible for the academic administration of the unit graduate program(s) and academic advising and mentoring of students.

Graduate Advising for the Haub School of Business

Students enrolled in graduate-level programs such as MBA, MS or a Graduate Business Certificate may contact our advising team at sjumba@sju.edu. Please visit our website for more information: <https://www.sju.edu/offices/advising/centers/graduate-business-advising> (<https://www.sju.edu/offices/advising/centers/graduate-business-advising/>).

Health Programs Advising Preparing for Health Professions School

Students preparing to enter a doctoral level program in the health professions such as medicine or dentistry typically major in one of the natural sciences. It is also possible to major in humanities and social science areas and still fulfill the minimum requirements for all health professional schools, however students need to show proficiency in the natural sciences to be a strong candidate for admission. The minimum course requirements for most medical, dental, optometry, veterinary, and podiatry schools include one year each of biology, general chemistry, organic chemistry, and general physics, all with labs. Additionally, a semester of coursework in biochemistry, statistics, and calculus is strongly recommended or required by most health professional programs. Although schools establish these minimum science requirements for admission, it is strongly recommended that students take additional advanced level science courses to enhance their background and to show that they can manage advanced science work. Courses that explore the sociological, psychological, philosophical, and ethical aspects of healthcare delivery—the human dimension—are also strongly encouraged.

The Health Professions Advisory Committee reviews the credentials of students applying to health professional schools and provides the composite letter of evaluation from the University; further information can be found here (<https://www.sju.edu/offices/advising/resources/health-professions/>)

#_ga=226475655915340186191666036313-30951731666036313). Additionally, Brianna Metzger (bmetzger@sju.edu), Associate Director of Pre Health Advising, is available to counsel students on course selection, preparation for the standardized admission exams, and procedures to follow when applying to health professional schools.

Pre-Physician Assistant (Pre-PA)

Get a complete, real-world understanding of what it means to be a physician assistant at Saint Joseph's University. Students admitted to the "Pre-PA" pathway within the health sciences major will have the required prerequisites for the SJU PA program embedded in the curriculum. Students will be prepared for graduate education while also receiving a well rounded undergraduate learning experience. Students can earn two degrees in 5 years; a Bachelor of Science in Health Science (BSHS) and a Master of Science in Physician Assistant Studies (MSPAS).

Choose from an accelerated, three-year track or a traditional, four-year undergraduate track to earn a health science degree. If you meet all progression requirements inclusive of direct patient care hours and a completed application, you'll be granted an interview for admission to our graduate physician assistant program.

Refer to the Health Sciences program for curricular details and the Physician Assistant program for information about the MSPAS.

Honors Program

The Saint Joseph's University Honors Program seeks to produce well-educated, articulate citizens who exemplify the highest standards of academic, professional and personal achievement. The program offers an enriched General Education curriculum that broadens cultural interests, integrates knowledge, sharpens writing skills, and encourages student involvement in the learning process.

The curriculum is composed of intellectually rigorous courses that satisfy both General Education and major requirements. Many Honors courses are interdisciplinary team-taught courses in the arts, sciences, social sciences, and business.

Honors Recognition

Successful completion of the requirements for University Honors is noted on the student's academic transcript.

Recognition of completion of the College Honors thesis or Honors capstone course sequence is noted on the student's academic transcript at the course level.

Learning Goals and Outcomes

Goal 1: Students will pursue a program of study of interdisciplinary courses and courses offered in traditional disciplines.

Objective 1.1: Explore issues in a multiplicity of disciplines and integrate knowledge from those disciplines.

Objective 1.2: Demonstrate analytic and critical skills in examining literary, artistic, historical, philosophical, theological, sociological, political, scientific, legal, linguistic, or business texts.

Goal 2: Students will engage in rigorous thought, critical analysis, and synthesis in the context of problem solving.

Objective 2.1: Engage in independent scholarly or creative research, analysis, and synthesis that prompt them to invent written

arguments that reflect the acquisition of knowledge, insights, and skills.

Objective 2.2: Demonstrate confidence and clarity in speaking in classroom presentation, discussion, and debate that demand data gathering, analysis, and critical reflection.

Objective 2.3: Address topical, social, scientific, cultural, or business issues either inside or outside the classroom, and propose original, creative, and enduring solutions to real world issues and problems.

Objective 2.4: Engage in self-reflection and self-evaluation to promote intellectual self-confidence or spiritual humility.

Goal 3: Students will produce a scholarly or creative project or capstone experience under the guidance of members of the Honors faculty.

Objective 3.1: Engage in independent scholarly or creative research, analysis, and synthesis that prompt them to invent written arguments that reflect the acquisition of knowledge, insights, and skills.

Objective 3.2: Explore aesthetic dimensions in creative works – stories, poems, plays, paintings, sculpture, architecture, film, and music – and learn the style, perspective, and techniques of a major artist or movement.

Goal 4: Students will create an intellectual environment through scholarly, creative, social, cultural, or business activities.

Objective 4.1: Engage in independent scholarly or creative research, analysis, and synthesis that prompt them to invent written arguments that reflect the acquisition of knowledge, insights, and skills.

Objective 4.2: Explore aesthetic dimensions in creative works – stories, poems, plays, paintings, sculpture, architecture, film, and music – and learn the style, perspective, and techniques of a major artist or movement.

Objective 4.3: Address topical, social, scientific, cultural, or business issues either inside or outside the classroom, and propose original, creative, and enduring solutions to real world issues and problems.

University Honors Requirements Membership in the University Honors Program

Membership in the University Honors Program is by invitation of the Honors Director prior to the student's first semester at the University.

University Honors Program

Graduation with University Honors requires successful completion of a minimum of eight Honors courses as part of the regular undergraduate degree requirements and a minimum cumulative GPA of 3.5. Two of those courses will comprise a College Honors thesis or Honors capstone sequence.

Requirements:

Successful completion of University Honors requires at least eight Honors courses. Students typically schedule Honors coursework in each

of their eight semesters, although adjustments may be made to this schedule on the advice of the Honors Director.

The following further restrictions apply to the minimum eight-course requirement:

- At least two courses must be team-taught interdisciplinary Honors courses.
- Two courses must comprise the mandatory College Honors senior thesis or Honors capstone sequence.
- Students will select their four remaining Honors courses from those offered and approved by the Honors Program. These may include Honors team-taught courses.

To remain in the Honors program, students are expected to maintain a 3.50 GPA, which is the minimum required for graduation with University Honors. Students whose GPA is below 3.50 are subject to removal from the Honors Program. Honors students should also, on average, take one Honors course per Fall and Spring semester after entry into the Honors Program. Falling behind by more than Honors one course may lead to removal from the program.

Students are assigned an advisor from the department in which they declare a major. They should, however, consult with the Honors Director and Associate Director as needed to ensure that their course schedules are arranged in such a way as to integrate the fulfillment of university requirements with those of the Honors Program.

College Honors Requirements

College Honors

College Honors is a two-semester independent reading/research thesis or capstone sequence that is typically completed in the senior year, under the supervision of a faculty mentor. All Honors students have the opportunity to complete a College Honors thesis, which is administered by the Honors Program in coordination with faculty mentors. Individual departments and interdisciplinary programs may choose to offer students the alternative of a capstone sequence. University Honors students need only complete one College Honors thesis or capstone sequence, and may choose the major (or sometimes minor) department or program in which to complete that sequence. University Honors students should consult the College Honors Guidelines document on Canvas to determine the College Honors requirements/options in their major department or program.

Whether Honors thesis or Honors capstone sequence, College Honors will satisfy two of the eight Honors course requirements for completion of University Honors. In order to be eligible for College Honors, University Honors Program students must have a minimum overall GPA of 3.5 in all course work at the end of their junior year and must be on track for the completion of their eight required Honors courses for University Honors.

College Honors may be offered to non-Honors students who have a minimum 3.5 GPA. This will be at the discretion of the Honors Program and the department in which the Honors thesis or Honors capstone sequence will be conducted. College Honors is an optional experience for non-Honors students.

College Honors Capstone Overview and Procedures

The College Honors capstone sequence comprises two courses, often but not always taken in consecutive semesters, that are already part of a student's own major (or sometimes minor) program and are "upgraded" with additional work to become Honors capstones. Honors capstones are not always actual capstones in a major, as not every major has a formal capstone or capstone sequence. Honors capstones are instead determined by the department or program in consultation with the Honors Program, and many department or programs choose not to offer a capstone option. If there is no Honors capstone option offered by a particular department or program, a thesis is the only available path to College Honors in that particular department or program. Current Honors students should consult the College Honors Guidelines document on Canvas to determine their options. In some circumstances, an Honors Oxford Tutorial course may be able to substitute for a second capstone in programs with a capstone sequence that does not have a specifically designated second capstone course. Please consult the Honors Director for more on this option.

Students seeking to upgrade a course to become an Honors capstone should first consult with the instructor of their Honors capstone course option (as listed in the College Honors Guidelines document) in order to confirm that instructor's willingness to upgrade the course. If the instructor is willing, the student should register for the course when they register for other classes. In the semester prior to taking that course, or at the very latest by the end of the first week of class, each student should submit an upgrade approval form (<https://forms.sju.edu/advsupport/view.php?id=43377>), including a statement of additional work to be upgraded, and evidence of the mentor's willingness to upgrade the course. The successful completion of two such "upgraded" courses will complete College Honors.

College Honors Thesis Overview

Although not every program offers a College Honors capstone option, every Honors student in good standing is eligible to complete a College Honors thesis. The College Honors thesis should be original in its conception and analysis. This may mean the discovery of new knowledge, the reinterpretation of standard methods, theories and assumptions, or the formulation of data produced from fresh investigations. The College Honors thesis should be the result of serious research, original thinking and a clear understanding of the context in which this research is conducted. Students submitting a proposal for a College Honors thesis should provide evidence of background knowledge and requisite skills before they begin their work. Interdisciplinary projects involving the student's minor as well as major are encouraged, but these require the approval of the Honors Director and the Department Chairs of both the student's major and minor.

The College Honors thesis may take many forms: traditional narrative/analysis, in-depth study of specific texts or themes, empirical research, practical applications, or a creative/inventive endeavor. Projects involving empirical research should develop a coherent hypothesis, and test it professionally and systematically. Length may vary according to each subject; however, it is expected that the College Honors thesis will be substantial in scope, length, and bibliography, and that it will be documented in accordance with the standards of the relevant discipline and include an abstract, title-page, table of contents, introduction, notes and bibliography. It should generally be modeled after the work that would be done for a master's thesis in the same field or discipline.

(understanding that interdisciplinary projects may borrow elements from multiple fields or disciplines); projects designed solely, primarily, or substantially for publication in a campus student journal or newspaper are thus ineligible for the College Honors thesis. The final result will be shared in an oral presentation (the thesis "defense"), as well as in a written thesis, and should place the specific topic in a broader scholarly context by demonstrating familiarity with the authoritative literature and research on the subject.

College Honors Thesis Procedures and Deadlines

Below are the procedures for students who are planning to pursue the College Honors thesis. Current Honors students may find the timeline and deadlines provided in the College Honors Guidelines document available on Canvas.

By the end of their junior year, students should confirm with the Director of the Honors Program their intention to pursue the College Honors thesis. They will be expected to outline a general area of research and to name their primary mentor for the project. Students who plan to begin thesis work in the fall semester will be expected to remain in touch with their mentors throughout the summer months as they conduct preliminary research into their topics.

First semester of College Honors Thesis

By the end of the first week of class, each student must submit an approval form (<https://forms.sju.edu/advsupport/view.php?id=43377>), including a proposal outlining the project's general objectives, a bibliography, and a schedule of meetings to be held during the semester, as well as evidence of the mentor's willingness to supervise the thesis. (For examples of successful recent Honors thesis proposals, students should visit the Honors Canvas course page.) After approval, the registrar will be asked to create the first-semester Honors thesis course. After the creation of this course, the mentor should submit one of two initial Research Assessment forms: one for research (<https://forms.gle/F4JJD67YbBsBUS9h8/>) projects, or another for creative (<https://forms.gle/bNMC1TjAdQwiCM8a9/>) projects. During this first semester, each candidate, in consultation with their mentor, should also select a second reader for the thesis. The second reader may be from any department, and should have a compatible interest in the thesis topic. The second reader will serve to offer advice, criticism and suggestions throughout the process of the College Honors thesis. During this first semester, the Honors Director will also assign a member of the Honors Program Committee as a third reader of the thesis. These three faculty together form a thesis committee. The candidate must schedule a meeting with this committee that should take place before the last day of classes to present a clear progress report of the work completed and an outline of what lies ahead. This meeting is for the committee to learn about the project's current and planned state, to ask questions, and to give targeted, constructive feedback; it not open to the public or to other students. Finally, the mentor should submit a second mid-year research (<https://forms.gle/GG6Sv7mq8u4XMRRf6/>) or mid-year creative (<https://forms.gle/WnsZBwqUmug6zWqF7/>) Research Assessment form.

Second Semester of College Honors Thesis

The second semester of the College Honors Thesis culminates in an oral presentation (the thesis "defense") and formal submission of the written Honors thesis. By the end of the first week of class, each student must submit another approval form (<https://forms.sju.edu/advsupport/view.php?id=43377>), including an updated proposal and new evidence of the mentor's willingness to continue supervising the thesis. After

this form is approved, the registrar will create the second-semester Honors thesis course. Prior to midterm of the second semester, the candidate must present a first draft of the entire project to the mentor for critical review. In the final month of the second semester of thesis work - a week or more before the oral presentation discussed below - the candidate must submit a final draft to their mentor and the members of the thesis committee, including the second reader and the appointed representative from the Honors Program Committee. The candidate and mentor may also invite additional faculty members from related fields to the oral presentation, provided that those faculty members will also read the thesis. This presentation should occur by the last day of classes. Like the Fall presentation, this event is closed to the public. However, students are encouraged to present their work in other venues, including public lectures, conferences, and publications. As soon as possible, the date, time and location of this presentation should be posted in shared documents made available by the Honors directors. After the presentation, the mentor will complete a final research (<https://forms.gle/6vhZaA1hx5EEZKJA/>) or final creative (<https://forms.gle/FqJu1uoMig3pRdFS6/>) online Research Assessment form. The thesis committee should also sign a thesis cover sheet (available on Canvas). An electronic copy of the thesis, with signed cover sheet, should be sent in .pdf format to the Honors administrative assistant and both of the Honors Program directors no later than the conclusion of the examination period. This material must be filed with the Honors directors before recognition can be given at graduation.

Study Abroad/Tours Semester or Year Abroad

Saint Joseph's University has carefully selected 27 semester abroad program options in countries all around the world, including some programs with a Jesuit connection, programs with an experiential learning component such as an internship or service-learning, and options where SJU students can take classes alongside local students. Students should review all program options on the Center for International Programs (CIP) website (<https://www.sju.edu/offices/student-life/cip/>) and schedule an advising meeting with a CIP staff member (contact studyabroad@sju.edu) before beginning an application. Students are also encouraged to consider a full year of study abroad.

Petitioning for a Non-approved Program

Saint Joseph's University students who wish to attend a university or study abroad program that is not currently affiliated with or approved by SJU and therefore not recognized for academic credit must petition the Center for International Programs through the on-line application system. Please note that this is only an option for students who have specific academic needs that cannot be met by any of the current Saint Joseph's approved programs; petitions for programs that are largely duplicate to, or are in enrollment competition with, existing Saint Joseph's programs, reciprocal university exchanges, or recognized affiliated programs in the same city or country are not normally approved.

As part of the application process, students will be asked to request a recommendation from their Academic Advisor. Therefore, before preparing a petition, the student should consult with their Advisor to discuss their specific interest in study abroad and how the experience will fit into their academic program. This is also a good time to discuss possible course selection and planning. It is also suggested that the student discuss a backup plan with their Academic Advisor (and the Study Abroad Advisor) in case the petition is not approved. A committee reviews completed petitions and makes a recommendation to the CIP

to either approve or reject the petition on a first come, first served basis. Petitions are judged on the merit of the student's academic objectives in relation to specific study abroad opportunities for which they are seeking approval, and petition students are expected to have superior grades and sound academic preparation.

If the student's petition is approved, Saint Joseph's University will administer their study abroad program in the same way as an approved program.

Eligibility

SJU students are eligible for a semester abroad during the second semester of their sophomore year, all or part of their junior year, or their senior year (with permission of the Associate Dean). Students must be in good academic, disciplinary, and financial standing with Saint Joseph's University at the time of application and maintain that good standing throughout the process. Students must have a minimum cumulative GPA of 2.5, though many of our affiliated programs have a higher GPA requirement, some up to a 3.0.

Although CIP can advise students on making an appropriate program selection and assist them through the application process, our approval does not guarantee admission into a particular study abroad program or foreign institution. Students are responsible for understanding and meeting the regulations, requirements, and deadlines specific to the program of their choice.

Applying

Students must apply through the on-line application system and receive approval from the Center for International Programs (CIP) in order to study abroad. Application deadlines are typically March 1st for the fall semester and October 1st for the spring semester; however, the CIP may adjust these deadlines (in advance and with notice) if necessary. In the event of a larger than anticipated applicant pool, the Center for International Programs may not be able to approve all study abroad applications. Complete applications from eligible students will be approved on a first come, first served basis. For this reason, early applications are strongly advised. Students who apply by the deadline but are not approved due to space will be placed on a waitlist. In the case of withdrawals, priority will be given to Saint Joseph's University students, students with no prior study abroad experience, and students with exceptional academic circumstances that may prevent them from studying abroad in a future semester. Some examples include (but are not limited to) class standing and major.

All other students not approved for the semester of their choice will be given priority for the following semester. Deferred applications will be approved pending an academic and disciplinary check during the following semester.

Senior Approval

Students who wish to study abroad during the fall or spring semester of their senior year must discuss their plans with their Academic Advisor and obtain approval from the Associate Dean of their college via the Request to Study Abroad as a Senior form.

Length of Stay

Students can apply for an academic semester (fall or spring) or a full year abroad. Only in special circumstances (and with prior approval from the CIP, the Vice President/Associate Provost, and the student's Academic Associate Dean) will a student be permitted to spend a third semester

abroad. Students interested in studying abroad for more than one year should make an appointment with the Study Abroad Advisor prior to any planning and before beginning an application.

Fees and Financial Aid

Saint Joseph's University students who wish to study abroad for a semester and receive credit toward their Saint Joseph's degree will remain registered at SJU and pay SJU full-time, day tuition plus a \$100 Continuing Registration Fee. Students will also be asked to submit a \$300 confirmation deposit, which will be credited towards the student's total SJU tuition/Continuing Registration Fee expenses. Saint Joseph's University will then pay the overseas program for the tuition portion of the program. Students will be responsible for all non-tuition fees associated with the program they will be attending. Please visit the Center for International Programs website to review estimated costs for each of our approved semester abroad programs.

All forms of financial aid except for Federal Work Study can be applied to Saint Joseph's approved semester abroad programs. This includes Saint Joseph's grants, loans, scholarships, and state and federal awards, such as Pell Grants and Guaranteed Student Loans. A financial aid package for a student participating on a Saint Joseph's approved program will be based on the specific costs of the program in which the student will be studying. The following expenses will be included when calculating a student's financial need: tuition and fees, room and board, books, airfare for a round-trip ticket, and miscellaneous expenses such as local transportation, police registration fees, immunizations and any health insurance required by the host country. Students may not use any of their financial aid towards a petition program that is not approved by the committee.

Family Tuition Benefits, FACHEX and Tuition Exchange

Students who are receiving SJU family tuition benefits will be able to use these tuition scholarships toward their study abroad experiences. Family Tuition Benefit is available only for courses taken as part of a bachelors or master's degree program. Travel and expenses (other than tuition) for overseas programs, study abroad, or other credit work at locations away from the main campus are not covered by the Family Tuition Benefits program.

Students who are the children of employees at other colleges/universities who are receiving scholarships through FACHEX and the Tuition Exchange Program may use these awards toward any approved study abroad program through Saint Joseph's University. For more information about FACHEX and the Tuition Exchange Program, please contact the Financial Assistance Office at 610-660-2500.

Credit Toward Graduation

Credit will be given towards graduation for all appropriate courses taken on SJU programs or approved programs abroad. Students must, however, get all courses approved following the instructions provided by the CIP. All courses (including credit-bearing internships) must be taken on A-F basis; pass/fail is not an option. Grades are reported on the Saint Joseph's University transcript and count toward the student's overall GPA.

Program Requirements

Students are required to maintain full time enrollment, attend class regularly, and comply with all program regulations and individual course

requirements in any program they choose. Students who leave the program before it is officially over will not receive credit for their work.

University Refund Policy

Students who choose to withdraw from the study abroad program must immediately notify the Center for International Programs through the on-line application portal. Only that portion of the student's tuition and fees, which have not been committed on their behalf to the University and/or any third party at the time of cancellation, will be refunded to the student. If the student withdraws from the program before paying tuition and fees, the University will bill the student for commitments made on their behalf to the University and/or any third party. The student will be financially responsible for any such costs incurred, per the terms of the Semester Abroad Academic and Disciplinary Waiver in the on-line application.

Faculty-Led Study Tours

Each year, in conjunction with SJU faculty, the Center for International Programs (CIP) offers a series of campus-based classes that have a travel component as one of their requirements. While class takes place on campus during the fall or spring semester, the actual travel portion occurs during the January intersession, spring break, or in the summer months.

Course offerings and destinations vary each year. Recent study tour destinations included: Germany, Costa Rica, Italy, England, Northern Ireland, and Peru.

Students earn three credits for participating in these courses. Please note that the running of these programs is contingent on meeting sufficient enrollment requirements. Additional information about SJU study tours can be found on the CIP website: <https://www.sju.edu/offices/student-life/cip> (<https://www.sju.edu/offices/student-life/cip/>).

Summer Study Abroad

A SJU Summer Program is a month-long academic course offered by SJU faculty during the summer. The course is held in one of three locations:

- South Africa,
- Greece,
- Rome

Academic learning takes place on-site, with required pre-departure meetings and assignments to help prepare students for the immersion experience. Summer Programs are designed to give students a longer immersion experience in other countries and cultures than Study Tours. Any student who is not on academic or disciplinary probation and is in good financial standing with SJU may apply for an SJU summer study abroad program, provided that s/he has received academic advisor approval and has met course prerequisites. There is no GPA requirement; however, students must be in good academic standing. CIP also recommends that students meet with their academic advisor to make sure that they have met course prerequisites (if applicable) and to talk about GEP/CCC or academic program requirements. Please note that the running of these programs is contingent on meeting sufficient enrollment requirements. For application information, please visit the CIP website: <https://www.sju.edu/offices/student-life/cip> (<https://www.sju.edu/offices/student-life/cip/>).

SJU Summer Program in Greece

The SJU Summer Program in Greece takes place in multiple locations around the country, including Syros, Athens, Santorini, and Crete.

Students may enroll in one or two courses offered by SJU faculty and earn 3-6 credits. Students live in a neoclassical villa on Syros, in a hotel in Athens, and in a monastery in Santorini. Courses offered change from year to year. Previous courses have included English, Theology, Politics, History, and Psychology. (Summer only, five weeks, typically late May to late June.)

SJU Summer Program in Rome

The SJU Summer Program in Rome program takes place in the heart of Rome with several cultural visits planned in addition to two excursions that typically include Florence/Assisi and Sorrento/Capri/Pompeii. Students may enroll in one or two of the courses offered, and there may be up to four courses offered each summer in a variety of disciplines. In the past, courses have included Italian, Classics, Psychology, Business, Philosophy, Sociology, Art History, Communications, and Economics. Students, faculty, and coordinators reside at fully furnished apartments through The American University of Rome (AUR) and classroom space is provided on campus along with access to the AUR computer lab and library. (Summer only, five weeks, typically in the month of July.)

SJU Summer Program in South Africa

The SJU summer program in South Africa takes place in Johannesburg and Durban and includes a number of visits to cultural, historical, and natural sites. Students take ENG 468/COM 473: Media and Culture in South Africa and earn 3 credits. Students and faculty are housed at Bed and Breakfasts in both cities.

Non-SJU Summer or Winter Study Abroad

Saint Joseph's University students who wish to earn academic credit through participation in an external (i.e., not facilitated by SJU) study abroad program must apply through the CIP's online application system by the appropriate deadlines (March 15th for summer study abroad and October 15th for winter study abroad). As part of the application process, students will be required to obtain course approvals and seek the support of their Academic Associate Dean. Before beginning an application, however, we strongly advise students to carefully research program options. Students can browse through the brochures available in the CIP office, meet with the Study Abroad Advisor, or research programs independently. It's important to also note the following policies related to non-SJU summer or winter study abroad:

- Students of all levels (freshmen through seniors) are eligible to apply for approval to participate in a non-SJU winter/summer program.
- Students must have a minimum cumulative GPA of 2.5 in order to be eligible for this type of study abroad. However, students may find that many programs have a higher GPA requirement that they will also need to meet.
- The student is responsible for submitting appropriate application materials and payments directly to the program that he/she chooses, and SJU financial aid will not transfer.
- Credits earned through the non-SJU summer/winter abroad program will be considered transfer credits, and the grades earned will not be posted on the SJU transcript.
- Credit will only be granted if the student has earned a grade of C or above.

COLLEGE OF ARTS AND SCIENCES

Arts and Sciences Leadership

Dean: Jay Carter, PhD

Associate Dean for Students and Experiential Learning: Jennifer C. Tudor, PhD

Associate Dean for Curriculum, Assessment, and DEI: Becki Scola, PhD

Faculty Listing: College of Arts and Sciences (<https://directory.sju.edu/college-arts-and-sciences/faculty/>)

Mission

As the intellectual heart of Jesuit education at Saint Joseph's University, the College of Arts and Sciences invites students into a community of life-long learners who lead by example, living purposefully for the greater glory of God in service to and with others. To this end, we expand minds, advance knowledge, nurture humane values, and inspire imaginations.

Africana Studies Minor

Students interested in pursuing the Minor in Africana Studies should consult the Advising Support Center of the College of Arts and Sciences.

The Africana Studies program currently includes courses offered by the departments of Economics, English, French, History, Foreign Languages and Literatures, Music, Theatre and Film, Philosophy, Political Science and Religious Studies. Courses taken to satisfy requirements of this program may also serve to satisfy GEP or major requirements, including Integrative Learning courses where appropriate.

Requirements

Participants choose a minimum of six courses from those listed below (both course numbers and course titles must match the ones listed below) with no more than three from any one department. Substitutions may be approved upon written application to the director. Students who successfully complete the program requirements earn a Minor in Africana Studies.

Code	Title	Hours
ENG 150	First Year Seminar (Protest & Civil Action: The Civil Rights Movement)	3
ENG 205	Cultural Diversity	3
ENG 317	Literature of South Africa	3
ENG 320	Contexts of Faith in Modrn Lit	3
ENG 328	African American Literature	3
ENG 329	Black Women Writers	3
ENG 429	The Civil Rights Movement	3
ENG 482	Literature & Culture	3
ENG 620	Special Topics in Lit/Culture	3
FRE 461	Caribbean Francophone Liter	3
HIS 343	African Ethnicities	3
HIS 379	Black History Since Civil War	3
HIS 477	Seminar in African History	3
HIS 484	Readings in African History	3

LTT 361	French-Carib. Lit [in English]	3
MTF 294	Non-Western World Cinemas	3
PHL 150	First Year Seminar	3
PHL 302	Philosophy of Race	3
PHL 304	African Philosophy	3
POL 337	Contemp Cuban Pol & Society	3
POL 324	Race & Ethnic Politics in U.S.	3
REL 271	African & Caribbean Religions	3
REL 327	Religion & Race in Phila	3
SOC 205	Ethnic & Minority Relations	3
SOC 253	Race and Social Justice	3
SOC 355	Race, Crime & CJ	3
SOC 355	Race, Crime & CJ	3
SOC 363	Race Relations in Philadelphia	3

American Studies Minor

The minor in American Studies provides a framework within which students can focus their elective and related courses on the study of American history, literature, art, politics, ideas, and institutions. Students majoring in economics, English, history, fine arts, political science, sociology, and theology are especially encouraged to consider a minor in American Studies. By examining the United States from a variety of intellectual perspectives, American Studies minors will develop both a more nuanced understanding of the development and dynamics of American culture and a more sophisticated, interdisciplinary approach to academic study.

Faculty

Director

- Brian Yates

Advisory Board

- Katherine Sibley
- Jeffrey Hyson
- Martha Easton
- Emily Hage
- Chris Kelly
- Owen Gilman

Learning Goals and Outcomes

Goal 1: Students minoring in American Studies will gain a stronger knowledge in the disciplines that make up this minor and thus articulate key aspects of United States history, politics, economics, culture (including art, religions, and literatures) and society.

Outcome 1.1: Students will be trained to identify, define, or analyze key aspects of U.S. history, politics, economics, culture (including art, religions, and literatures) and society, using a variety of tools, methods, and perspectives, in order to gain knowledge and articulate their understanding in the disciplines that make up this minor.

Goal 2: Students will produce clear and persuasive analyses of relevant research questions generated by the interdisciplinary approaches offered in the minor of American studies.

Outcome 2.1: Students will be able to practice a range of methodological perspectives and practices used to investigate and interpret topics in American Studies, and to present their findings effectively.

Requirements

Code	Title	Hours
Participants must choose a minimum of six courses from those listed below, with at least one from each group (and at least one in each group must be above 100 level):		
History Group		
HIS 201	U.S. History to 1877	3
HIS 202	U.S. History since 1865	3
HIS 360	Colonial America	3
HIS 361	America in Age of Revolutions	3
HIS 362	The American Civil War	3
HIS 363	American Medicine Since 1865	3
HIS 366	Reform and Reaction in the US	3
HIS 379	Black History Since Civil War	3
HIS 381	US in the World since WWI	3
HIS 382	American Foreign Policy	3
HIS 383	Food in American History	3
HIS 385	Women in America	3
HIS 386	American Environmental History	3
HIS 387	Popular Culture in the US	3
HIS 391	American Military History	3
HIS 392	Museums, Monuments, and Media	3
HIS 471	Seminar in American History	3
HIS 483	Readings in American Hist	3
English		
ENG 201	Major American Writers	3
ENG 208	Special Topics in Literature	3
ENG 210	The Roaring Twenties	3
ENG 211	Black Popular Culture	3
ENG 215	Passing Narratives - Black Lit	3
ENG 216	Re-Reading the Sixties	3
ENG 217	The Graphic Novel	3
ENG 321	Early American Literature	3
ENG 322	Amer Romantic & Trancend Lit	3
ENG 323	American Literature 1865-1915	3
ENG 324	Twentieth Century American Lit	3
ENG 325	Contemporary American Lit	3
ENG 327	Southern Literature	3
ENG 328	African American Literature	3
ENG 329	Black Women Writers	3
ENG 417	Post-Soul Black Literature	3
ENG 420	American Authors	3
ENG 421	American Novel, 19th 20th Cent	3
ENG 423	Amer.Poetry, 19th & 20th Cent.	3
ENG 424	Contemporary American Poetry	3
ENG 425	American Drama	3
ENG 426	Nature & Environmental Writing	3
ENG 427	The Harlem Renaissance	3

ENG 428	The Beat Rebellion	3
ENG 429	The Civil Rights Movement	3
ENG 482	Literature & Culture	3
Economics		
ECN 480	Econ of Poverty & Income Dist	3
ECN 485	Food and the U.S. Economy	3
ECN 452	Econ of Presidential Elections	3
General Group		
FMK 202	Overview of the Globl Food Ind	3
FMK 250	The Future of Food	3
HAD 201	Intro to Healthcare Admin	3
LIN 101	Language and Communication	3
LIN 250	Social Media Discourse	3
LIN 260	Language and the Law	3
LIN 340	Communication in Soc Contexts	3
MTF 142	History of Rock and Pop	3
MTF 257	American Music	3
MTF 291	American Film	3
PHL 450	American Philosophy	3
PMK 211	Pharmaceutical Mkt Environment	3
POL 111	Intro to American Politics	3
POL 303	Political Ideology in America	3
POL 303	Political Ideology in America	3
POL 309	Advising and Advocacy	3
POL 311	Const Law:Rights & Civil Lib	3
POL 313	Public Policy	3
POL 316	State and Local Government	3
POL 318	Pennsylvania Politics	3
POL 319	Public Opinion & Media	3
POL 322	Campaigns & Elections	3
POL 323	Women and American Politics	3
POL 324	Race & Ethnic Politics in U.S.	3
POL 325	Intersectionality	3
POL 326	Protesting Inequality	3
POL 356	American Foreign Policy	3
POL 402	Capstone: Contentious Pol inUS	3
REL 327	Religion & Race in Phila	3
SOC 102	Social Problems	3
SOC 208	Sociology of Gender	3
SOC 217	Mental Health & Society	3
SOC 225	Intro to American CJ	3
SOC 330	Sociology of Cities	3
SOC 349	Poverty Ethics & Social Policy	3
SOC 378	Urban and Public Policy	3
THE 360	Story as Theology	3

Animal Studies Minor

Animal Studies is an interdisciplinary field that aims not only to investigate animals themselves, but also the relationship between human and non-human animals. Animal Studies brings together scholarship from the social and natural sciences, as well as the humanities. The Animal Studies minor exposes students to courses focusing on human and animal relations and interactions, animal biology/physiology, animal

behavior and cognition, and the role played by non-human animals in the larger world around them. The selection of courses is designed to yield a greater knowledge of and appreciation for animals and our relationship with them.

Faculty Director

- Skolnick (Psychology)

Advisory Board

- Hanganu-Bresch (English)
- Goldthwaite (English)
- Nelson (Biology)
- Tudor (Biology)

Learning Goals and Outcomes

Goal 1. Students will develop greater understanding of the nature of animals and the role played by animals in the larger world.

- Outcome 1.1:** Students will demonstrate knowledge of the role of animals in the broader natural world or in human society.
- Outcome 1.2:** Students will demonstrate knowledge of human-animal interactions and relationships.
- Outcome 1.3:** Students will demonstrate knowledge of the major concepts, historical trends and theoretical perspectives in the discipline of Animal Studies.
- Outcome 1.4:** Students will demonstrate knowledge of animal biology.
- Outcome 1.5:** Students will demonstrate knowledge of animal behavior and cognition.

Goal 2. Students will develop a greater understanding of the ethical issues that surround human-animal interactions.

- Outcome 2.1:** Students will demonstrate knowledge of the theoretical perspectives concerning the moral status of animals.
- Outcome 2.2:** Students will demonstrate knowledge of the ethical issues surrounding the use of animals.

Requirements

All students seeking to minor in Animal Studies will take the following courses:

At least half (three) of the courses counting toward the minor must come from outside the student’s major department.

Code	Title	Hours
Category 1:		
PSY 208	Human/Animal Relations	3
Category 2:		
An understanding of how human and non-human animals relate and interact requires understanding form and function of the organisms. Complete one of the following courses:		
Non-Biology Majors		
BIO 101	Bio I: Cells	

or BIO 165 Exploring the Living World	
Biology Majors:	
BIO 201	Bio III: Organismic Biology
Category 3:	
A background in animal behavior and its underpinnings is helpful when considering the interactions and relationships between human and non-human animals. Take one of the following courses: (These courses all have prerequisites)	
BIO 401	Animal Behavior
PSY 201	Biological Bases of Behavior
PSY 225	Comparative Animal Behavior
Category 4:	
Three additional elective courses; at least one of these courses must be from a department other than Psychology or Biology. Students may choose from among the following, which are included in order to provide additional knowledge of human and non-human animal relations and interactions, animal biology/physiology, animal behavior and cognition, and the role of non-human animals in the larger world around them: (Many of these have pre-requisites and/or co-requisites)	
BIO 260	Anat&Physiol for AI Hlth I
BIO 406	Human Anatomy
BIO 409	Ecology
BIO 412	Neurobiology
BIO 417	Systemic Physiology
BIO 419	Invertebrate Zoology
BIO 423	Evolution
ENG 270	Special Topics in English ⁴
ENG 426	Nature & Environmental Writing
ENG 452	Writing and Reading Animals
ENG 461	Food Writing
ENV 105	The Environment
ENV 106	Exploring the Earth
FMK 202	Overview of the Globl Food Ind
FMK 250	The Future of Food
HIS 386	American Environmental History
PHL 295	Philosophy of the Environment
PSY 201	Biological Bases of Behavior ³
PSY 221	Animal Learning and Memory
PSY 260	Primate Psychology
Independent Study ¹	
Independent Research ¹	
Internship ¹	
Total Hours	

¹ With permission of the Animal Studies Director, students can count one semester of an appropriate independent study, research, or internship toward the minor (in Category 4).

³ PSY 201 may be used as an elective or to satisfy Category 3 above, but it may not be used in both categories.

⁴ Only the ENG 270 Special Topics in English course titled, "Intro to Animal Studies" counts as an elective in the minor.

Art & Art History

The Art & Art History department offers courses in art history, graphic design, painting, drawing, photography, sculpture, pottery, ceramics, and mosaics. The department occupies three buildings that include lecture classrooms, painting and drawing, sculpture, and ceramics studios, a kiln house with electric, gas, and raku kilns, a darkroom for traditional photography, a shooting studio for all photography classes, and a digital lab outfitted with high-end computers, printers and state-of-the-art software for graphic design and digital photography.

With Saint Joseph's University's partnership with the Barnes Foundation, students will be able to see artworks and even show their own in the galleries in the new Frances M. Maguire Art Museum at the Barnes Arboretum. Students also pursue internships that help secure jobs after graduation.

Because of Saint Joseph's proximity to Philadelphia, New York, and other major cultural centers, students are able to experience first-hand major works of art at many renowned galleries and museums. Students pursue internships at regional museums and cultural organizations, travel overseas, and have access to the University's extensive permanent collection. As part of the Gallery Exhibition Research Assistant (GERA) program, students can gain valuable experience in researching and hanging exhibitions in the department's two galleries for professional and student work.

The department's award-winning faculty of artists or scholars are also dedicated teachers who challenge students to express themselves and respond to their immediate and global context.

Art and Art History students develop careers in a wide range of art-related areas, including publishing, advertising, gallery and museum curating, graphic design, pottery, interior design, fashion design, education, and architecture, in addition to the many jobs available to students with a strong liberal arts degree, such as law and also medicine.

Faculty

Well respected in the art industry, the faculty members in Saint Joseph's University's Art & Art History Department bring a wide range of applicable experience from previously held high-level positions working for museums, galleries, graphic design firms, major corporations and more. They are deeply dedicated to helping students reach their career objectives in art and art history.

Department of Art and Art History Faculty & Staff (<https://www.sju.edu/departments/art/faculty-staff/>)

Programs

Undergraduate Majors

- Art (p. 57)
- Art History (p. 53)
- Graphic Design (p. 61)

Undergraduate Minors

- Art (p. 59)
- Art History (p. 56)

- Art Therapy (p. 60)
- Commercial Photography (p. 60)
- Graphic Design (p. 63)
- Museum Studies (p. 63)

Art History Major

In a world filled with images, Art History offers a critical means of understanding visual culture in an increasingly globalized world. The Art History program at Saint Joseph's covers major artistic developments in traditional and new media throughout history. Art History is an interdisciplinary field that encourages students to explore the many intersections between art and politics, religion, science, history and philosophy, among many other areas. Through close analysis of art and architecture Art History students develop strong critical evaluation skills and a wide-ranging cultural literacy.

The proximity of Saint Joseph's University to Philadelphia and New York allows Art History students to visit the many art museums and galleries in these cities. Most Art History classes are held in the Frances M. Maguire Art Museum (housed in the former Barnes Foundation building), where students have access to objects in SJU's permanent collection, as well as rotating exhibitions. Art History students also study abroad, gaining exposure to some of the most renowned works of art and architecture around the globe. In their junior or senior year, Art History majors (optional for minors) take a research seminar focusing on a topic of their choice. Junior and senior Art History majors and minors also have the opportunity to complete an internship related to their career plans after graduation. Students studying Art History go on to a wide range of careers, including museums, galleries, publishing, education, and fashion. As a strong liberal art undergraduate degree, Art History prepares students for many other career paths, as well.

Learning Goals and Outcomes

Goal 1: To develop an understanding of the visual characteristics and historical contexts of works of art

Outcome 1.1: Art history students will be able to identify the visual characteristics of works of art

Outcome 1.2: Art history students will be able to identify the historical circumstances in which works of art were created (for example, function; patronage; motivation; movement, etc.)

Goal 2: To develop the necessary resources to research and write about art history

Outcome 2.1: Art history students will be able to identify and use appropriate tools to conduct research in art history

Outcome 2.2: Art history students will be able to write clearly and effectively about works of art

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3

World History Course Area	3
Philosophy Requirements	
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.	
Philosophy Level One	3
Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151 Inequality in American Society	1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements:

Code	Title	Hours
Required		
ARH 101	Intro to Global Art History I	3
ARH 102	Intro to Global Art History II	3
ARH 480	Art History Research Seminar	3
Any six (6) art history courses. At least two (2) that include non-Western art and/or architecture. Students may also choose from the CLA, HIS, ITA, IST, and REL courses listed below, although at least 2 courses must be ARH courses. If Art History is a student's 2nd major, ARH 480 is optional.		18
ARH 103	Art of Africa/African Diaspora	
ARH 104	History of Global Architecture	
ARH 105	East Asian Art & Architecture	
ARH 106	Latin American Art & Architect	
ARH 107	Women, Gender, and Art	
ARH 108	Traditions of Art/BarnesMethod	
ARH 109	Elements of Art/Barnes Method	
ARH 110	Art and Medicine	
ARH 111	Art & Arch of Islamic World	
ARH 150	Art & Architecture of Phila	
ARH 170	Special Topics in Art History	
ARH 178	Art History & Photography:Italy	
ARH 180	Encountering Mystery	
ARH 202	Medvl Art Ctcombs to Cthdrals	
ARH 203	Renaissance Art & Architecture	
ARH 204	Baroque Art and Architecture	
ARH 205	Revolution to Realism1780-1880	
ARH 206	Impressionism & Post-Impress	
ARH 207	American Art & Architecture	
ARH 208	Modern Art & Architecture	
ARH 209	Contemporary Art & Architect	
ARH 210	Museum Studies	
ARH 211	Art & Magazines	
ARH 212	History of Photography	
ARH 213	Art & Pilgr Parthenon to Disney	
ARH 214	Intro to Art Conservation	
ARH 215	Museum Ops, Mgmt & Professions	
ARH 216	Curating an Exhibition	
ARH 221	Rebels&Revolutionaries:Art&Lit	
ARH 301	Mystery&Monument:Anc Greece	
ARH 302	Mystery&Monument:Anc Rome	
ARH 481	Museum Internship	
HIS 306	Sports & Spectacle Greece/Rome	
HON 221	Rebels&Revolutionaries:Art&Lit	
ITA 306	The Roman Experience	
ITA 315	Italy Through Art	
ITA 345	Art Fashion: la moda italiana	
ITA 425	Italian Art and Artists	
IST 115	Italy Through Art	
IST 460	The Art of Dante's Inferno	
REL 360	Religion & Art in East Asia	
One (1) studio art course		3

ART 121	Introduction to Studio Art
ART 130	Art Therapy
ART 132	Illustration I
ART 133	Drawing I
ART 135	Painting I
ART 136	Landscape Painting
ART 137	Printmaking
ART 138	Landscape Drawing
ART 139	Contemp Botanical Illustration
ART 140	Anatomy and Life Drawing
ART 141	3-D Studio Art
ART 142	Pottery I
ART 143	Mosaics I
ART 144	Ceramics I
ART 145	Figurative Sculpture
ART 146	Sculpture and the Environment
ART 147	Intro to Sculpture/Mixed Media
ART 148	Social Justice Through Sculpt
ART 149	Japanese Pottery & Tea Culture
ART 160	Phoneography
ART 170	Special Topics
ART 171	Camera-less Photography
ART 172	Darkroom Photography I
ART 173	Digital Photography I
ART 174	Historical Photo Processes
ART 175	Image Manipulation: Photoshop
ART 177	Photography & Climate Crisis
ART 179	Photography: Truth & Privilege
ART 193	2D Animation
ART 233	Drawing II
ART 239	Concepts and Artmaking
ART 235	Painting II
ART 241	Sculpture II
ART 242	Pottery II
ART 243	Ceramic Surface Design
ART 244	Ceramics II
ART 245	Atmospheric Firing: Wood/Salt
ART 246	Ceramic Sculpture
ART 247	Sculpture Mixed Media II
ART 248	Figurative Sculpture II
ART 272	Darkroom Photography II
ART 273	Commercial Photography
ART 275	Experimental Digital Photo
ART 331	Works on Paper
ART 333	Drawing III
ART 335	Painting III
ART 341	Sculpture III
ART 344	Ceramics III
ART 372	DirectedProjects - Photography
ART 373	Photo Essay/Docu Photo
ART 374	Adv. Comm. Studio Photography

ART 444	Ceramics IV
Total Hours	30

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Independent Study Program

Independent study courses may be taken for upper division credit in a student's major department. Advanced or specialized work in Art and Art History may be pursued under the guidance of a faculty mentor within the independent study program. Students requesting an independent study should contact the faculty member to be involved in the project at least two weeks prior to the registration period. Students must submit a written project proposal which outlines topics and goals.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ARH 101	Intro to Global Art History I	3
Non-Native Language		3-4
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
Religious Studies		3
Philosophy Level One		3
Hours		16-17
Spring		
ARH 102	Intro to Global Art History II	3
World History		3
Theology		3
Philosophy Level Two		3
Mathematics		3-4
Hours		15-16
Sophomore		
Fall		
Art History Elective		3
Diversity		3
Lit		3
Social Science		3
ART course (for major)		3
Hours		15
Spring		
Art History Elective		3
Art/Creativity		3
Mission Specific or Free Elective		3
Free Elective		3
Natural Science		4
Hours		16
Junior		
Fall		
Art History Elective		3
Free elective or Writing Intensive		3
Free Elective		3
Free Elective		3
Free Elective		3
Hours		15
Spring		
ARH elective		3

ARH elective		3
Free Elective		3
Free Elective		3
Free Elective		3
Hours		15
Senior		
Fall		
ARH 480	Art History Research Seminar (or ARH Elective)	3
Free Elective		12
Hours		15
Spring		
ARH 481	Museum Internship (or ARH Elective)	3
Free Elective		12
Hours		15
Total Hours		122-124

Art History Minor

In a world filled with images, Art History offers a critical means of understanding visual culture in an increasingly globalized world. The Art History program at Saint Joseph's covers major artistic developments in traditional and new media throughout history. Art History is an interdisciplinary field that encourages students to explore the many intersections between art and politics, religion, science, history and philosophy, among many other areas. Through close analysis of art and architecture Art History students develop strong critical evaluation skills and a wide-ranging cultural literacy.

The proximity of Saint Joseph's University to Philadelphia and New York allows Art History students to visit the many art museums and galleries in these cities. Most Art History classes are held in the Frances M. Maguire Art Museum (housed in the former Barnes Foundation building), where students have access to objects in SJU's permanent collection, as well as rotating exhibitions. Art History students also study abroad, gaining exposure to some of the most renowned works of art and architecture around the globe. In their junior or senior year, Art History majors (optional for minors) take a research seminar focusing on a topic of their choice. Junior and senior Art History majors and minors also have the opportunity to complete an internship related to their career plans after graduation. Students studying Art History go on to a wide range of careers, including museums, galleries, publishing, education, and fashion. As a strong liberal art undergraduate degree, Art History prepares students for many other career paths, as well.

Learning Goals and Outcomes

Goal 1: To develop an understanding of the visual characteristics and historical contexts of works of art

Outcome 1.1: Art history students will be able to identify the visual characteristics of works of art

Outcome 1.2: Art history students will be able to identify the historical circumstances in which works of art were created (for example, function; patronage; motivation; movement, etc.)

Goal 2: To develop the necessary resources to research and write about art history

Outcome 2.1: Art history students will be able to identify and use appropriate tools to conduct research in art history

Outcome 2.2: Art history students will be able to write clearly and effectively about works of art

Requirements

The minimum requirement for the minor is the completion of six courses (18 credits) in Art History - ARH. Students may *also* choose from the HON, IST, ITA, and REL courses listed below, although at least 2 courses must be ARH courses.

Code	Title	Hours
Choose 6 Courses:		18
1 ART course can be counted toward the Art History minor		
ARH 101	Intro to Global Art History I	
ARH 102	Intro to Global Art History II	
ARH 103	Art of Africa/African Diaspora	
ARH 104	History of Global Architecture	
ARH 105	East Asian Art & Architecture	
ARH 106	Latin American Art & Architect	
ARH 107	Women, Gender, and Art	
ARH 108	Traditions of Art/BarnesMethod	
ARH 110	Art and Medicine	
ARH 111	Art & Arch of Islamic World	
ARH 150	Art & Architecture of Phila	
ARH 178	Art History &Photography:Italy	
ARH 180	Encountering Mystery	
ARH 202	Medvl Art Ctcombs to Cthdrals	
ARH 203	Renaissance Art & Architecture	
ARH 204	Baroque Art and Architecture	
ARH 205	Revolution to Realism1780-1880	
ARH 206	Impressionism & Post-Impress	
ARH 207	American Art & Architecture	
ARH 208	Modern Art & Architecture	
ARH 209	Contemporary Art & Architect	
ARH 210	Museum Studies	
ARH 211	Art & Magazines	
ARH 212	History of Photography	
ARH 213	Art &Pilgr Parthenon to Disney	
ARH 214	Intro to Art Conservation	
ARH 215	Museum Ops, Mgmt & Professions	
ARH 216	Curating an Exhibition	
ARH 221	Rebels&Revolutionaries:Art&Lit	
ARH 301	Mystery&Monument:Anc Greece	
ARH 302	Mystery&Monument:Anc Rome	
ARH 480	Art History Research Seminar	
ARH 481	Museum Internship	
HON 221	Rebels&Revolutionaries:Art&Lit	
ITA 315	Italy Through Art	
ITA 345	Art Fashion: la moda italiana	
ITA 306	The Roman Experience	
ITA 425	Italian Art and Artists	
ITA 430	Imges of Rome:Papl Rome - Pres	
ITA 445	The Medici Court	
IST 115	Italy Through Art	

IST 460	The Art of Dante's Inferno
REL 360	Religion & Art in East Asia
<hr/>	
Total Hours	18

Art Major

The Art program at Saint Joseph's University provides students with valuable problem-solving and technical hands-on skills and encourage students to think creatively, take risks, and be innovative. Studio classes are small, and students receive one-on-one attention.

The program boasts three dedicated buildings that include a digital lab with high-end computers, printers and state-of-the-art software for graphic design and digital photography, painting, drawing, ceramics, and sculpture studios, a darkroom, shooting studio, a kiln house complete with electric, gas, and raku kilns, and lecture classrooms.

Art students have many opportunities to exhibit their work on campus and to pursue internships that help secure jobs after graduation. Saint Joseph's University's proximity to Philadelphia allows studio classes to visit Philadelphia-area museums and galleries for field trips and on-location assignments.

Art students develop careers in a wide range of art-related areas, including advertising, gallery and museum curating, graphic design, pottery, interior design, fashion design, education, and architecture, among others.

Learning Goals and Outcomes

Goal 1: To develop a visual awareness through analysis and creative work.

Outcome 1.1: Distinguish the components of a work of art.

Outcome 1.2: Discuss the context of a work of art.

Goal 2: To manifest their visual awareness in their own work.

Outcome 2.1: Produce a body of creative visual works.

Outcome 2.2: Write critical analysis of visual works of art.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3	
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Major Requirements

Code	Title	Hours
Fundamental Courses		
Select four of the following including one required art history course: 12		
1 ARH course	see Art & Art History/Courses or HON 221	
ART 121	Introduction to Studio Art	
ART 133	Drawing I	
ART 135	Painting I	
ART 141	3-D Studio Art	

ART 142	Pottery I	
ART 144	Ceramics I	
ART 145	Figurative Sculpture	
ART 147	Intro to Sculpture/Mixed Media	
ART 172	Darkroom Photography I	
ART 173	Digital Photography I	
Select four additional courses within a specialization, three of which must be taken prior to the capstone courses		12
One may "specialize" in ceramics, drawing, painting, photography, sculpture or graphic design		
ART 130	Art Therapy	
ART 136	Landscape Painting	
ART 137	Printmaking	
ART 138	Landscape Drawing	
ART 143	Mosaics I	
ART 160	Phoneography	
ART 170	Special Topics	
ART 171	Camera-less Photography	
ART 174	Historical Photo Processes	
ART 175	Image Manipulation: Photoshop	
ART 221	Art Education in the Schools	
ART 233	Drawing II	
ART 235	Painting II	
ART 239	Concepts and Artmaking	
ART 241	Sculpture II	
ART 242	Pottery II	
ART 243	Ceramic Surface Design	
ART 244	Ceramics II	
ART 245	Atmospheric Firing: Wood/Salt	
ART 246	Ceramic Sculpture	
ART 247	Sculpture Mixed Media II	
ART 248	Figurative Sculpture II	
ART 270	Spec. Topics & Ind. Study (SO)	
ART 272	Darkroom Photography II	
ART 273	Commercial Photography	
ART 275	Experimental Digital Photo	
ART 331	Works on Paper	
ART 333	Drawing III	
ART 335	Painting III	
ART 341	Sculpture III	
ART 344	Ceramics III	
ART 370	Spec. Topics & Ind. Study (JR)	
ART 372	DirectedProjects - Photography	
ART 373	Photo Essay/Docu Photo	
ART 374	Adv. Comm. Studio Photography	
ART 444	Ceramics IV	
ART 470	Spec Topics & Indep Study (SR)	
Capstone		
ART 495	Senior Project I (Capstone)	3
ART 496	Senior Project II (Capstone)	3
Total Hours		30

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Independent Study Program

Independent study courses may be taken for upper division credit in a student's major department. Advanced or specialized work in Art and Art History may be pursued under the guidance of a faculty mentor within the independent study program. Students requesting an independent study should contact the faculty member to be involved in the project at least two weeks prior to the registration period. Students must submit a written project proposal which outlines topics and goals.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
World History		3
Non-Native Language		3
Art Fundamental (1 of 3)		
Hours		10
Spring		
Fundamental Course (1 of 3)		3
Fundamental Course (2 of 3)		3
Free Elective		3
Philosophy Level One		3
Mathematics		3
Hours		15
Sophomore		
Fall		
Philosophy Level Two		3
Literature		3
Specialization Course (1 of 4)		3
Free Elective		3
Free Elective		3
Hours		15
Spring		
Theology		3
Specialization Course (2 of 4)		3
Free Elective		9
Hours		15
Junior		
Fall		
Social Science		3
Diversity		3
Specialization Course (3 of 4)		3
Free Elective		6
Hours		15
Spring		
Specialization Course (4 of 4)		3
Mission Specific		3
Free Elective		9
Hours		15
Senior		
Fall		
ART 495	Senior Project I (Capstone)	3
Natural Science		3-4

Free Elective		9
	Hours	15-16
Spring		
ART 496	Senior Project II (Capstone)	3
Religious Studies		3
Free Elective		9
	Hours	15
	Total Hours	115-116

Art/PK-12 Education

Students majoring Art who are interested in teaching in grades PK-12 can dual major in PK12 Education for Art. Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Art Education PK12 Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation. The Instructional I Teaching certificate in Art Education PK12, enables teachers to teach in public, private, and charter schools, museums, and community settings.

In addition to their Art advisor, Art/PK-12 Education dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 492 PK12 Student Teaching in their senior year. Students must maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

See the Art major for specific requirements. (p. 57)

See the PK-12 Education major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/prek-12-major/>)

Art Minor

The Art program at Saint Joseph's University provides students with valuable problem-solving and technical hands-on skills and encourage students to think creatively, to take risks, and to be innovative. Studio classes are small, and students receive a great deal of one-on-one attention.

The program boasts three dedicated buildings that include a digital lab with high-end computers, printers and state-of-the-art software for graphic design and digital photography, painting, drawing, ceramics, and sculpture studios, a darkroom, shooting studio, a kiln house complete with electric, gas, and raku kilns, and classrooms.

Art students have many opportunities to exhibit their work on campus and to pursue internships that help secure jobs after graduation. Saint Joseph's University's proximity to Philadelphia allows studio classes to visit Philadelphia-area museums and galleries for field trips and on-location assignments.

Art students develop careers in a wide range of art-related areas, including advertising, gallery and museum curating, graphic design, pottery, interior design, fashion design, education, and architecture, among others.

Learning Goals and Outcomes

Goal 1: To develop a visual awareness through analysis and creative work.

Outcome 1.1: Distinguish the components of a work of art, and

Outcome 1.2: Discuss the context of a work of art.

Goal 2: To manifest their visual awareness in their own work.

Outcome 2.1: Produce a body of creative visual works, and/or

Outcome 2.2: Write critical analysis of visual works of art.

Requirements

The minimum requirement for the minor is the completion of six courses in Art (18 credits). Students are encouraged to take the two-semester capstone class during their senior year, which counts as two of the six required courses. Students taking the capstone class will participate in the senior art exhibition.

Code	Title	Hours
Choose 6 courses:		18
ART 121	Introduction to Studio Art	
ART 133	Drawing I	
ART 135	Painting I	
ART 136	Landscape Painting	
ART 137	Printmaking	
ART 138	Landscape Drawing	
ART 141	3-D Studio Art	
ART 142	Pottery I	
ART 143	Mosaics I	
ART 144	Ceramics I	
ART 145	Figurative Sculpture	
ART 147	Intro to Sculpture/Mixed Media	
ART 170	Special Topics	
ART 171	Camera-less Photography	
ART 172	Darkroom Photography I	
or ART 173	Digital Photography I	
ART 174	Historical Photo Processes	
ART 175	Image Manipulation: Photoshop	
ART 221	Art Education in the Schools	
ART 233	Drawing II	
ART 235	Painting II	
ART 239	Concepts and Artmaking	
ART 241	Sculpture II	
ART 242	Pottery II	
ART 243	Ceramic Surface Design	
ART 244	Ceramics II	
ART 245	Atmospheric Firing: Wood/Salt	
ART 246	Ceramic Sculpture	
ART 247	Sculpture Mixed Media II	
ART 248	Figurative Sculpture II	
ART 270	Spec. Topics & Ind. Study (SO)	
ART 272	Darkroom Photography II	
ART 273	Commercial Photography	

ART 275	Experimental Digital Photo	
ART 331	Works on Paper	
ART 333	Drawing III	
ART 335	Painting III	
ART 341	Sculpture III	
ART 344	Ceramics III	
ART 370	Spec. Topics & Ind. Study (JR)	
ART 372	DirectedProjects - Photography	
ART 373	Photo Essay/Docu Photo	
ART 444	Ceramics IV	
ART 470	Spec Topics & Indep Study (SR)	
ART 495	Senior Project I (Capstone)	
ART 496	Senior Project II (Capstone)	
GDS 290	Typography I	
HON 221	Rebels&Revolutionaries:Art&Lit	
Total Hours		18

Art Therapy Minor

Art therapy is a growing field that uses various forms of creative expression to help people explore and transform feelings, thoughts, and ideas through visual means of expression. It can help in processing and coping with emotional issues, as well as facilitate self-awareness, understanding, healing, and well-being. Art therapy can be especially useful for people who find it difficult to talk about their thoughts and emotions.

The Art Therapy minor is designed to provide students with some of the foundational courses required for admission to graduate programs in art therapy. It is intended as a first step for undergraduate students towards deciding if they wish to pursue paths toward professional, academic, and/or research careers in art therapy and related professions. Once this decision is made, students should consult with their academic advisors for appropriate guidance and familiarize themselves with graduate school admissions requirements as they map out their undergraduate careers.

Learning Goals and Outcomes

Goal 1. Know and demonstrate understanding of the concepts, theoretical perspectives, and empirical findings of abnormal psychology, clinical mental health counseling, developmental psychology, and sensation and perception.

Goal 2. Know and demonstrate understanding of the concepts, theoretical perspectives, and empirical findings of artistic and creative development, the history and practice of art therapy, and the fundamentals of the therapeutic relationship.

Goal 3. Students will develop proficiency in the use of various art media, including, but not limited to, drawing, painting, ceramics, and sculpture.

Requirements

Code	Title	Hours
ART 130	Art Therapy	3
or PSY 130	Art Therapy	
Two Psychology Courses:		6
PSY 100	Introductory Psychology	
or PSY 101	Intro Psychology Seminar	

PSY 120 or PSY 231	Lifespan Development Developmental Psychology
PSY 122 or PSY 232	Psychological Disorders Adv. Psychological Disorders
PSY 220	Sensation and Perception
Two Studio Art Courses:	
ART 133	Drawing I
ART 135	Painting I
ART 137	Printmaking
ART 141	3-D Studio Art
ART 142	Pottery I
ART 143	Mosaics I
ART 144	Ceramics I
ART 147	Intro to Sculpture/Mixed Media
ART 160	Phoneography
One Art History Course or HON 221	
Total Hours	

Commercial Photography Minor

The commercial photography minor aims to increase students' competitiveness for employment, to establish new partnerships and enhance current ones with local marketing and media firms for internships, and to foster both interdisciplinary and cross-disciplinary programming at Saint Joseph's. This minor would complement our graphic design minor and provide students with more actionable job-related skills, opening additional opportunities in advertising, marketing, design and publication.

Learning Goals and Outcomes

Goal 1: Solve communication problems and carry projects from creation to completion, using skills such as research and analysis and idea generation using relevant industry standard graphics software.

Goal 2: Create and develop visual concepts in response to industry standard client briefs.

Goal 3: Apply principles of visual communication as they relate to reaching audiences, the role of commercial photography in society, and the ability to work cooperatively.

Goal 4: Create a professional portfolio that demonstrates problem-solving expertise (including advanced lighting techniques, creative concepts, and innovative solutions necessary for an entry-level position at a digital marketing, publishing or advertising firm)

Requirements

Code	Title	Hours
Foundation Courses:		
ART 173	Digital Photography I	3
or ART 179	Photography: Truth & Privilege	
ART 175	Image Manipulation: Photoshop	3
ART 273	Commercial Photography	3
ART 374	Adv. Comm. Studio Photography	3
Electives:		6
ART 172	Darkroom Photography I	
ART 275	Experimental Digital Photo	

ART 372	DirectedProjects - Photography	
ART 495	Senior Project I (Capstone)	
ART 496	Senior Project II (Capstone)	
COM 200	Multimedia Storytelling I	
COM 202	Visual Design I	
COM 203	Audio/Video I	
COM 372	Intro to Web Design	
COM 473	Special Topics/ Com&Digi Media	
FMK 303	Food Marketing Communication	
FMK 314	International Food Marketing	
GDS 116	History of Graphic Design	
GDS 190	Fundamentals of Graphic Design	
GDS 290	Typography I	
GDS 292	Typography II	
GDS 390	Commercial Design	
MKT 201	Principles of Marketing	
MKT 301	Integrated Mktg Communications	
MKT 302	Consumer & Buyer Behavior	
MKT 303	MKT Communications	
MKT 321	Advertising	
MKT 343	Entertainment Marketing	
MKT 353	Sports Marketing	
Total Hours		18

Graphic Design Major

Saint Joseph's University's Graphic Design program aims to increase students' competitiveness for employment and provide hands-on experience through partnerships with local advertising and design firms. The Graphic Design major is a cross-disciplinary major including the Art, Communications and Media Studies, and Marketing departments. Graphic design students develop skills in visual organization, information hierarchy, branding, and typography. They develop an understanding of principles of color and composition and analysis and idea generation using industry-standard graphics software. Students also learn about problem-solving and the role of design in society. The graphic design program at Saint Joseph's also assists students secure internships that help secure employment after graduation.

Learning Goals and Outcomes

Goal 1: Solve communication problems and carry projects from creation to completion; including the skills of research, analysis and idea generation, using relevant industry standard graphics software

Goal 2: Create and develop visual concepts in response to communication problems, including an understanding of the principles of visual organization, information hierarchy, typography, principles of color, and composition

Goal 3: Apply principles of visual communication as they relate to reaching audiences, the role of design in society as a tool to raise awareness and mobilize audiences, in addition to working collaboratively

Goal 4: Create a professional portfolio that demonstrates problem-solving expertise (including advanced typography, creative concepts, and innovative solutions necessary for an entrylevel design position at leading graphic design firm)

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Code	Title	Hours
GDS 116	History of Graphic Design	3
GDS 190	Fundamentals of Graphic Design	3
GDS 290	Typography I	3
GDS 292	Typography II	3
GDS 492	Portfolio & Professional Pract	3
ART 495	Senior Project I (Capstone)	3
ART 496	Senior Project II (Capstone)	3
Select three courses from this list		9
GDS 390	Commercial Design	
GDS 392	Editorial Design	
GDS 394	User Experience Design	
GDS 490	Visual Identity and Branding	
COM 372	Intro to Web Design	
Choose three of the following suggested electives for the major.		9
ART 173	Digital Photography I	
ART 175	Image Manipulation: Photoshop	
ART 193	2D Animation	
ART 273	Commercial Photography	
ART 275	Experimental Digital Photo	
COM 202	Visual Design I	
COM 441	Media and Community Engagement	
COM 442	Non-Profit Communications	
COM 473	Special Topics/ Com&Digi Media	
FMK 303	Food Marketing Communication	
FMK 314	International Food Marketing	
MKT 201	Principles of Marketing	
MKT 301	Integrated Mktg Communications	
MKT 302	Consumer & Buyer Behavior	
MKT 303	MKT Communications	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 321	Advertising	
MKT 343	Entertainment Marketing	
MKT 353	Sports Marketing	
MTF 284	Digital Filmmaking	
MTF 287	Commercial Production	
CSC 110	Building Virtual Worlds	
CSC 115	Intro to Computer Science	
CSC 125	CSC I:Programming Fundamentals	
CSC 131	Web Design for All	

CSC 134	Databases for All
CSC 341	Introduction to Graphics
ENG 206	Public Speaking & Presentation
ENG 263	Writing for Organizations
ENG 265	Writing for Public Relations
ENG 268	Fact-checking and Fake News
ENG 269	Intro Media & Cultural Studies
ENG 350	Advanced News Reporting
ENG 365	Multimedia Journalism
SOC 102	Social Problems
SOC 205	Ethnic & Minority Relations
SOC 208	Sociology of Gender
SOC 217	Mental Health & Society
PSY 123	Psychology of Men and Women
PSY 127	Behavioral Economics
PSY 220	Sensation and Perception
PSY 223	Health Psychology
PSY 240	Sports Psychology

Total Hours 39

Independent Study Program

Independent study courses may be taken for upper division credit in a student's major department. Advanced or specialized work in Art and Art History may be pursued under the guidance of a faculty mentor within the independent study program. Students requesting an independent study should contact the faculty member to be involved in the project at least two weeks prior to the registration period. Students must submit a written project proposal which outlines topics and goals.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
World History		3
INT 151	Inequality in American Society	1
GDS 190	Fundamentals of Graphic Design	3
Philosophy Level One		3
Non-Native Language		3-4
Hours		16-17
Spring		
Mathematics		3-4
Philosophy Level One		3
Theology		3
GDS 116	History of Graphic Design	3
Free Elective		3
Hours		15-16
Sophomore		
Fall		
GDS 290	Typography I	3
Literature		3
Religious Studies		3
Diversity		3
Free Elective		3
Hours		15
Spring		
Social Science		3

GDS 292	Typography II	3
Mission Specific Overlay		3
Free Electives		6
Hours		15
Junior		
Fall		
Natural Science		4
Major Elective		3
Free Electives		9
Hours		16
Spring		
Major Elective		3
Free Electives		12
Hours		15
Senior		
Fall		
ART 495	Senior Project I (Capstone)	3
Major Elective		3
Free Electives		9
Hours		15
Spring		
ART 496	Senior Project II (Capstone)	3
GDS 492	Portfolio & Professional Pract	3
Free Electives		9
Hours		15
Total Hours		122-124

Graphic Design Minor

Visual communication is vital in the world today. The Graphic Design minor is a cross-disciplinary minor including the Art, Communications and Media Studies, and Marketing departments. Graphic design students develop skills in visual organization, information hierarchy, branding, and typography. They develop an understanding of principles of color and composition and analysis and idea generation using industry standard graphics software. Students also learn about problem solving and the role of design in society. The graphic design program at Saint Joseph's also assists students secure internships that help secure employment after graduation.

Learning Goals and Outcomes

Goal 1: To develop a visual awareness through analysis and creative work

Outcome 1.1: Students will be able to distinguish the design components.

Outcome 1.2: Students will be able to discuss the context of their design work.

Goal 2: To manifest their visual awareness in their own work

Outcome 2.1: Students will be able to produce a design portfolio.

Outcome 2.2: Discuss how their design work fits into a contemporary and historical context.

Requirements

Students must take the four foundation courses plus any two elective courses.

Code	Title	Hours
Foundation Courses:		
GDS 190	Fundamentals of Graphic Design	3
GDS 290	Typography I	3
GDS 292	Typography II	3
Choose one of the following		3
GDS 116	History of Graphic Design	
GDS 390	Commercial Design	
GDS 490	Visual Identity and Branding	
COM 372	Intro to Web Design	
Elective Courses:		6
ART 173	Digital Photography I	
ART 175	Image Manipulation: Photoshop	
ART 273	Commercial Photography	
ART 275	Experimental Digital Photo	
GDS 392	Editorial Design	
GDS 492	Portfolio & Professional Pract	
COM 202	Visual Design I	
COM 441	Media and Community Engagement	
COM 442	Non-Profit Communications	
COM 473	Special Topics/ Com&Digi Media	
FMK 303	Food Marketing Communication	
FMK 314	International Food Marketing	
MKT 201	Principles of Marketing	
MKT 301	Integrated Mktg Communications	
MKT 302	Consumer & Buyer Behavior	
MKT 303	MKT Communications	
MKT 321	Advertising	
MKT 343	Entertainment Marketing	
MKT 353	Sports Marketing	
Total Hours		18

Museum Studies Minor

Museums are essential cultural institutions that play an important role in society by preserving and interpreting the past for future generations. Using various means to study, present, and promote their collections, museums educate, entertain, and inspire their audiences. The Museum Studies minor at Saint Joseph's University is an interdisciplinary program that reflects the wide variety of possible professions in the museum world of today. Students are trained in the history, theory, and ethics of museums. In addition, students can customize their curriculum with electives that take into account their particular interests and career goals, which could include curatorial work, exhibition design, museum education, registration and collections management, marketing and social media, fundraising and development, non-profit management, and digital technology with a variety of applications. Students will also gain hands-on experience with an internship in one of the wide variety museums in the Philadelphia area. They will also be able to take advantage of opportunities at the Frances M. Maguire Art Museum, set within the Barnes Arboretum at Saint Joseph's University.

Learning Goals and Outcomes

Goal 1: Know and demonstrate an understanding of the history and theory of museums of various types, including, but not limited to, art

museums, history museums, science museums, and historic houses and monuments.

Goal 2: Know and demonstrate an understanding of the different types of museum work, with a particular emphasis on their own academic interests and career goals, through a careful selection of elective courses.

Goal 3: Know and demonstrate a hands-on understanding on museums through an internship appropriate to their academic interests and career goals.

Requirements

Code	Title	Hours
Choose one of the following Art History courses:		3
ARH 210	Museum Studies	
ARH 215	Museum Ops, Mgmt & Professions	
Choose one of the following History courses:		3
HIS 306	Sports & Spectacle Greece/Rome	
HIS 308	Race & Ethnicity Greece/Rome	
HIS 392	Museums, Monuments, and Media	
Choose one of the following courses:		3
ARH 481	Museum Internship	
HIS 491	Philadelphia Area Internship	
POL 491	Philadelphia-Area Internship	
Three additional courses, depending on student interest, from the list of electives below (students are limited to no more than 2 courses from the same subject code)		9
Any Art History (ARH) course a student is eligible to take		
Any studio Art (ART) course a student is eligible to take		
CHM 120	General Chemistry I	
CHM 125	General Chemistry II	
CHM 210	Organic Chemistry I	
CHM 215	Organic Chemistry II	
COM 202	Visual Design I	
COM 372	Intro to Web Design	
COM 441	Media and Community Engagement	
COM 442	Non-Profit Communications	
CSC 131	Web Design for All	
CSC 134	Databases for All	
CSC 351	Database Management Systems	
ENG 206	Public Speaking & Presentation	
ENG 263	Writing for Organizations	
ENG 265	Writing for Public Relations	
ENG 446	Writing the Grant Proposal	
Any History (HIS) course 300 level or above		
HON 221	Rebels&Revolutionaries:Art&Lit	
ITA 306	The Roman Experience	
ITA 315	Italy Through Art	
ITA 345	Art Fashion: la moda italiana	
ITA 425	Italian Art and Artists	
IST 115	Italy Through Art	
IST 460	The Art of Dante's Inferno	
PHL 310	Philosophy of Art	
PHL 320	Business, Society and Ethics	

PSY 128	Psychology and Architecture
PSY 129	Industrial/Organizational Psyc
PSY 130	Art Therapy
DSS 330	Database Management
MGT 110	Essent'ls of Organizational Beh
MGT 120	Essentials of Management
MGT 200	Intro to Project Management
MGT 210	Business Stakeholders & Ethics
MGT 211	Perspectives on Leadership
MGT 220	Intro Human Resource Managemen
MGT 360	Legal Environment of Business
MKT 201	Principles of Marketing
MKT 202	Marketing Research
MKT 303	MKT Communications
MKT 314	Social Media Marketing
MKT 316	Digital Marketing
MKT 321	Advertising
MKT 324	Public Relations and Publicity
MKT 343	Entertainment Marketing
MKT 350	Event Marketing
EDU 121	Child Development
EDU 151	Cognition & Learning w/ Field
EDU 157	Adolescent Development w/Field
EDU 246	Language and Culture w/ Field
EDU 362	Soc Stud Thru Arts PK4 w/Field
EDU 410	Instr Techniq English w/Field
EDU 412	Instr Techniq Soc St w/Field
EDU 422	Instruct Tech. for Art Edu
REL 360	Religion & Art in East Asia

Total Hours **18**

Asian Studies

Asian Studies is an interdisciplinary major and minor that encourages, facilitates, and recognizes the study of Asia, broadly defined as the region from the Persian Gulf to the Philippines, including the present states of China, Japan, Korea, Mongolia, Taiwan, Vietnam, Cambodia, Laos, Thailand, Indonesia, Malaysia, Singapore, Burma, Bangladesh, India, Pakistan, Afghanistan, Iran, and the Central Asian Republics of the former Soviet Union.

Asian Studies students prepare themselves for graduate study or professional work by studying the language, history, culture, and politics of the region. Currently, departments including Art and Art History, Economics, English, History, Languages and Linguistics, Philosophy, Political Science, Theology and Religious Studies offer Asian Studies courses. Students are encouraged to study abroad in the region as part of their university program. The program offers a limited number of scholarships in support of such study.

Students are required to register and consult with the Director of the Asian Studies program, and may earn a major or minor in Asian Studies.

Faculty

The Nealis Program in Asian Studies emphasizes understanding of Asian cultures by combining a solid foundation in the liberal arts

with specialized knowledge of Asia and its cultures. The program thus prepares graduates for success with a wide variety of career opportunities. Currently, participating departments include Art and Art History, Economics, English, History, Languages and Linguistics, Philosophy, Political Science, and Theology and Religious Studies.

Asian Studies Program Contact Information (https://www.sju.edu/degree-programs/asian-studies/#faculty&_ga=2976256239668220891676297075-10866635421674493415)

Programs

Undergraduate Major

- Asian Studies (p. 65)

Undergraduate Minor

- Asian Studies (p. 68)

Asian Studies Major

Learning Goals and Outcomes

Goal 1: Students will achieve Intermediate Low Oral Proficiency in an Asian language (by ACTFL standards).

Outcome 1: Students will be able to communicate effectively in an Asian language

Goal 2: Students will explore Asia's importance in the world through interdisciplinary investigation.

Outcome 2: Students will be able to apply a variety of tools, methods, and perspectives to understand Asian societies.

Goal 3: Students will conduct research about Asia and present their findings.

Outcome 3: Students will produce research using the methods and scholarly conventions of one or more Asian Studies disciplines to present their findings.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Major Requirements

1. Are required to attain intermediate language competency in their area of concentration;¹
2. Must take a Foundational Heritage Course;
3. Must complete a minimum of seven elective courses, with at least four courses focusing on one geographic Area of Concentration: **East or South Asia**, and two courses focusing on another;

- a. Electives must be distributed across at least four different departments;
- b. Electives must be distributed across three categories: Art/ Literature/ Language; Philosophy/ Theology and Religious Studies; Social Science

4. Must take two OTHER Area Studies courses and one Methodology course:

- a. Two OTHER Area Studies courses should cover areas outside Asia.
- b. One course must focus on Methodology (see pre-approved list).

See below for pre-approved course offerings. Other courses, with at least 60% of the content focusing on Asia, may be accepted with the permission of the Program Director.

Code	Title	Hours
Language Requirement		6-8
CHN 101	Beginning Chinese I	
CHN 102	Beginning Chinese II	
CHN 201	Intermediate Chinese I	
CHN 202	Intermediate Chinese II	
CHN 301	Chinese Conv and Comp I	
CHN 302	Chinese Conv and Comp II	
CHN 306	Advanced Chinese I	
CHN 307	Advanced Chinese II	
CHN 470	Selected Topics - Chinese	
JPN 101	Beginning Japanese I	
JPN 102	Beginning Japanese II	
JPN 201	Intermediate Japanese I	
JPN 202	Intermediate Japanese II	
JPN 301	Japanese Conversation	
JPN 302	Japanese Conversat & Compos II	
JPN 470	Special Topics in Japanese	
Foundational Heritage		
This course provides a broad overview of Asia, and will emphasize the fundamental background on which students will build in their later courses, including the basic linguistic, geographic, cultural, religious, and historical trends that have shaped East and South Asia.		
HIS 208	Historical Intro to Asian Civs	3
Electives in Area of Concentration		21
ARH 105	East Asian Art & Architecture	
ARH 111	Art & Arch of Islamic World	
ART 149	Japanese Pottery & Tea Culture	
ECN 475	Asian Economies	
ECN 476	Women & Econ Dev in South Asia	
ECN 477	Chinese Economics	
ENG 315	Literature of South Asia	
ENG 415	Postcolonial Studies	
ENG 414	Modern and Contemporary Epic	
HIS 339	The Mongol Empire	
HIS 350	Exchng & Conq in Mod E. Asia	
HIS 351	Gndr, Ideolgy & Rev in E. Asia	
HIS 352	Late Imperial China	

HIS 353	Modern China
HIS 354	Japan Since 1600
HIS 356	Modern South Asia
HIS 357	History of Islam in Asia
HIS 358	Contemporary China
HIS 359	India & Pak: Colony to Nation
PHL 268	The Self: East and West
PHL 308	Asian Philosophies
PHL 309	Personhood in Islamic Phil
POL 113	Intro to Comparative Politics
or POL 115	Intro to Global Politics
POL 333	Asian Democ at the Crossroads
POL 339	Asian Dictators
POL 350	Haunted by the Past
POL 364	IR of East Asia: War and Peace
REL 241	Islam
REL 261	Hinduism
REL 262	Modern Hinduism
REL 265	Daoism
REL 342	Women in Muslim Tradition
REL 343	Reason Science&Faith in Islam
REL 356	Death & Afterlife Chinese Rel
REL 360	Religion & Art in East Asia

OTHER Area Studies 6

Two OTHER Area Studies courses are required. These parallel the interdisciplinary nature of the major, and afford students the opportunity to explore other major Area Studies fields (Africana Studies, Irish Studies, Latin American Studies) taught at SJU. This component complements the major by exposing students to comparative perspectives on history, culture, politics and economics, broadening their understanding of the world and of the place of Asia within it. Note that some of these courses have pre-requisites.

ENG 211	Black Popular Culture
ENG 304	Global Shakespeares
ENG 317	Literature of South Africa
ENG 329	Black Women Writers
ENG 411	Black British Literature
ENG 429	The Civil Rights Movement
ENG 468	Media/Culture in South Africa
HIS 210	History of Modern Africa
HIS 343	African Ethnicities
REL 271	African & Caribbean Religions

Irish Studies includes but is not limited to the following courses:

ENG 309	British/Irish Immigration Lit
ENG 311	21st Century Irish Literature
ENG 313	Cont Irish Women's Writing
ENG 314	Irish Environmental Writing
ENG 404	Eng,Irish,Anglophone Authors
ENG 451	N. Ireland Conflict & Story

Latin American and Latinx Studies includes but is not limited to the following courses:

HIS 203	Historical Intro to Latin Am
HIS 204	Latin American-U.S. Migration

HIS 303	History of Modern Mexico
POL 331	Latin American Politics
SPA 350	Intro to Latin Amer Cultures
SPA 415	Iconic Women of Latin America

Methodology Course **3**

Asian Studies majors must also take a methodology course. Students will select from a menu of courses designed to introduce them to fundamentals of social science theory. The intent of this course will be to equip students with analytic tools that they may make use of in their Asian Studies courses. Note that some of these courses have pre-requisites.

ECN 101	Introductory Economics Micro
ECN 102	Introductory Economics Macro
ECN 321	International Trade
ECN 322	International Macroeconomics
ENV 102	Environmental Ethics
MAT 118	Introduction to Statistics
ENV 105	The Environment
POL 117	Intro to Political Thought
POL 305	Politics, Ideology, & Film
POL 352	Global Political Economy
POL 367	Ethics in International Affairs
POL 368	Sex & Power around the World
REL 101	Comparative Religion
SOC 211	Classical Sociological Theory

Seminar in Asian Studies **3**

The senior experience is designed to enable students to synthesize what they have learned during their time at SJU, and will typically take the form of a research seminar and/or thesis. Students are strongly encouraged to present their work at the Greater Philadelphia Asian Studies Consortium conference each spring.

HIS 476	Seminar in Asian History
HIS 478	Seminar Global Comparative His
HIS 481	Readings in Asian Hist
POL 403	Capstone: Nations & Nationalism
POL 409	Capstone: Global Migration

Total Hours 42-44

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Study Abroad

The Asian Studies program considers experience in Asia to be an essential means of understanding. All Asian Studies majors are expected to spend at least one term (fall, spring, or summer) in a study-abroad program in Asia. There are currently approved programs in China, Japan, and Korea. This requirement can frequently be met through programs with existing ties to SJU, including The Beijing Center (operated by a consortium of Jesuit universities), Sofia University in Tokyo, and Sogang University in Seoul. Students may also petition for other semester, year or summer programs in Asia.

1. Two sequential intermediate classes (200-level) in the same Asian language (each course consisting of a minimum of three semester credit hours) at SJU or another US institution.
2. Language examination confirming intermediate-level competency
3. One semester language intensive study-abroad experience.

This requirement is seen as a minimum. The program encourages majors to attain fluency in an Asian language. Ideally, students will augment language study at SJU with an immersion experience of a semester or more. Part of the program's endowment will be dedicated to funding student needs for study abroad.

For languages not offered at SJU (Hindi, Urdu, Korean, etc.), the program may help interested students find appropriate instruction at other institutions or abroad, unless and until SJU is able to offer these languages on campus.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
Non-Native Language		3-4
HIS 208	Historical Intro to Asian Civs	3
Religious Studies		3
Mathematics or Natural Science		3-4
INT 151	Inequality in American Society	1
Hours		16-18
Spring		
PHL Level One (Ethics or Non-Ethics)		3
World History		3
Natural Science or CCC: Math		3-4
THE		3
Hours		12-13
Sophomore		
Fall		
PHL 2 (Non-Ethics or Ethics)		3
Social Science		3
LIT or Art/Creativity		3
Major Elective #1		3
Hours		12
Spring		
Art/ Creativity or LIT		3
Diversity		3
Major Elective #2: Methodology		3
Major Elective #3		3
Hours		12
Junior		
Fall		
Asian Studies Majors should consider studying abroad during the Junior Year.		
Major Elective #4		3
Major Elective #5		3
Free Electives		9
Hours		15
Spring		
Asian Studies Majors should consider studying abroad during the Junior Year.		
Major Elective #6		3
Free Electives		12
Hours		15

¹ The language requirement may be satisfied in one of three ways.

Senior	
Fall	
Free Electives	6
Major: Senior Seminar /Capstone (WI)	3
Mission Specific	3
Major Elective #7- OTHER Area Studies 1	3
Hours	15
Spring	
Major Elective #8- OTHER Area Studies 2	3
Free Electives	12
Hours	15
Total Hours	112-115

Asian Studies Minor

Learning Goals and Outcomes

Goal 1: Students will explore Asia's importance in the world through interdisciplinary investigation.

Outcome 1: Students will be able to apply a variety of tools, methods, and perspectives to understand Asian societies.

Goal 2: Students will conduct research about Asia and present their findings.

Outcome 2: Students will produce research using the methods and scholarly conventions of one or more Asian Studies disciplines to present their findings.

Requirements

Students completing the Minor in Asian Studies fulfill a six-course requirement. To ensure the interdisciplinary nature of the program, courses must be taken from at least three departments, and no more than three courses from any one department may count for credit toward the minor. Although language competency is not required for the minor, language study is encouraged.

List of Approved Courses

Code	Title	Hours
CHN 101	Beginning Chinese I	4
or CHN 102	Beginning Chinese II	
CHN 201	Intermediate Chinese I	3
or CHN 202	Intermediate Chinese II	
CHN 301	Chinese Conv and Comp I	3
or CHN 302	Chinese Conv and Comp II	
CHN 310	Selections in Chinese Lit	3
CHN 470	Selected Topics - Chinese	3
JPN 101	Beginning Japanese I	4
or JPN 102	Beginning Japanese II	
JPN 201	Intermediate Japanese I	3
or JPN 202	Intermediate Japanese II	
JPN 301	Japanese Conversation	3
or JPN 302	Japanese Conversat & Compos II	
JPN 310	Selections in Japanese Lit I	3
ARH 105	East Asian Art & Architecture	3
ARH 111	Art & Arch of Islamic World	3
ART 149	Japanese Pottery & Tea Culture	3

ARH 216	Curating an Exhibition	When Content focuses on Asia	3
ECN 475	Asian Economies		3
ECN 476	Women & Econ Dev in South Asia		3
ECN 477	Chinese Economics		3
ENG 315	Literature of South Asia		3
ENG 415	Postcolonial Studies		3
HIS 208	Historical Intro to Asian Civs		3
HIS 350	Exchnng & Conq in Mod E. Asia		3
HIS 351	Gndr, Ideolgy & Rev in E. Asia		3
HIS 352	Late Imperial China		3
HIS 353	Modern China		3
HIS 354	Japan Since 1600		3
HIS 356	Modern South Asia		3
HIS 357	History of Islam in Asia		3
HIS 358	Contemporary China		3
HIS 359	India & Pak: Colony to Nation		3
HIS 476	Seminar in Asian History		3
HIS 478	Seminar Global Comparative His	When Content focuses on Asia	3
HIS 481	Readings in Asian Hist		3
PHL 309	Personhood in Islamic Phil		3
POL 333	Asian Democ at the Crossroads		3
POL 339	Asian Dictators		3
POL 350	Haunted by the Past		3
POL 364	IR of East Asia: War and Peace		3
REL 241	Islam		3
REL 261	Hinduism		3
REL 265	Daoism		3
REL 343	Reason Science&Faith in Islam		3
REL 356	Death & Afterlife Chinese Rel		3
REL 360	Religion & Art in East Asia		3
REL 370	Spec Topics in Relig Studies	When Content focuses on Asia	3

Biology

The Biology Department has as its aim the education of broadly trained biologists who are well grounded in chemistry, physics, and mathematics, and have command of the written and spoken word. Emphasis is placed on understanding basic principles and concepts in biology, and the application of those principles through analysis of data and synthesis of information learned in the classroom and the research laboratory. The Biology program has always been known as a training ground for individuals pursuing professional careers in the life sciences. Many graduates from the majors offered by the Biology Department have gone on to professional schools, pursued graduate studies, or entered the work force directly in academic, government, clinical, and industrial labs. This requires that our students be prepared to face the challenges of a competitive world. To help them meet these challenges the Department of Biology has established a strong advising program. Faculty commitment to academic advising and accessibility of faculty advisors to students exemplifies the institutional mission of cura personalis.

Faculty

The biology department's faculty and staff members are scientists, scholars, educators, mentors and advisers who are eager to engage in research and support students throughout their journey in the ever-evolving field of life sciences.

Department of Biology Faculty & Staff (<https://www.sju.edu/departments/biology/faculty-staff/>)

Programs

Undergraduate Majors

- Biology (p. 71)
- Biological Studies (p. 69)
- Biomedical Sciences (p. 76)
- Medical Laboratory Science (p. 78)

Undergraduate Minor

- Biology (p. 74)

Undergraduate Certificate

- Medical Laboratory Science (p. 81)

Graduate

- Biology MS (p. 75)
- Biology MA (p. 70)
- Genomics (p. 78)

Graduate Certificate

- Genomics (p. 78)

Biological Studies Major

The BA in Biological Studies is a program for students who enter Saint Joseph's University through one of the block-transfer agreements, and who have completed two-years in a biology major, or closely related program. This degree has fewer requirements than the BS in Biology, which will allow block-transfer students to normally graduate in two years.

The BA in Biological Studies can be an excellent program for block-transfer students who want to enter allied health professions programs such as Physician Assistant, Doctor of Physical Therapy, Doctor of Occupational Therapy, Doctor of Pharmacy, and others. It is also an excellent program for students wanting to enter various industries in the life sciences, or who wish to pursue a research-based graduate degree.

It is important to note that, due to the reduced range of course requirements, the BA in Biological Studies does not include the prerequisite courses for medical, dental, or veterinary school. Students interested in entering these programs after graduating from Saint Joseph's University should enroll in the BS in Biology program instead.

Learning Goals and Outcomes

Goal 1: Students will understand cell structure and function, the organization of biological systems, and the evolution of biological diversity.

Outcome 1.1: Students will be able to describe the mechanisms of evolutionary change and the diversity of life.

Outcome 1.2: Students will be able to describe biochemical processes of living organisms and the role of macromolecules in these processes.

Outcome 1.3: Students will be able to describe how organisms interact with their abiotic and biotic environment.

Outcome 1.4: Students will be able to describe molecular, classical, and population genetics.

Goal 2: Students will develop skills in experimental design and the presentation of scientific information.

Outcome 2.1: Students will be able to design an experiment, operate basic laboratory equipment, reduce and present data that includes the interpretation of statistical tests.

Outcome 2.2: Students will be able to develop written and oral presentations of scientific content.

Goal 3: Students will demonstrate career preparation through learning opportunities that are closely related to the field.

Outcome 3.1: Students will complete the BIO 290 Career Development Seminar, attend at least three semesters of the BIO 390 Seminar series, and be exposed to various professions in biologically-related areas.

Requirements

The BA in Biological Studies is a major that is only open for students entering SJU with an Associate's Degree in Biology or a closely-related discipline, through a block-transfer agreement. This program of study has fewer requirements compared to the BS in Biology or Biomedical Sciences, and can be completed by most block-transfer students in four semesters.

The BA in Biological Studies provides an excellent route in various career options, including graduate programs in the allied health professions, direct-entry jobs in industry, and some other graduate programs. Please note that it is not ideal for students looking to enter medical, dental, veterinary, or other similar professional school programs, nor is it designed for students looking to enter a PhD program in the life sciences after graduation. The traditional BS in Biology degree is a better option for those pursuits.

Core Requirements: If one of these PHL/THE courses were completed as part of your Bachelor's program at SJU, they will apply to the core requirements; however, to meet program credit hours a student will need to take a 3 credit general elective. Please see the Block Transfer policy (p. 15) for more information.

Transfer of Associates Degree courses will transfer in under "Block" up to 60 credits.

Must Be Taken at SJU

Code	Title	Hours
PHL Level 1	Core Requirement	3
THL	Core Requirement	3
Total Hours		6

Major Requirements

Code	Title	Hours
MAT 120	Precalculus (May be taken for CCC Mathematics)	3
or MAT 155	Fundamentals of Calculus	

MAT 128	Applied Statistics	3
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab (May be taken for CCC Natural Science)	4
BIO 102 & 102L or BIO 151L	Bio II: Genetics and Bio II: Genetics Lab Phage Lab	4
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
BIO 290	Career Development Seminar	0
BIO 390	Biology Seminar (Three semesters required after taking BIO 290)	0

Three upper-level biology courses, from from Group A, one from Group B, and one from Group C, below: ¹

Group A: Cell Structure and Function		4
BIO 402	Advanced Cell Biology	
BIO 411	Molecular Genetics	
BIO 416	Microbiology	
BIO 421	Molecular&Cellular Biophysics	
BIO 424	Biotechnology	
BIO 427	Human Genetics	
BIO 428	Histopathology	
BIO 430	Neurological Disorders	
Group B: Systemic Organization		4
BIO 405	Biomechanics	
BIO 412	Neurobiology	
BIO 413	Plant Physiological Ecology	
BIO 415	Immunology	
BIO 417	Systemic Physiology	
BIO 425	Bacterial Pathogenesis	
Group C: Evolution and Diversity of Life		4
BIO 401	Animal Behavior	
BIO 472	Aquatic Biology	
BIO 406	Human Anatomy	
BIO 409	Ecology	
BIO 419	Invertebrate Zoology	
BIO 420	Bioinformatics	
BIO 422	Applied & Environ Microbiology	
BIO 423	Evolution	
BIO 426	Fermentation Science	
BIO 429	Environmental Science	

At least 6 additional credits of upper-level Biology courses. These credits can be from any of the courses in group A - C above, as well as in groups D and E, below.

Group D courses ²		6
BIO 218	Hematology	
BIO 230	Basic Concepts & Proc MLS	
BIO 348	Applied Clinical Microbiology	
BIO 433	Parasitology	
Group E courses: Non-lab courses		

BIO 219	Nutrition	
BIO 404	Biochemistry ³	
BIO 474	Emrg Bio Threat & Gbl Sustain	

Chemistry/Physics Elective 8

Students may choose to take either both semesters of Organic Chemistry (CHM 210 & CHM 210L, CHM 215 & CHM 215L) or both semesters of General Physics (PHY 101 & PHY 101L, PHY 102 & PHY 102L). Transfer credit may be applicable and may fulfill this major requirement.

Total Hours 52

¹ BIO 101 (<https://academiccatalog.sju.edu/search/?P=BIO%20101>), BIO 102 (<https://academiccatalog.sju.edu/search/?P=BIO%20102>), BIO 201 (<https://academiccatalog.sju.edu/search/?P=BIO%20201>) and CHM 120 (<https://academiccatalog.sju.edu/search/?P=CHM%20120>), CHM 125 (<https://academiccatalog.sju.edu/search/?P=CHM%20125>) are prerequisite for all 400 level BIO courses.

² One semester of BIO 493 or BIO 494 (Independent Research) and/or BIO 492 (Biology Internship) may count as one Group D biology elective. For students doing a year-long honors thesis, both BIO 493 and BIO 494 may be counted as Group D biology electives. For non-honors research, the second semester of research will count as a free elective.

³ CHM 215/CHM 215L is a prerequisite or co-requisite for BIO 404

Biology MA

Co-Directors

- Dr. Bela Peethambaran (<https://directory.sju.edu/bela-peethambaran/>)
- Dr. Edwin Li (<https://directory.sju.edu/edwin-li/>)

Mission Statement

The Master of Arts in Biology program at Saint Joseph's University is designed to provide training in technical and professional skills for students who wish to join the workforce as proficient scientists, or for students who desire to pursue a doctoral or professional degree.

Description of Program

The MA program is primarily course-based and more easily accommodates part-time as well as full-time students. Students seeking the MA degree may take up to six credits of research.

Learning Goals and Outcomes

Goal 1: Students will gain a deeper understanding of complex concepts in the field of biology.

Outcome 1.1: Students will be able to define advanced concepts in biology and biological research.

Outcome 1.2: Students will be able to analyze and evaluate scientific information.

Requirements

The MA degree requires completion of 30 credit hours of graduate level courses.

Code	Title	Hours
Core Courses:		
BIO 552	Graduate Seminar (at least 1 semester)	1
BIO 786	Research Ethics	1
BIO 801	Scientific Discourse (at least 1 semester)	1
MAT 704	Statistics for Research	3
Electives:		
Six (6) Biology electives (600 level or higher, 3-4 credits each). Students may take up to 6 credits of Research Credits (BIO793) and up to 6 credits of Graduate Internship (BIO791) as Biology electives.		24
Total Hours		30

Biology Major Overview

The BS in Biology curriculum begins with a core of courses that presents the fundamentals of the life sciences, both in concept and methodology. After completing the core, students take a distribution of upper division courses with at least one course in each of the three major areas of biology. This distribution strategy insures that all students have broad exposure to an extensive range of topics including cell and molecular biology, microbiology, genetics, plant biology, evolution, physiology, ecology, environmental biology, and animal behavior. The curriculum provides appropriate training for students seeking admission to professional and graduate schools and those who wish to enter the job market directly following graduation.

The faculty of the Department of Biology view teaching as the primary mission of both the Department and the University. In addition, Biology faculty are involved in high caliber scientific research. The interplay between teaching and research, and the involvement of students in faculty research strengthens the Biology curriculum. One of the most important qualities of the Department is the opportunity for undergraduates to participate in faculty research. This mentor-student relationship involves the design and execution of experiments, and is a very enriching learning experience. Students can work with faculty as volunteers, for academic credit, or for pay during the summer months. The research done by students often leads to publications and presentations at national and regional conferences. Whatever the career plans, students are encouraged to seriously consider participating in undergraduate research. Up to two semesters of research may be counted as biology electives.

The Department of Biology also has a small but strong graduate program that leads to either a MS or a MA degree in biology. The MA degree is primarily designed for post-graduates who are working or wishing to improve their credentials for professional school. The MS degree requires the development and presentation of a thesis based on original research. This degree is more appropriate for full-time students wishing to engage in research as part of a career or as a prelude to graduate training at the doctoral level. Students in the MS program may be eligible for a teaching assistantship that provides a tuition scholarship and stipend. The presence of diverse and engaged graduate students enhances both faculty research and the academic experience for undergraduate students.

Advisory Option - Biology Pre-Professional

Biology majors may satisfy entrance requirements for medical, dental, osteopathic medical, and other schools of the health professions. Students are advised to take elective courses in liberal arts and behavioral sciences.

Learning Goals and Outcomes

Goal 1: Students will understand cell structure and function, the organization of biological systems, and the evolution of biological diversity.

Outcome 1.1: Students will be able to describe the mechanisms of evolutionary change and the diversity of life.

Outcome 1.2: Students will be able to describe biochemical processes of living organisms and the role of macromolecules in these processes.

Outcome 1.3: Students will be able to describe how organisms interact with their abiotic and biotic environment.

Outcome 1.4: Students will be able to describe molecular, classical, and population genetics.

Goal 2: Students will develop skills in experimental design and the presentation of scientific information.

Outcome 2.1: Students will be able to design an experiment, operate basic laboratory equipment, reduce and present data that includes the interpretation of statistical tests.

Outcome 2.2: Students will be able to develop written and oral presentations of scientific content.

Goal 3: Students will demonstrate career preparation through learning opportunities that are closely related to the field.

Outcome 3.1: Students will complete the BIO 290 Career Development Seminar, attend multiple semesters of the BIO 390 Seminar series, and be exposed to various professions in biologically-related areas.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3	
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Major Requirements

Code	Title	Hours
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab (counts as the CCC Natural Science requirement) <small>BIO 150L Can be taken in place of 101L</small>	4
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab (second semester, first year) <small>BIO 151L Can be taken in place of 102L</small>	4

BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab (first semester, sophomore year)	4
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BIO 290	Career Development Seminar (required for first-semester sophomores)	0
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BIO 390	Biology Seminar (required each semester for second-semester sophomores, juniors, and seniors)	0
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CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
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CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
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CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
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CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
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PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
or PHY 105 & 105L	University Physics I and University Physics Lab I	

PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
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or PHY 106 & 106L	University Physics II and University Physics Lab II	
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MAT 148	Applied Statistics Plus	4
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Mathematics (will count as CCC: Mathematics)

MAT 155	Fundamentals of Calculus	3-4
MAT 161	Calculus I	

Select one from each of the following three groups: ¹

Group A: Cell Structure and Function

BIO 402	Advanced Cell Biology	4
BIO 411	Molecular Genetics	
BIO 416	Microbiology	
BIO 421	Molecular&Cellular Biophysics	
BIO 424	Biotechnology	
BIO 427	Human Genetics	
BIO 428	Histopathology	
BIO 430	Neurological Disorders	

Group B: Systemic Organization

BIO 405	Biomechanics	4
BIO 412	Neurobiology	
BIO 413	Plant Physiological Ecology	
BIO 415	Immunology	
BIO 417	Systemic Physiology	
BIO 425	Bacterial Pathogenesis	

Group C: Evolution and Diversity of Life

BIO 401	Animal Behavior	4
BIO 472	Aquatic Biology	
BIO 406	Human Anatomy	
BIO 409	Ecology	
BIO 419	Invertebrate Zoology	
BIO 420	Bioinformatics	
BIO 422	Applied & Environ Microbiology	
BIO 423	Evolution	

BIO 426	Fermentation Science
BIO 429	Environmental Science

At least 13 additional credits of upper-level Biology courses. These credits can be from any of the courses in group A - C above, as well as in groups D and E, below. A maximum of 6 of these credits can be from group E courses.

Group D courses ²

BIO 218	Hematology
BIO 230	Basic Concepts & Proc MLS
BIO 348	Applied Clinical Microbiology
BIO 433	Parasitology

Group E courses: Non-lab courses, maximum of 6 credits

BIO 219	Nutrition
BIO 400	Developmental Genetics
BIO 404	Biochemistry ³
BIO 474	Emrg Bio Threat & Glbl Sustain

Total Hours 68-69

¹ BIO 101, BIO 102, BIO 201 and CHM 120, CHM 125 are prerequisite for all 400 level BIO courses.

² One semester of BIO 493 or BIO 494 (Independent Research) and/or BIO 492 (Biology Internship) may count as one Group D biology elective. For students doing a year-long honors thesis, both BIO 493 and BIO 494 may be counted as Group D biology electives. For non-honors research, the second semester of research will count as a free elective.

³ CHM 215/CHM 215L is a prerequisite or co-requisite for BIO 404

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives. Due to the large number of lab-based, four-credit courses that Biology majors take, students can schedule multiple semesters at four courses instead of the normal five if they wish.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
MAT 155	Fundamentals of Calculus	3
ENG 101	Craft of Language	3
Non-Native Language		3-4
Hours		17-18
Spring		
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
MAT 128	Applied Statistics	3
INT 151	Inequality in American Society	1
World History		3
Hours		15

Sophomore		
Fall		
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
Philosophy Level One		3
Free Elective		3
BIO 290	Career Development Seminar	0
Hours		14

Spring		
Biology Major Elective		3-4
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
Social Science		3
Theology		3
Elective/Overlay		3
BIO 390	Biology Seminar	0
Hours		16-17

Junior		
Fall		
Biology Major Elective		3-4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
Philosophy Level Two		3
Literature		3
Elective/Diversity		3
BIO 390	Biology Seminar	0
Hours		16-17

Spring		
Biology Major Elective		3-4
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Religious Studies		3
Diversity/Elective		3
Elective/Overlay		3
BIO 390	Biology Seminar	0
Hours		16-17

Senior		
Fall		
Biology Major Elective		3-4
Biology Major Elective		3-4
Fine & Performing Arts, Design & Creativity		3
Elective or Mission Specific		3
Overlay/Elective		3
BIO 390	Biology Seminar	0
Hours		15-17

Spring		
Biology Major Elective		3-4
Biology Major Elective		3-4
Overlay/Elective		3
Elective		1-3
Elective		1-3
BIO 390	Biology Seminar	0
Hours		11-17
Total Hours		120-132

Biology/Secondary Education

Students majoring in Biology who are interested in teaching grades 7-12 can dual major in Biology/Secondary Education (7-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an

Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their Biology advisor, Biology/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 (<https://academiccatalog.sju.edu/search/?P=EDU%20491>) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i)).

See the Secondary Education (7-12) major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

Code	Title	Hours
MAT 148	Applied Statistics Plus	4
BIO 102 & 102L or BIO 151L	Bio II: Genetics and Bio II: Genetics Lab Phage Lab	4
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
BIO 290	Career Development Seminar (Fall semester of sophomore year)	0
BIO 390	Biology Seminar (Every semester after BIO 290)	0
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
ENV 106 & 106L	Exploring the Earth and Exploring the Earth Laboratory	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Choose one course from each of the following three groups: ¹		
Group 1		3-4
BIO 412	Neurobiology	
BIO 401 & 401L	Animal Behavior and Animal Behavior Lab	
Group 2		4
BIO 402 & 402L	Advanced Cell Biology and Advanced Cell Biology Lab	
BIO 419	Invertebrate Zoology	

BIO 423	Evolution	
BIO 472	Aquatic Biology	
Group 3		4
Any BIO elective		
Total Hours		47-48

¹ BIO 101, BIO 102, BIO 201 and CHM 120, CHM 125 are prerequisite for all 400 level BIO courses.

Biology Minor

The minor in Biology curriculum begins with a core of three courses that presents the fundamentals of the life sciences, both in concept and methodology. After completing the core, students take three upper division courses with at least one course from two of the three major areas of biology (Groups A, B, and C). This distribution strategy insures that all students have broad exposure to an extensive range of topics including cell and molecular biology, microbiology, genetics, plant biology, evolution, physiology, ecology, environmental biology, and animal behavior.

Learning Goals and Outcomes

* Not all Learning Goals and Outcomes may be met by the minor since students have a choice of their upper-level courses.

Goal 1: Students will gain a fundamental understanding of cell structure and function, the organization of biological systems, and the evolution of biological diversity.

Outcome 1.1: Students will understand basic mechanisms of evolutionary change and the diversity of life.

Outcome 1.2: Students will understand basic concepts of molecular, classical, and population genetics, and basic biochemical processes in living organisms.

Outcome 1.3: Students will understand basic concepts of how organisms interact with their abiotic and biotic environment.

Goal 2: Students will develop basic skills in experimental design and the presentation of scientific information.

Outcome 2.1: Students will gain basic skills in data reduction, analysis, presentation, and the operation of basic laboratory equipment.

Outcome 2.2: Students will be able to develop cogent written and oral presentations of scientific content.

Requirements

Code	Title	Hours
Required Courses:		
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab (counts as the CCC Natural Science requirement)	4
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab (second semester, freshman year)	4
or BIO 151L	Phage Lab	

BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab (first semester, sophomore year)	4
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4

Take at least two courses from two different groups (A - C) below: ¹ 8

Group A: Cell Structure and Function

BIO 402	Advanced Cell Biology
BIO 411	Molecular Genetics
BIO 416	Microbiology
BIO 421	Molecular&Cellular Biophysics
BIO 424	Biotechnology
BIO 427	Human Genetics
BIO 428	Histopathology
BIO 430	Neurological Disorders

Group B: Systemic Organization

BIO 405	Biomechanics
BIO 412	Neurobiology
BIO 413	Plant Physiological Ecology
BIO 415	Immunology
BIO 417	Systemic Physiology
BIO 425	Bacterial Pathogenesis

Group C: Evolution and Diversity of Life

BIO 401	Animal Behavior
BIO 472	Aquatic Biology
BIO 406	Human Anatomy
BIO 409	Ecology
BIO 419	Invertebrate Zoology
BIO 420	Bioinformatics
BIO 422	Applied & Environ Microbiology
BIO 423	Evolution
BIO 426	Fermentation Science
BIO 429	Environmental Science

At least 3 additional credits of upper-level Biology courses. These credits can be from any of the courses in group A - C above, as well as in groups D and E, below. Independent Research (BIO 493 or 494) or an internship in biology (BIO 492) can also fulfill this requirement. 3

Group D courses ²

BIO 218	Hematology
BIO 230	Basic Concepts & Proc MLS
BIO 261	Anat&Physiol for AI Hlth II
BIO 348	Applied Clinical Microbiology
BIO 433	Parasitology

Group E courses: Non-lab courses

BIO 219	Nutrition
BIO 404	Biochemistry ³
BIO 474	Emrg Bio Threat & GIBI Sustain

Total Hours 31

² One semester of BIO 493 or BIO 494 (Independent Research) and/or BIO 492 (Biology Internship) may count as one Group D biology elective.

³ CHM 215/CHM 215L is a prerequisite or co-requisite for BIO 404

Biology MS

Co-Directors:

- Dr. Bela Peethambaran (<https://directory.sju.edu/bela-peethambaran/>)
- Dr. Edwin Li (<https://directory.sju.edu/edwin-li/>)

Mission Statement

The Master of Science in Biology program at Saint Joseph's University is designed to provide training in technical and professional skills for students who wish to join the workforce as proficient scientists, or for students who desire to pursue a doctoral or professional degree.

Description of Program

The MS program requires completion of traditional courses and an extensive research project that culminates with a written thesis. The degree is typically completed within two years.

Learning Goals and Outcomes

Goal 1: Students will gain a deeper understanding of complex concepts in the field of biology.

Outcome 1.1: Students will be able to define advanced concepts in biology and biological research.

Outcome 1.2: Students will be able to analyze and evaluate scientific information.

Goal 2: Students will develop skills used by research scientists.

Outcome 2.1: Students will will conduct scientific research and successfully defend a thesis project before a committee.

Requirements

The MS degree requires completion of 30 credits of graduate level courses.

Code	Title	Hours
Core Courses:		
BIO 552	Graduate Seminar (each fall semester of enrollment)	1-2
BIO 785	Introduction to Research (not required for students in the BS/MS 4+1 program)	1
BIO 786	Research Ethics	1
BIO 801	Scientific Discourse (each spring semester of enrollment)	1-2
MAT 704	Statistics for Research	3
BIO 799	Master's Research	13-15
Electives:		

¹ BIO 101, BIO 102, BIO 201, CHM 120 and CHM 125 are prerequisite for all 300 and 400 level BIO courses.

Two (2) Biology electives (600 level or higher) are required (3-4 credits each). Graduate courses outside Biology may count with approval of the Graduate Program Director.

6-8

Total Hours 26-32

Thesis Requirements

The MS degree requires completion of a research project in the biological sciences under the supervision of a research mentor. The findings are published in thesis form. A Thesis Committee will be formed to follow the progress of the candidate, evaluate the final thesis, and administer a final oral examination (thesis defense) based on the thesis research. The thesis must be acceptable in both scholarship and literary quality. To be recommended for the Master of Science degree in Biology, the candidate must receive approval of the majority of the committee members.

Biomedical Sciences Major Overview

Biomedical science puts foundational scientific knowledge into practice, spurring innovation in interventions, technology and biomedical engineering. This major is specifically designed for students planning to pursue careers in the allied health professions, translational medical research, and related areas. It is not well suited for students interested in entering medical, dental, veterinary and similar professional schools. Students interested in this programs, or doctoral programs in biology, should consider the BS in Biology instead.

Learning Goals and Outcomes

- Goal 1:** Students will understand cell structure and function, the organization of biological systems, and the evolution of biological diversity.
- Outcome 1.1:** Students will be able to describe human anatomy, physiology, and specialized organ and tissue processes.
- Outcome 1.2:** Students will be able to describe cellular, genetic, biochemical, and organismal-level processes of living organisms, including humans and human diseases.
- Outcome 1.3:** Students will be able to describe important areas in other scientific areas that relate to human health, including chemistry, physics, statistical analysis, and others.
- Goal 2:** Students will develop skills in experimental design and the presentation of scientific information.
- Outcome 2.1:** Students will be able to design an experiment, operate basic laboratory equipment, reduce and present data that includes the interpretation of statistical tests.
- Outcome 2.2:** Students will be able to develop written and oral presentations of scientific content.
- Goal 3:** Students will demonstrate career preparation through learning opportunities that are closely related to the field.
- Outcome 3.1:** Students will complete the BIO 290 Career Development Seminar, attend multiple semesters of the BIO 390 Seminar series, and be exposed to various professions in biologically-related areas.

Requirements Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Code	Title	Hours
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab (counts as the CCC Natural Science requirement)	4
or BIO 150L	Bio I: Cells Lab Phage	
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
or BIO 151L	Phage Lab	
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
BIO 260 & 260L	Anat&Physiol for AI Hlth I and Anatomy & Physiology Lab I	4
BIO 261 & 261L	Anat&Physiol for AI Hlth II and Anatomy & Physiology Lab II	4
BIO 290	Career Development Seminar	0
BIO 390	Biology Seminar	0
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
or PHY 105 & 105L	University Physics I and University Physics Lab I	
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
or PHY 106 & 106L	University Physics II and University Physics Lab II	
MAT 148	Applied Statistics Plus	
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	

Four courses total, with at least one course from each of the following three groups: 9-12

Group A: Clinical and Translational Biology

BIO 218	Hematology
BIO 219	Nutrition
BIO 230	Basic Concepts & Proc MLS
BIO 424	Biotechnology

BIO 428	Histopathology
BIO 425	Bacterial Pathogenesis
BIO 433	Parasitology

Group B: Biological Foundations of Medicine

BIO 402	Advanced Cell Biology
BIO 404	Biochemistry
BIO 411	Molecular Genetics
BIO 412	Neurobiology
BIO 415	Immunology
BIO 416	Microbiology
BIO 427	Human Genetics
BIO 430	Neurological Disorders

Group C: Connect and Impacts of Biology

BIO 401	Animal Behavior
BIO 472	Aquatic Biology
BIO 409	Ecology
BIO 413	Plant Physiological Ecology
BIO 419	Invertebrate Zoology
BIO 422	Applied & Environ Microbiology
BIO 423	Evolution
BIO 429	Environmental Science
BIO 474	Emrg Bio Threat & Gbl Sustain

Total Hours 56-60

Free Electives

Graduation requires 120 credits. Any courses needed to reach 120 credits after the CCC and major requirements are met will be considered free electives. As Biomedical Science majors take a large number of lab-based four-credit courses, they are able to take multiple semesters of just four courses, instead of the normal five.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
MAT 155	Fundamentals of Calculus	3
ENG 101	Craft of Language	3
Non-Native Language		3
Hours		17
Spring		
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
INT 151	Inequality in American Society	1
World History		
MAT 128	Applied Statistics	3
Hours		12
Sophomore		
Fall		
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4

CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
Philosophy Level One		3
Free Elective		3
BIO 290	Career Development Seminar	0
Hours		14
Spring		
Clinical and Translational Bio Elective		3-4
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
Social Science		3
Theology		3
Free Elective		3
BIO 390	Biology Seminar	0
Hours		16-17
Junior		
Fall		
BIO 260 & 260L	Anat&Physiol for Al Hlth I and Anatomy & Physiology Lab I	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
Overlay/Elective		3
Philosophy Level Two		3
Free Elective		3
BIO 390	Biology Seminar	0
Hours		17
Spring		
BIO 261 & 261L	Anat&Physiol for Al Hlth II and Anatomy & Physiology Lab II	4
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Biological Foundations of Medicine Elective		3-4
Religious Studies		3
Free Elective		3
BIO 390	Biology Seminar	0
Hours		17-18
Senior		
Fall		
Context and Impacts of Biology Elective		3-4
Diversity		
Free Elective		3-4
Overlay/Elective		3
Free Elective		3-4
BIO 390	Biology Seminar	0
Hours		12-15
Spring		
BMS Major Elective (any category)		3-4
Fine & Performing Arts, Design, & Creativity		3
Literature		3
Free Elective		6
BIO 390	Biology Seminar	0
Hours		15-16
Total Hours		120-126

Genomics Graduate Certificate

Saint Joseph's University's graduate online certificate in genomics gives you an advanced understanding of genomics and genetics and the role they place in pharmacy, medicine, nursing, social work, ethics, legal and computer science fields. Throughout this four-course program, you'll explore topics in DNA sequencing technologies, genetics research and personalized medicine. Each eight-week course will build upon the other,

giving you a solid foundation in concepts of genomics for use in your current role, or to prepare for further education. Credits earned during this program count towards Saint Joseph's online master's degree in genomics (<https://www.sju.edu/degree-programs/genomics-ms/>).

Requirements

Code	Title	Hours
GNM 701	Introduction to Genomics	3
GNM 702	Genetic Concepts Testing	3
GNM 703	Issues in Genomics & Pharma	3
GNM 715	Chromosomes & Human Disease	3
Total Hours		12

Genomics MS

Genomics is the future of the healthcare industry. There's no better time to pursue an education in this rapidly growing field than now.

The online master's in genomics program at Saint Joseph's University will teach you the advanced genetics and genome-based research and leadership skills needed to leverage your knowledge for improved disease research and patient care. In this 12-course program, you'll gain a critical understanding of genomics and genetics and their applications in healthcare and the health sciences. You'll also examine the role genomics plays in the study of public health and human disease.

Requirements

Code	Title	Hours
GNM 701	Introduction to Genomics	3
GNM 702	Genetic Concepts Testing	3
GNM 703	Issues in Genomics & Pharma	3
GNM 704	Cancer Genomics & Applications	3
GNM 710	Principles of Genetics	3
GNM 715	Chromosomes & Human Disease	3
GNM 720	Molec Basis Inherited Disease	3
GNM 725	Clinical App Genetics&Genomics	3
GNM 730	Evolutionary Analysis	3
GNM 735	Human Population Genetics	3
GNM 740	Public Health Genetics	3
GNM 745	Genomic Statistics & Research	3
Total Hours		36

Medical Laboratory Science Major

Saint Joseph's University's medical laboratory science program is one of the few hospital-based programs in the region directed by a certified medical laboratory scientist. And unlike many health sciences programs, our medical laboratory science major requires only four years of study. With a versatile curriculum taught by the Department of Biology's expert faculty (<https://www.sju.edu/departments/biology/faculty/>) at our University City campus and a year-long competitive clinical rotation in a medical or clinical lab, you'll learn the biological, physiological and pathological basis of disease, gaining an unparalleled understanding of the medical science field.

Learning Goals and Outcomes

Goal 1: Collaborate with diverse healthcare team members to provide patient care and perform quality, cost-effective laboratory procedures.

Outcome 1.1: Students will be able to use appropriate communication skills with other healthcare team members and determine appropriate follow-up actions.

Outcome 1.2: Students will be able to meet the MLS clinical practicum affective objective: "The student must demonstrate appropriate values, attitudes and ethical standards of practice held by members of the profession."

Outcome 1.3: Students will be able to meet appropriate clinical practicum objectives related to results reporting and documentation.

Goal 2: Incorporate concepts learned through classroom instruction and clinical practice to ensure accurate, meaningful laboratory results that reflect current standards of care.

Outcome 2.1: Student will be able to utilize analytical, interpretive, and problem-solving skills to demonstrate knowledge of theory underlying laboratory testing.

Outcome 2.2: Students will be able to apply academic preparation to entry level performance expectations.

Goal 3: Practice responsibly in compliance with ethical, social, legal and regulatory requirements of Medical Laboratory Science professionals.

Outcome 3.1: Students will be able to demonstrate responsibility and integrity in practice.

Outcome 3.2: Students will be able to utilize the required techniques to safely handle patient specimens to avoid contamination of the specimen and self or others.

Outcome 3.3: Students will be able to apply knowledge of ethical standards to practical situations.

Goal 4: Utilize appropriate methods for the basic operation and troubleshooting of laboratory instrumentation and information systems.

Outcome 4.1: Students will be able to meet the clinical chemistry practicum objective: "Demonstrate competence in the operation of instruments in the chemistry lab."

Outcome 4.2: Students will be able to use the microscope competently.

Goal 5: Recognize the importance of continuously integrating new technologies and procedures into clinical practice.

Outcome 5.1: Students will be able to identify, research, and present new technologies.

Outcome 5.2: Students will be able to adapt to changing healthcare environments.

Goal 6: Demonstrate a commitment to maintain competency and promote development through participation in professional activities.

Outcome 6.1: Students will be able to identify MLS professional organizations by participation in the MLS 102 MLS Orientation II during their freshman year.

Outcome 6.2: Students will be able to maintain competency in knowledge of theory by participation in continuing education events after graduation.

Outcome 6.3: Students will be able to pass the registry exam on the first attempt (within 1 year).

Academic Progression

To meet requirements for successful completion of the Medical Laboratory Science program, students must complete all MLS prefix courses with a grade of "C" (74%) or higher.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		

Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab (will count for CCC: Natural Science)	4
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
BIO 230 & 230L	Basic Concepts & Proc MLS and Basic Concepts Med Lab Sci Lab	4
BIO 260 & 260L	Anat&Physiol for AI Hlth I and Anatomy & Physiology Lab I	4
BIO 261 & 261L	Anat&Physiol for AI Hlth II and Anatomy & Physiology Lab II	4
BIO 270 & 270L	Clinical Micro and Clinical Microbiology Lab	4
BIO 402 & 402L	Advanced Cell Biology and Advanced Cell Biology Lab	4
BIO 404	Biochemistry ¹	3
BIO 415 & 415L	Immunology and Immunology Lab	4
MAT 128 or MAT 148	Applied Statistics or Applied Statistics Plus	3-4
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Medical Lab Science Elective: ²		4
BIO 218 & 218L	Hematology and Hematology Lab	
BIO 348 & 348L	Applied Clinical Microbiology and Adv Clinical Microbio Lab	
BIO 433 & 433L	Parasitology and Parasitology Lab	
Additional Science Requirements:		
MLS 102	MLS Orientation II	1

MLS 201	Med Lab Science Seminar	1
CHM 120	General Chemistry I	3
CHM 210	Organic Chemistry I	3
MLS Clinical Rotation		32-38
MLS 401	Fund Oper of Clinical Lab	2
MLS 402	Clin Parasitology and Mycology	2
MLS 411	Clinical Microbiology I	4
MLS 412	Clinical Microbiology II	4
MLS 421	Clinical Hematology I	4
MLS 422	Clinical Hematology II	4
MLS 431	Medical Lab Chemistry I	4
MLS 432	Medical Lab Chemistry II	3
MLS 441	Med Lab Immunology/Serology	2
MLS 442	Med Lab Immunohematology	3
MLS 451	Clinical Lab Practicum I	3

The exact titles of the clinical rotation courses may vary from site to site, but students will receive all of the required training in their fourth year rotations. Students must have completed at least 97 credits towards the MLS degree before they can enter the Clinical Rotations

Total Hours	120-128
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- ¹ Students may also take any of the biochemistry courses (300 level or higher) offered through the Biochemistry & Chemistry Department. Students who plan to seek certification in NY should also take a biochemistry lab.
- ² Students must take at least one course from the three Medical Laboratory Science electives listed below. Students may take more than one, but at least one is required.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
MAT 120	Precalculus	3
ENG 101	Craft of Language	3
Non-Native Language		3-4
Hours		17-18
Spring		
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
World History		3
INT 151	Inequality in American Society	1
MLS 102	MLS Orientation II	1
MAT 128	Applied Statistics	3
Hours		16
Sophomore		
Fall		
BIO 201	Bio III: Organismic Biology	4
BIO 201L	Bio III: Organismic Biol Lab	0
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1

BIO 270	Clinical Micro	4
BIO 270L	Clinical Microbiology Lab	0
Philosophy Level One		3
Major Elective		3
Hours		18
Spring		
BIO 402	Advanced Cell Biology	4
BIO 402L	Advanced Cell Biology Lab	0
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
BIO 230	Basic Concepts & Proc MLS	4
BIO 230L	Basic Concepts Med Lab Sci Lab	0
Philosophy Level Two		3
Major Elective		3
Hours		18
Junior		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
MLS 201	Med Lab Science Seminar	1
CHM 340 or BIO 404	Biochemistry or Biochemistry	3
CHM 340L	Biochemistry Lab	2
BIO 415	Immunology	4
BIO 415L	Immunology Lab	0
Free Electives		6
Hours		20
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
BIO 348	Applied Clinical Microbiology	4
BIO 348L	Adv Clinical Microbio Lab	0
Free Electives		9
Hours		17
Senior		
Fall		
MLS 401	Fund Oper of Clinical Lab	2
MLS 402	Clin Parasitology and Mycology	2
MLS 411	Clinical Microbiology I	4
MLS 421	Clinical Hematology I	4
MLS 442	Med Lab Immunohematology	3
MLS 431	Medical Lab Chemistry I	4
MLS 441	Med Lab Immunology/Serology	2
Hours		21
Spring		
MLS 412	Clinical Microbiology II	4
MLS 422	Clinical Hematology II	4
MLS 432	Medical Lab Chemistry II	3
MLS 451	Clinical Lab Practicum I	3
Hours		14
Total Hours		141-142

Medical Laboratory Science Undergraduate Certificate

The Medical Laboratory Science program prepares graduates to function in responsible positions in a laboratory environment. Students learn in a dynamic environment where they can put their studies into practice through a comprehensive clinical experience that coordinates with classroom lectures and activities. The real-world expertise of faculty and clinical staff shapes students into professionals with the right

knowledge, skills and attitudes for a successful career. Students entering the 12-month program must have completed three years of college, including specific prerequisite courses, at an affiliate institution and be eligible for a baccalaureate degree following completion of the program's coursework. Candidates who have already received a baccalaureate degree may also be eligible for entry into the program, provided they have fulfilled necessary prerequisite science coursework. Classes take place on campus, with clinical experience provided in a variety of clinical laboratories.

Upon successful completion of the program, graduates are prepared to enter the health care field as entry-level medical laboratory scientists and are eligible to sit for a national certifying exam. Successful completion of the program is not dependent on passing a certification exam.

Mission

The mission of the Medical Laboratory Science program is to prepare students to enter the profession with the knowledge, skills and attitudes needed for clinical competence and with the independent learning skills needed to grow in and contribute to the profession throughout their careers.

Learning Goals and Outcomes

Goal 1: Collaborate with diverse health care team members to provide patient care and perform quality, cost-effective laboratory procedures.

Goal 2: Incorporate concepts learned through classroom instruction and clinical practice to ensure accurate, meaningful laboratory results that reflect current standards of care.

Goal 3: Practice responsibly in compliance with ethical, social, legal and regulatory requirements of medical laboratory science professionals.

Goal 4: Utilize appropriate methods for the basic operation and troubleshooting of laboratory instrumentation and information systems.

Goal 5: Recognize the importance of continuously integrating new technologies and procedures into clinical practice.

Goal 6: Demonstrate a commitment to maintain competency and promote development through participation in professional activities.

Academic Progression

To meet requirements for successful completion of the Medical Laboratory Science program, students must complete all MLS prefix courses with a grade of "C" (74%) or higher.

Requirements

Code	Title	Hours
MLS 401	Fund Oper of Clinical Lab	2
MLS 411	Clinical Microbiology I	4
MLS 421	Clinical Hematology I	4
MLS 431	Medical Lab Chemistry I	4
MLS 441	Med Lab Immunology/Serology	2
MLS 451	Clinical Lab Practicum I	3
MLS 402	Clin Parasitology and Mycology	2
MLS 412	Clinical Microbiology II	4
MLS 422	Clinical Hematology II	4
MLS 432	Medical Lab Chemistry II	3

MLS 442	Med Lab Immunohematology	3
MLS 452	Clinical Lab Practicum II	3
MLS 453	Clinical Lab Practicum III	3
MLS 454	Clinical Lab Practicum IV	3
MLS 471	Medical Lab Leadership Skills ¹	2
Total Hours		46

¹ Students participate in required seminar courses during the fall and spring semesters. Credit is applied upon completion of assignments in the summer semester.

Plan of Study

Course	Title	Hours
First Year		
Fall		
MLS 401	Fund Oper of Clinical Lab	2
MLS 411	Clinical Microbiology I	4
MLS 421	Clinical Hematology I	4
MLS 431	Medical Lab Chemistry I	4
MLS 441	Med Lab Immunology/Serology	2
MLS 451	Clinical Lab Practicum I	3
MLS 471	Medical Lab Leadership Skills	0
Hours		19
Spring		
MLS 402	Clin Parasitology and Mycology	2
MLS 412	Clinical Microbiology II	4
MLS 422	Clinical Hematology II	4
MLS 432	Medical Lab Chemistry II	3
MLS 442	Med Lab Immunohematology	3
MLS 452	Clinical Lab Practicum II	3
MLS 471	Medical Lab Leadership Skills	0
Hours		19
Summer		
MLS 453	Clinical Lab Practicum III	3
MLS 454	Clinical Lab Practicum IV	3
MLS 471	Medical Lab Leadership Skills	2
Hours		8
Total Hours		46

Chemistry and Biochemistry

The Chemistry and Biochemistry Department offers undergraduate and graduate programs, including BS and MS degrees, with both Thesis and Non-Thesis options. The Chemistry BS and Biochemistry BS are approved by the American Chemical Society (ACS), with the possibility of ACS certification through specific course selections. Accredited by the American Society of Biochemistry and Molecular Biologists (ASBMB), students can obtain ASBMB certification based on performance in a senior year exam.

Chemistry is foundational to various scientific and health fields, contributing to drug discovery, agriculture, environmental solutions, and national security. Chemists work across industries and government labs, impacting sectors from petroleum to education. Biochemistry delves into chemical processes in living systems, forming the basis of modern biology and medicine. Undergraduate study in biochemistry provides a strong foundation for advanced training and careers in healthcare and biomedical research, offering skills applicable to biotechnology

industries. From pioneering cancer research to innovative energy solutions, biochemistry drives progress with cutting-edge ideas.

Departmental Mission

The core mission of the department is to train students in areas of chemistry and biochemistry to advance student education and future career goals, and prepare them to be lifelong learners. This mission is accomplished through a focus on excellence in teaching with one-on-one faculty mentoring through advising and undergraduate research. Our modern research-grade instrumentation makes it possible for students to explore contemporary problems in all of these areas. Chemistry and Biochemistry majors are encouraged to engage in faculty-directed independent research projects and to present the results of their studies in the chemical and biochemical literature and at scientific meetings. The curriculum for both majors prepares the graduates to continue their educations in graduate and professional schools including areas of health or law or to work in the chemical and pharmaceutical industries and in government laboratories. Our alumni are aware that through chemistry they can continue to make contributions to society that are of service to others.

Advisory Option—Chemistry Premedical

Students planning to enter medical or dental school should take BIO 101 and BIO 102.

Advisory Option—Chemistry and Business

Students who intend to pursue studies toward the MBA or who plan careers in the marketing or management areas of the chemical industry should minor in business.

Faculty

The faculty of Saint Joseph's University's Chemistry Department are esteemed experts in their field, boasting comprehensive expertise across all facets of chemistry. Dedicated to fostering student success, they are deeply committed to supporting and empowering students throughout their academic journey and beyond.

Department of Chemistry and Biochemistry Faculty & Staff (<https://www.sju.edu/departments/chemistry/faculty-staff/>)

Programs Undergraduate Majors

- Biochemistry (p. 83)
- Chemical Biology (p. 86)
- Chemistry (p. 89)

Undergraduate Minors

- Biochemistry (p. 85)
- Chemistry (p. 92)
- Pharmaceutical Chemistry (p. 93)

Graduate

- Biochemistry (p. 85)
- Chemistry (p. 92)

Biochemistry Major

The biochemistry program leverages the expertise of faculty from the Chemistry, Biochemistry, and Biological Sciences departments. It encompasses a diverse range of disciplines, including organic, physical, analytical, biochemistry, enzymology, cell biology, microbiology, immunology, and genetics.

During the first two years, students receive a comprehensive foundation in basic biology and chemistry, complemented by coursework in physics and mathematics. In the subsequent years, they delve into advanced topics such as biochemistry, molecular biology, while continuing foundational courses in cell biology, genetics, as well as physical and analytical chemistry. Additionally, students have the flexibility to select elective courses from a curated list of biology and chemistry offerings, allowing them to tailor their studies to their specific interests. Hands-on research opportunities are abundant, enabling students to engage in undergraduate research projects within the field of biochemistry. This experiential learning fosters critical thinking and hones practical skills essential for future endeavors.

Our program equips students with a robust educational background, positioning them for further studies in genetics, molecular biology, physiology, cell biology, immunology, or graduate studies in biochemistry. Moreover, it serves as excellent preparation for medical school or other health professions. Furthermore, students gain proficiency in experimental techniques vital for roles in biomedical research across various industries, including biotechnology. From pioneering cancer research to innovative gene splicing techniques and harnessing solar energy through photosynthesis, biochemistry continues to drive groundbreaking discoveries and shape the future of science.

Learning Goals and Outcomes

Goal 1: Students will know how to apply scientific reasoning and inquiry to investigate and analyze ideas, phenomena, or experimental data within the field of biochemistry.

Outcome 1.1: Students will be able to generate a testable hypothesis about an observed phenomenon or idea presented within the field of biochemistry.

Outcome 1.2: Students will be able to test hypothesis through reason, models, and experimentation by the manipulation of variables and making measurements to support or refute the hypothesis.

Goal 2: Students will demonstrate a commitment to lifelong learning and proficiency in communication skills encompassing reading, writing, and oral presentation within the field of biochemistry.

Outcome 2.1: Students will be able to define, describe, and explain the key concepts of biochemistry.

Outcome 2.2 Students will be able to present results from chemical investigations and the biochemical literature in writing and/or orally.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours**47-49**

Major Requirements

Code	Title	Hours
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
CHM 118	Chemical Sciences Orientation	1
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 204	Literature of Chemistry	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
CHM 230	Basic Inorganic Chemistry	3
CHM 300	Discussions in Chemistry	1
CHM 310	Physical Chemistry I	3
CHM 310L	Physical Chemistry Lab I	2
CHM 340	Biochemistry	3
CHM 340L	Biochemistry Lab	2
CHM 342	Nucleic Acid Biochemistry	3
CHM 343	Metabolic Biochemistry	3
CHM 350	Inorganic Chemistry	3
CHM 361	Analytical Chemistry	3
CHM 361L	Analytical Chemistry Laboratory	1
CHM 401	Seminar in Chemistry I	1
CHM 402	Seminar in Chemistry II	1
CHM 445L	Biochemistry Laboratory II	1
CHM 480	Inorganic Biochemistry	3
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4
Choose two of the following		6
CHM 315	Physical Chemistry II	
CHM 330	Instrumental Analysis	
CHM 330L	Instrumental Analysis Lab	
CHM 360	Nanochemistry	
CHM 410	Biophysical Chemistry	
CHM 411	Medicinal Chemistry	
CHM 414	Structure-Activity Relationships	
CHM 420	Atmospheric Environmental Chem	

CHM 430 Mechanisms in Organic Chem

CHM 440 Organometallic Chemistry

CHM 448 Computer Aided Drug Design

CHM 450 Polymer Chemistry

CHM 460 Water Chemistry

Total Hours**81**

In order to fulfill the requirements for an American Chemical Society certified degree, students must take at least 2 credits of research (CHM 495) and one of the following In-Depth courses: CHM 315 - Physical Chemistry II, CHM 330 & CHM 330L - Instrumental Analysis & Instrumental Analysis Lab, or CHM 410 - Biophysical Chemistry.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 118	Chemical Sciences Orientation	1
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
ENG 101	Craft of Language	3
Philosophy Level One		3
Hours		15
Spring		
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
MAT 161	Calculus I	4
World History		3
INT 151	Inequality in American Society	1
Hours		16
Sophomore		
Fall		
CHM 204	Literature of Chemistry	1
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
PHY 105 & 105L	University Physics I and University Physics Lab I	4
MAT 162	Calculus II	4
Non-Native Language		3-4
Hours		16-17
Spring		
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
PHY 106 & 106L	University Physics II and University Physics Lab II	4
CHM 230	Basic Inorganic Chemistry	3
Diversity		3
Hours		14
Junior		
Fall		
CHM 300	Discussions in Chemistry	1

CHM 310	Physical Chemistry I	3
CHM 340	Biochemistry	3
CHM 340L	Biochemistry Lab	2
Social Science		3
Literature		3
Hours		15
Spring		
CHM 343	Metabolic Biochemistry	3
CHM 445L	Biochemistry Laboratory II	1
CHM 361	Analytical Chemistry	3
CHM 361L	Analytical Chemistry Laborator	1
Religious Studies		3
Philosophy Level Two		3
Hours		14
Senior		
Fall		
CHM 401	Seminar in Chemistry I	1
CHM 310L	Physical Chemistry Lab I	2
CHM 480	Inorganic Biochemistry	3
CHM 4xx Chem/Biochem In-Depth		3
CHM 495	Undergraduate Research (or Free Elective)	3
Theology		3
Hours		15
Spring		
CHM 402	Seminar in Chemistry II	1
CHM 342	Nucleic Acid Biochemistry	3
CHM 4xx Chem/Biochem In-Depth		3
Fine & Performing Arts, Design, & Creativity		3
CHM 495	Undergraduate Research (or Free elective)	3
Free Elective		3
Hours		16
Total Hours		121-122

Biochemistry Minor

Learning Goals and Outcomes

Goal 1: Students will develop an understanding of the theoretical methods and models that biochemists use to understand the properties and behavior of matter.

Objective 1.1: Students will gain an understanding of the key concepts fundamental to biochemistry, including, structure, metabolism, and nucleic acid chemistry.

Objective 1.2: Students will predict the behavior of a new substance based on the known behavior of related compounds.

Objective 1.3: Students will apply appropriate theoretical models to explain experimental observations.

Objective 1.4: Students will assess experimental data critically.

Goal 2: Students will gain authentic hands-on experience with the experimental methods used by chemists.

Objective 2.1: Students will use contemporary computer software to study problems in chemistry and present results properly and accurately using figures, graphs, and tables.

Objective 2.2: Students will store, handle, and use chemicals safely and responsibly.

Objective 2.3: Students will assess experimental data critically.

Objective 2.4: Students will apply appropriate theoretical models to explain experimental observations.

Objective 2.5: Students will use accepted laboratory record-keeping methods to record their experimental data.

Requirements

Code	Title	Hours
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
CHM 340	Biochemistry	3
CHM 340L	Biochemistry Lab	2
CHM 445L	Biochemistry Laboratory II	1
Choose one of the following		3
CHM 342	Nucleic Acid Biochemistry	
or CHM 343	Metabolic Biochemistry	
CHM 343	Metabolic Biochemistry	
Total Hours		25

Biochemistry MS

The Department of Chemistry & Biochemistry offers graduate programs leading to the Master of Science (thesis or non-thesis) in Biochemistry (specialties: bioanalytical chemistry and peptide, protein, lipid and nucleic acid chemistry). These programs are designed to prepare students for careers in academic, industrial, and governmental settings. Individualized programs of study, which take advantage of modern instrumentation, provide a solid foundation for independent research.

Expert instructors bring biology and chemistry disciplines together and research opportunities link those lessons to the real world. You'll take classes on our University City campus and have the option to pursue research-based (thesis) or classroom-based (non-thesis) degrees.

Students entering the graduate program in biochemistry may have any undergraduate degree that satisfies all the prerequisites for these programs. However, in some instances the graduate program director will need to assign appropriate remedial courses to ensure that students are properly prepared for the graduate courses in their particular program. In order to help the program director evaluate an entering student's background, each student takes a series of entrance examinations in specific areas of chemistry.

Learning Goals and Outcomes

Biochemistry MS: Non-Thesis

Goal 1: Students will develop a strong background and achieve advanced knowledge in major areas of biochemistry.

Outcome 1.1: Students will be able to explain a broad range of advanced biochemical concepts.

Goal 2: Students will conduct effective literature research in biochemistry and communicate the finding in both oral and/or writing form.

Outcome 2.1: Students will be able to give a presentation on a biochemistry subject in either oral or written format.

Biochemistry MS: Thesis

Goal 1: Students will develop a strong background and achieve advanced knowledge in chosen areas of biochemistry.

Outcome 1.1: Students will be able to explain advanced biochemical concepts.

Goal 2: Students will develop proficiency in conducting research in biochemistry.

Outcome 2.1: Students will be able to design and carry out an experiment given a biochemical problem.

Requirements

Thesis Requirements

Code	Title	Hours
MAT 704	Statistics for Research	3
CHM 786	Research Ethics	1
CHM 802	Research Seminar	2
Electives: Three Biochemistry Graduate level courses		9

Elective courses must be approved by Advisor, Advisory Committee, or Program Director.

CHM 610	Biophysical Chemistry
CHM 642	Nucleic Acid Biochemistry
CHM 680	Inorganic Biochemistry
CHM 690	Spectroscopy
CHM 711	Medicinal Chemistry
CHM 714	Structure-Activity Relationships
CHM 728	Advanced Biochemistry
CHM 748	Computer Aided Drug Design

Research Courses (15+credits) 15

14 credits minimum, more may be required to complete a master's level research project

CHM 878	Introduction to Research	1
CHM 899	Graduate Research	1-9

Total Hours 32-40

In addition to the above coursework, thesis students have a number of progression milestones which include:

1. Selection of Research Advisor
2. Selection of Research Committee
3. Preparing a committee approved Research Prospectus
4. Presentation of your research efforts at an external venue at least once
5. Preparing a committee approved Thesis on your original research
6. Successful Defense of your thesis work

Non Thesis Requirements

Code	Title	Hours
MAT 704	Statistics for Research	3
CHM 786	Research Ethics	1
CHM 802	Research Seminar	2

Electives: 8 Biochemistry graduate level courses 24

Elective courses must be approved by Program Director. Up to 3 credits of research may be applied towards this requirement.

CHM 610	Biophysical Chemistry
CHM 642	Nucleic Acid Biochemistry
CHM 680	Inorganic Biochemistry
CHM 690	Spectroscopy
CHM 711	Medicinal Chemistry
CHM 714	Structure-Activity Relationships
CHM 728	Advanced Biochemistry
CHM 748	Computer Aided Drug Design

Total Hours 30

Chemical Biology Major

The major in Chemical Biology addresses the growing interest that many biologists have in the molecular aspects of biology and the increasing emphasis that many chemists place on the significance of chemical interactions and reactions in biological systems. The mission of the major in Chemical Biology is to provide students with an inter-disciplinary and thorough training in both biology and chemistry so that they can understand and investigate the chemical processes that take place at the molecular level in living systems. Chemical Biology majors take a wide variety of chemistry and biology courses with the flexibility to focus on particular areas of their own interest. All students majoring in Chemical Biology engage in faculty-directed independent research projects as part of the major requirement. This gives students the opportunity to apply the principles that they have learned in the classroom and laboratory to the solution of real world scientific problems. In doing research, students gain hands-on experience in the use of state-of-the-art instrumentation, data analysis and interpretation. Students have presented their research at local and national conferences and in journal publications.

A major in Chemical Biology provides a strong academic background for students interested in pursuing graduate, professional and industrial careers at the interface between chemistry and biology. Students in the major benefit from the presence of pharmaceutical, chemical and biochemical industries, and many strong graduate and professional programs in the Philadelphia region. Chemical Biology majors have gone on to careers in cellular and molecular biology, biochemistry, genetics, pharmacy and pharmacology, medicine, biotechnology, forensic science and neuroscience.

Learning Goals and Outcomes

Goal 1: Students will understand the role of chemical properties in biological systems and processes.

Outcome 1.1: Students will understand and be able to describe biochemical processes of living organisms and the role of macromolecules in these processes.

Goal 2: Students will gain knowledge of problems at the chemistry-biology interface and learn the molecular approaches utilized to solve these.

Outcome 2.1: Students will acquire an in-depth understanding of fundamental chemical and biological principles to apply quantitative reasoning to biological problems and their solutions.

Goal 3: Students will acquire research experience through faculty-supervised independent projects in chemistry or biology.

Outcome 3.1: Students will be able to design an experiment, use modern instrumentation for data acquisition and processing in laboratory courses and in independent research.

Goal 4: Students will effectively communicate scientific information.

Outcome 4.1: Students will search the literature for published work relevant to a problem of interest and be able to develop cogent written and oral presentations of scientific content.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4

Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
Required Courses:		
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
or BIO 150L	Bio I: Cells Lab Phage	
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
or BIO 151L	Phage Lab	
BIO 201	Bio III: Organismic Biology	4
BIO 201L	Bio III: Organismic Biol Lab	0
Physics (will count as CCC: Natural Science)		3-4
PHY 101	General Physics I	
or PHY 105	University Physics I	
PHY 101L	General Physics Laboratory I	
or PHY 105L	University Physics Lab I	
PHY 102	General Physics II	3
or PHY 106	University Physics II	
PHY 102L	General Physics Laboratory II	1
or PHY 106L	University Physics Lab II	
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1

CHM 320 or CHM 310	Physical Chem for Chem Bio Physical Chemistry I	3
CHM 330	Instrumental Analysis	3
CHM 330L	Instrumental Analysis Lab	2
MAT 128 or MAT 162	Applied Statistics Calculus II	3-4
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Select three of the following:		12
BIO 402 & 402L	Advanced Cell Biology and Advanced Cell Biology Lab	
BIO 411 & 411L	Molecular Genetics and Molecular Genetics Lab	
BIO 412 & 412L	Neurobiology and Neurobiology Lab	
BIO 415 & 415L	Immunology and Immunology Lab	
BIO 416 & 416L	Microbiology and Microbiology Lab	
BIO 421 & 421L	Molecular&Cellular Biophysics and Mol & Cell Biophysics Lab	
BIO 422 & 422L	Applied & Environ Microbiology and Applied & Environ Micro Lab	
BIO 424 & 424L	Biotechnology and Biotechnology Lab	
BIO 425 & 425L	Bacterial Pathogenesis and Bacterial Pathogenesis Lab	
Select one of the following in-depth Chemistry courses:		3
CHM 360	Nanochemistry	
CHM 410	Biophysical Chemistry	
CHM 411	Medicinal Chemistry	
CHM 420	Atmospheric Environmental Chem	
CHM 430	Mechanisms in Organic Chem	
CHM 440	Organometallic Chemistry	
CHM 460	Water Chemistry	
CHM 480	Inorganic Biochemistry	
Select one of the following:		3-4
BIO 404	Biochemistry	
CHM 340	Biochemistry	
Select one of the following: ¹		3
BIO 493 or BIO 494	Undergraduate Research in Bio Undergraduate Research in Bio	
BIO 494	Undergraduate Research in Bio	
CHM 495	Undergraduate Research	
Total Hours		70-74

¹ The research requirement can also be satisfied with CMB 490 Introduction to Research and an in-depth Chemistry course or a Biology elective course listed above.

² Students must register for Chemistry or Biology Seminar each semester as a junior and senior (4 total).

Free Electives

At least six courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
ENG 101	Craft of Language	3
MAT 120 or MAT 155 or MAT 161	Precalculus or Fundamentals of Calculus or Calculus I	3-4
Hours		14-15
Spring		
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
INT 151	Inequality in American Society	1
World History		3
MAT 155 or MAT 161 or MAT 128	Fundamentals of Calculus or Calculus I or Applied Statistics	3-4
Hours		15-16
Sophomore		
Fall		
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
Non-Native Language		3
Philosophy Level One		3
Hours		14
Spring		
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
BIO Elective 1 (see list)		4
Philosophy Level Two		3
Religious Studies		3
Free Elective		3
Hours		17
Junior		
Fall		
PHY 101 or PHY 105	General Physics I or University Physics I	3
PHY 101L or PHY 105L	General Physics Laboratory I or University Physics Lab I	1
CHM 340 or BIO 404	Biochemistry or Biochemistry	3
BIO Elective 2 (see list)		4
Diversity		3
Social Science		3
CHM 390	Chemistry Seminar	0
Hours		17
Spring		
PHY 102 or PHY 106	General Physics II or University Physics II	3

PHY 102L or PHY 106L	General Physics Laboratory II or University Physics Lab II	1
BIO Elective 3 (see list)		4
Literature		3
Fine & Performing Arts, Design, & Creativity		3
Free Elective		3
CHM 390	Chemistry Seminar	0
Hours		17
Senior		
Fall		
Instrumental Analysis		3
Physical Chemistry I		3
Undergraduate Research		3
Theology		3
Free Elective		3
CHM 390	Chemistry Seminar	0
Hours		15
Spring		
Instrumental Analysis Lab		1
BIO Elective 3 (see list)		4
In-depth Chemistry (see list)		3
Free Electives		6
CHM 390	Chemistry Seminar	0
Hours		14
Total Hours		123-125

¹ CMB 390 or CHM 390 non-credit Seminar. In addition to the courses listed above, Seminar is required each semester for juniors and seniors.

- ² Complete Three of the following Biology Electives
- BIO 402/402L Advanced Cell Biology
 - BIO 411/411L Molecular Genetics
 - BIO 412/412L Neurobiology
 - BIO 415/415L Immunology
 - BIO 416/416L Microbiology
 - BIO 422/422L Applied & Environ Microbiology
 - BIO 421/421L Molecular & Cellular Biophysics
 - BIO 424/424L Biotechnology
 - BIO 425/425L Bacterial Pathogenesis

- ³ Complete one of the following In-Depth Chemistry courses:
- CHM 360 Nanochemistry
 - CHM 400 Biogeochemistry
 - CHM 410 Biophysical Chemistry
 - CHM 411 Medicinal Chemistry
 - CHM 420 Environmental Chemistry
 - CHM 430 Mechanisms in Organic Chemistry
 - CHM 435 Technical Applications of Chemistry
 - CHM 440 Organometallic Chemistry
 - CHM 460 Water Chemistry
 - CHM 480 Adv. Biochem: Inorganic Biochemistry
 - CHM 490 Spectroscopy

- ⁴ Research Requirement - Select one of the following:
- BIO 493 Undergraduate Research in Bio
 - BIO 494 Undergraduate Research in Bio
 - CHM 495 Junior or Senior Chemistry Research

The research requirement can also be satisfied with CMB 490 (Introduction to Research) and an in-depth Chemistry course or a Biology elective course listed above.

Chemistry Major

A student who is majoring in chemistry at Saint Joseph's University is introduced to all of the major sub-disciplines: analytical chemistry, biochemistry, inorganic chemistry, organic chemistry, and physical chemistry. An important objective of the program is to develop in students the ability to solve problems by employing the techniques of the various sub-disciplines of chemistry.

Throughout the program, emphasis is placed on chemistry as a laboratory science. Consequently, a student majoring in chemistry learns not only the basic theories of chemistry, but also how to use experimental techniques to solve chemical problems.

Students hone their experimental skills through hands-on experience on modern research-grade instrumentation in our laboratory courses taught by faculty. In addition, chemistry majors are able to engage in faculty-directed independent research projects in the traditional sub-disciplines of chemistry and environmental chemistry during the academic year and/or in the summer. Students often have the opportunity to present the results of their research at local, regional, and national scientific meetings as well as co-author publications with graduate students and faculty. The curriculum for the chemistry major is designed to prepare students for continuing their educations in graduate and professional schools such as medicine, law, or business as well as employment in the chemical and pharmaceutical industries and government laboratories.

Learning Goals and Outcomes

Goal 1: Students will know how to apply scientific reasoning and inquiry to investigate and analyze ideas, phenomena, or experimental data within the field of chemistry.

Outcome 1.1: Students will be able to generate a testable hypothesis about an observed phenomenon or idea presented within the field of chemistry.

Outcome 1.2: Students will be able to test hypothesis through reason, models, and experimentation by the manipulation of variables and making measurements to support or refute the hypothesis.

Goal 2: Students will demonstrate how to effectively obtain and provide chemical knowledge through reading, writing, and oral presentation.

Outcome 2.1: Students will be able to define, describe, and explain the key concepts of chemistry.

Outcome 2.2: Students will be able to present results from chemical investigations and the chemical literature in writing and/or orally.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours **47-49**

Recommended CCC Courses

Code	Title	Hours
Writing Intensive		
CHM 310L	Physical Chemistry Lab I	

Major Requirements

Code	Title	Hours
Foundation Course Requirements		
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4
CHM 118	Chemical Sciences Orientation	1
CHM 120	General Chemistry I (will count for CCC: Natural Science)	3
CHM 120L	General Chemistry Lab I (will count for CCC: Natural Science)	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 204	Literature of Chemistry	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
CHM 230	Basic Inorganic Chemistry	3
CHM 300	Discussions in Chemistry	1
CHM 310 & 310L	Physical Chemistry I and Physical Chemistry Lab I	5
CHM 315	Physical Chemistry II	3
CHM 330 & 330L	Instrumental Analysis and Instrumental Analysis Lab	5
CHM 340 & 340L	Biochemistry and Biochemistry Lab	5
CHM 361 & 361L	Analytical Chemistry and Analytical Chemistry Laboratory	4
CHM 401	Seminar in Chemistry I	1
CHM 402	Seminar in Chemistry II	1
In-Depth Course Requirements		
CHM 480	Inorganic Biochemistry	3
Select two from the following:		6
CHM 343	Metabolic Biochemistry	
CHM 340L	Biochemistry Lab	
CHM 360	Nanochemistry	
CHM 410	Biophysical Chemistry	
CHM 411	Medicinal Chemistry	

CHM 414	Structure-Activity Relationships
CHM 420	Atmospheric Environmental Chem
CHM 430	Mechanisms in Organic Chem
CHM 440	Organometallic Chemistry
CHM 448	Computer Aided Drug Design
CHM 450	Polymer Chemistry
CHM 460	Water Chemistry
CHM 491	Chemistry Internship I
CHM 492	Chemistry Internship II
CHM 495	Undergraduate Research

Total Hours **71**

Free Electives

Any eleven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 118	Chemical Sciences Orientation	1
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
ENG 101	Craft of Language	3
MAT 161	Calculus I	4
Philosophy Level One		3
Hours		15
Spring		
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
MAT 162	Calculus II	4
INT 151	Inequality in American Society	1
World History		3
Literature		3
Hours		15
Sophomore		
Fall		
CHM 204	Literature of Chemistry	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
Non-Native Language		3
Social Science		3
Hours		15
Spring		
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
CHM 230	Basic Inorganic Chemistry	3
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
Diversity		3
Hours		14
Junior		
Fall		
CHM 300	Discussions in Chemistry	1
CHM 310	Physical Chemistry I	3
CHM 340	Biochemistry	3

CHM 340L	Biochemistry Lab	2
Religious Studies		3
Philosophy Level Two		3
Hours		15
Spring		
CHM 322	Physical Chemistry II	4
CHM 361	Analytical Chemistry	3
CHM 361L	Analytical Chemistry Laboratory	1
Theology		3
Free Electives		6
Hours		17
Senior		
Fall		
CHM 401	Seminar in Chemistry I	1
CHM 310L	Physical Chemistry Lab I	2
CHM 480	Inorganic Biochemistry	3
CHM 4xx Chem/Biochem In-Depth		3
CHM 495	Undergraduate Research (or Free Elective)	3
Fine & Performing Arts, Design, & Creativity		3
Hours		15
Spring		
CHM 402	Seminar in Chemistry II	1
CHM 330	Instrumental Analysis	3
CHM 330L	Instrumental Analysis Lab	2
CHM 4xx Chem/Biochem In-Depth		3
CHM 495	Undergraduate Research (or Free Elective)	3
Free Elective		3
Hours		15
Total Hours		121

Chemistry/Secondary Education

Students majoring in Chemistry who are interested in teaching grades 7-12 can dual major in Chemistry/Secondary Education (7-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their Chemistry advisor, Chemistry/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 (<https://academiccatalog.sju.edu/search/?P=EDU%20491>) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i).

See the Secondary Education (7-12) major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

Code	Title	Hours
MAT 162	Calculus II	4
PHY 101	General Physics I	3
PHY 101L	General Physics Laboratory I	1
PHY 102	General Physics II	3
PHY 102L	General Physics Laboratory II	1
CHM 118 or CHM 204 or CHM 300	Chemical Sciences Orientation Literature of Chemistry Discussions in Chemistry	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
CHM 318	Essentials of Physical Chem	4
CHM 330	Instrumental Analysis	3
CHM 330L	Instrumental Analysis Lab	2
CHM 340	Biochemistry	3
CHM 350	Inorganic Chemistry	3
CHM 420	Atmospheric Environmental Chem	3
ENV 106	Exploring the Earth	4
ENV 106L	Exploring the Earth Laboratory	0
BIO 165	Exploring the Living World	4
BIO 165L	Exp. Living World Lab	0
CHM 401	Seminar in Chemistry I	1
CHM 402	Seminar in Chemistry II	1
Total Hours		53

Chemistry Minor

Learning Goals and Outcomes

Goal 1: Students will develop an understanding of the theoretical methods and models that chemists use to understand the properties and behavior of matter.

Outcome 1.1: Students will gain an understanding of the key concepts fundamental to the five major sub disciplines of chemistry: analytical chemistry, biochemistry, inorganic chemistry, organic chemistry, and physical chemistry.

Outcome 1.2: Students will predict the behavior of a new substance based on the known behavior of related compounds.

Outcome 1.3: Students will apply appropriate theoretical models to explain experimental observations.

Outcome 1.4: Students will assess experimental data critically.

Goal 2: Students will gain authentic hands-on experience with the experimental methods used by chemists.

Outcome 2.1: Students will use contemporary computer software to study problems in chemistry and present results properly and accurately using figures, graphs and tables.

Outcome 2.2: Students will store, handle, and use chemicals safely and responsibly.

Outcome 2.3: Students will assess experimental data critically.

Outcome 2.4: Students will apply appropriate theoretical models to explain experimental observations.

Outcome 2.5: Students will use accepted laboratory record-keeping methods to record their experimental data.

Requirements

Code	Title	Hours
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210L	Organic Chemistry Lab I	1
CHM 210	Organic Chemistry I	3
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
Any two non-research chemistry courses beyond CHM 215		6
Total Hours		22

Chemistry MS

The Department of Chemistry & Biochemistry (<https://www.sju.edu/departments/chemistry/>) offers graduate programs leading to the Master of Science (thesis or non-thesis) in Chemistry (<https://www.sju.edu/degree-programs/chemistry-ms/>) (specialties: analytical, computational, medicinal, organic, and physical chemistry). These programs are designed to prepare students for careers in academic, industrial, and governmental settings. Individualized programs of study, which take advantage of modern instrumentation (<https://www.sju.edu/departments/chemistry/research/>), provide a solid foundation for independent research.

The Master of Science in Chemistry program at Saint Joseph's University is the ideal place to study the latest innovations in chemistry alongside top program faculty (<https://www.sju.edu/departments/chemistry/graduate-faculty/>). In this program, you'll gain skills and knowledge in modern chemistry that will prepare you for growing careers in computational chemistry, drug design, pharmacognosy and more. You'll also have the opportunity to conduct original, pioneering research in our robust research labs, including in the West Center for Computational Chemistry and Drug Design (<https://www.sju.edu/research/facilities-labs/west-center/>). You'll take classes on our University City campus and have the option to pursue research-based (thesis) or classroom-based (non-thesis) degrees.

Students entering the graduate program in chemistry may have any undergraduate degree that satisfies all the prerequisites for these programs. However, in some instances the graduate program director will need to assign appropriate remedial courses to ensure that students are properly prepared for the graduate courses in their particular program. In order to help the program director evaluate an entering student's

background, each student takes a series of entrance examinations in specific areas of chemistry.

Learning Goals and Outcomes

Chemistry MS: Non-Thesis

Goal 1: Students will develop a strong background and achieve advanced knowledge in major areas of chemistry.

Outcome 1.1: Students will be able to explain a broad range of advanced chemical concepts.

Goal 2: Students will conduct effective literature research in chemistry and communicate the finding in both oral and/or writing form.

Outcome 2.1: Students will be able to give a presentation on a chemistry subject in either oral or written format.

Chemistry MS: Thesis

Goal 1: Students will develop a strong background and achieve advanced knowledge in chosen areas of chemistry.

Outcome 1.1: Students will be able to explain advanced chemical concepts.

Goal 2: Students will develop proficiency in conducting research in chemistry.

Outcome 2.1: Students will be able to design and carry out an experiment given a chemical problem.

Requirements

Thesis Requirements:

Code	Title	Hours
MAT 704	Statistics for Research	3
CHM 786	Research Ethics	1
CHM 802	Research Seminar	2
Three Chemistry Graduate Level Elective Courses		9

Elective courses must be approved by Advisor, Advisory Committee, or Program Director

CHM 560	Nanochemistry
CHM 620	Atmospheric Environmental Chem
CHM 630	Mechanisms in Organic Chem
CHM 640	Organometallics
CHM 660	Water Chemistry
CHM 690	Spectroscopy
CHM 711	Medicinal Chemistry
CHM 714	Structure-Activity Relationships
CHM 748	Computer Aided Drug Design
CHM 815	Intro to Polymer Chemistry
CHM 892	Non-trivial Problems in Chem

14 credits minimum, more may be required to complete a master's level research project

CHM 878	Introduction to Research	1
CHM 899	Graduate Research (Minimum)	1-9
Total Hours		31-39

In addition to the above coursework, thesis students have a number of progression milestones which include:

1. Selection of Research Advisor
2. Selection of Research Committee
3. Preparing a committee approved Research Prospectus
4. Presentation of your research efforts at an external venue at least once
5. Preparing a committee approved Thesis on your original research
6. Successful Defense of your thesis work

Non-Thesis Requirements:

Code	Title	Hours
MAT 704	Statistics for Research	3
CHM 786	Research Ethics	1
CHM 802	Research Seminar	2
Choose eight graduate level elective courses		24

Elective courses must be approved by Program Director. Up to 3 credits of graduate research may be applied towards this requirement.

CHM 560	Nanochemistry
CHM 620	Atmospheric Environmental Chem
CHM 630	Mechanisms in Organic Chem
CHM 660	Water Chemistry
CHM 690	Spectroscopy
CHM 711	Medicinal Chemistry
CHM 714	Structure-Activity Relationships
CHM 716	Chemical Synthesis Laboratory
CHM 748	Computer Aided Drug Design
CHM 815	Intro to Polymer Chemistry
CHM 892	Non-trivial Problems in Chem

Total Hours 30

Pharmaceutical Chemistry Minor

Learning Goals and Outcomes

Goal 1: Students will develop an understanding of the theoretical methods and models that chemists use to understand the properties and behavior of matter.

Objective 1.1: Students will gain an understanding of the key concepts fundamental to Pharmaceutical Chemistry, such as instrumental analysis and medicinal chemistry.

Objective 1.2: Students will predict the behavior of a new substance based on the known behavior of related compounds.

Objective 1.3: Students will apply appropriate theoretical models to explain experimental observations.

Objective 1.4: Students will assess experimental data critically.

Goal 2: Students will gain authentic hands-on experience with the experimental methods used by chemists.

Objective 2.1: Students will use contemporary computer software to study problems in chemistry and present results properly and accurately using figures, graphs, and tables.

Objective 2.2: Students will store, handle, and use chemicals safely and responsibly.

Objective 2.3: Students will assess experimental data critically.

Objective 2.4: Students will apply appropriate theoretical models to explain experimental observations.

Objective 2.5: Students will use accepted laboratory record-keeping methods to record their experimental data.

Requirements

Code	Title	Hours
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
CHM 330 & 330L	Instrumental Analysis and Instrumental Analysis Lab	5
Choose one of the following:		3
CHM 411	Medicinal Chemistry	
CHM 414	Structure-Activity Relationships	
CHM 448	Computer Aided Drug Design	
Total Hours		24

Communication & Media Studies Faculty

Well respected in the media industry, the faculty members in Saint Joseph's University's Communications and Media Studies Department bring a wide range of applicable experience from previously held high-level positions in film, journalism, media and more. Above all, the faculty are dedicated to helping students reach their objectives in communications and media and go above and beyond to help them achieve academic and career success.

Department of Communication and Media Studies Faculty & Staff
(<https://www.sju.edu/departments/communicationstudies/faculty-staff/>)

Programs

Undergraduate Major

- Communication Studies (p. 94)

Undergraduate Minor

- Communication Studies (p. 96)

Communication Studies Major

The BA in Communication Studies is a major in the College of Arts and Sciences for students interested in specializing in digital media studies as an area of expertise. The major helps students develop advanced skills in communications with an emphasis on digital media studies, including multimedia writing, video editing and production, web content strategy and design, and writing for social media platforms.

Communication Studies students acquire a solid grounding in the study of digital communications while exploring current ideas and tools that are shaping the knowledge society. A hallmark of the Communication Studies curriculum is the emphasis on both theory and practice. Not only do students study what is happening at the forefront of emerging communication technologies, they also participate. Students have access to cutting-edge resources as they make and reflect upon media and in the process acquire important skills in teamwork, innovation, design, and entrepreneurship. The major prepares students for careers in digital media including web content strategy and design, social media/community management, and multimedia journalism.

The Department of Communication Studies is committed to excellence in teaching and learning. Faculty are dedicated to the art of thinking across media, platforms, and theories in order to create an innovative and socially responsible curriculum that goes beyond the classroom. Communication Studies students gain hands-on experience by working closely with faculty on a variety of activities.

Learning Goals and Outcomes

Goal 1: Students will develop a critical awareness of the impact of media on society.

Outcome 1.1: Students will be able to communicate a critical analysis of the impact of media on society.

Goal 2: Students will understand and apply design theories and approaches to communicative situations.

Outcome 2.1: Students will be able to create media stories and/or artifacts using contemporary design approaches.

Outcome 2.2: Students will be able to conceive, plan, and produce a portfolio of media-related projects individually and through collaboration with others.

Goal 3: Students will develop an understanding communication-related social issues, ethics, and inclusivity.

Outcome 3.1: Students will be able to analyze the relation between media and social responsibility within assignments.

Outcome 3.2: Students will be able to apply elements of social responsibility, ethics, and inclusivity in projects.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3

Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151 Inequality in American Society	1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

All Communication majors will be assigned a departmental advisor with whom they will consult during the course of their studies and who will help them select a series of course appropriate for both their interests and future careers.

All students complete the seven Core courses and select the remaining five courses from the list of Option Courses.

Code	Title	Hours
Core Courses		
COM 200	Multimedia Storytelling I (will count for CCC: Fine & Performing Arts, Design & Creativity)	3
COM 201	Media and Society	3
COM 202	Visual Design I	3
COM 203	Audio/Video I	3
COM 371	Media Advocacy	3
COM 372	Intro to Web Design	3
COM 480	Senior Capstone	3
A Second Non-Native Language Course (will count for CCC: Mission-Overlay)		3
Select five of the following:		15
COM 210	Sports, Media and Culture	
COM 270	Communications Special Topics	
COM 271	Technology and Pop Culture	
COM 274	Black Popular Culture	
COM 275	Black Adaptation	
COM 301	Media Law and Ethics	
COM 303	Audio/Video II	
COM 382	Global Digital Media	
COM 402	Advanced Web Design	
COM 410	Sports Media Production	
COM 441	Media and Community Engagement	
COM 442	Non-Profit Communications	
COM 443	Justice By Design	
COM 444	Mindful Communication	
COM 451	Privacy/Surv in the Dig Era	
COM 452	Podcasting	
COM 453	Visual Design II	
COM 455	Music Protest & Social Justice	
COM 457	Black Women Content Creators	
COM 460	Health Communication Advocacy	
COM 465	Bear Witness:Images/Soc Change	
COM 473	Special Topics/ Com&Digi Media ¹	
COM 475	Crime, Justice, & Media	
COM 491	Communications Internship ²	
COM 492	Independent Study	
COM 493	Indep Research Project I	
COM 494	Indep Research Project II	
Total Hours		39

¹ COM 473 may be repeated provided the topics are different.

² Com 491 may be taken a second time but credits will count as a general elective.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Internship

Students who have completed both 200 and 201 and have at least junior standing are eligible to take the Internship course as one of their option courses. In order to take the Communications Internship students must be a Communications major and have a GPA of 2.5 or higher.

Independent Study

Communication Studies students with junior or senior standing and an overall GPA of 3.0 may apply for credit in an independent study program. These courses usually cover a topic not typically offered as part of the standard selection of courses, but which will enhance the student's educational objectives. At the end of the semester preceding the semester in which an independent study is sought the interested students should submit a written proposal describing, with particulars, the planned study project. The minimum requirement for such a proposal is that it include a substantial critical and/or creative project, and the name of the appropriate faculty member.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
World History		3
Non-Native Language		3
Philosophy Level One		3
COM 200	Multimedia Storytelling I	3
Free Elective		3
Hours		15
Spring		
Mathematics		3
COM 201	Media and Society	3
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
2nd Non-Native Language (Meets Mission-Specific overlay)		3-4
Free Elective		3
Hours		16-17
Sophomore		
Fall		
Philosophy Level Two		3
Literature		3
COM 202 or COM 203	Visual Design I or Audio/Video I	3
Free Electives		6
Hours		15
Spring		
Theology		3
Social Science		3
COM 203 or COM 202	Audio/Video I or Visual Design I	3
COM 290	Professional Prep Seminar	1
Free Electives		6
Hours		16
Junior		
Fall		
Diversity		3
Writing Intensive		3
COM 371	Media Advocacy	3
COM Options course		3
Free Elective		3
Hours		15

Spring		
Religious Studies		3
COM 372	Intro to Web Design	3
COM Options course		3
Free Electives		6
Hours		15
Senior		
Fall		
Natural Science		3-4
COM Options courses		6
Free Electives		6
Hours		15-16
Spring		
COM 480	Senior Capstone	3
COM Options course		3
Free Electives		9
Hours		15
Total Hours		122-124

Communication Studies Minor

Learning Goals and Outcomes

Goal 1: Students will gain critical awareness of the social role of media.

Outcome 1.1: Students will understand the history and context of the role that media has played in society.

Outcome 1.2: Students will be able to articulate and critique the role media has historically played, and currently plays in society.

Goal 2: Students will understand the principles and practices of effective media communication.

Outcome 2.1: Students will be able to identify and employ a range of effective communication strategies to navigate audience, purpose, and context.

Goal 3: Students will understand and apply human centered design approaches to communicating through digital media.

Outcome 3.1: Students will analyze, articulate, and understand how multiple theoretical approaches of aesthetics and design inform the way audiences act, interact, and produce meaning.

Outcome 3.2: Students will be able to create media objects which effectively applies these design principles for a desired rhetorical goal.

Goal 4: Student will understand the relation between media and social responsibility.

Outcome 4.1: Students will understand and articulate the ethical questions and principles that inform the use of digital media.

Outcome 4.2: Students will understand and articulate how digital media has been, and can be, employed to facilitate innovation, social change, and civic engagement.

Goal 5: Students will be able to use digital media in a way which demonstrates information literacy.

Outcome 5.1: Students will employ digital media tools and approaches to establish the veracity and credibility of information.

Outcome 5.2: Students will demonstrate the ability to effectively manage the ubiquitous flow of digital media information.

Outcome 5.3: Students will be able to effectively use digital media to research, gather, and assess digital information and knowledge.

Requirements

Six courses are required to complete the minor. To gain solid grounding in the field of communications, all students will satisfy three core requirements and then select three other courses from a range of options. Students must apply to enter this Minor.

Code	Title	Hours
Core Courses		
COM 200	Multimedia Storytelling I	3
COM 201	Media and Society	3
Select three other COM courses at 200 level or above		9
Choose one other COM course at 300 level or above or one of the following courses:		3
ART 173	Digital Photography I	
ART 273	Commercial Photography	
ART 373	Photo Essay/Docu Photo	
ENG 206	Public Speaking & Presentation	
ENG 261	News Reporting	
ENG 263	Writing for Organizations	
ENG 265	Writing for Public Relations	
ENG 268	Fact-checking and Fake News	
ENG 343	Creative Nonfiction	
ENG 344	Screenwriting	
ENG 345	Tutor Prac, Writ Cntr Thry Pr	
ENG 346	The Art of The Interview	
ENG 360	Feature Writing	
ENG 362	Photojournalism	
ENG 363	Sports Journalism	
ENG 364	Stunt Journalism	
ENG 365	Multimedia Journalism	
ENG 443	Special Topics in Writing	
ENG 460	Magazine Writing	
ENG 461	Food Writing	
ENG 462	Travel Writing	
ENG 463	Literary Journalism	
ENG 466	Journalism & Entrepreneurship	
ENG 467	Communication and the Law	
ENG 468	Media/Culture in South Africa	
ENG 469	The Art of Editing	
ENG 492	English Internship	
GDS 290	Typography I	
MKT 301	Integrated Mktg Communications	
MKT 303	MKT Communications	
MKT 314	Social Media Marketing	
MKT 315	Mkt in a Multicultural World	
MKT 321	Advertising	
MKT 324	Public Relations and Publicity	
MKT 325	Fundamentals of Graphic Design	

MKT 341	Music Marketing	
MKT 353	Sports Marketing	
MKT 362	Digital Media in Sports	
MKT 365	eSports	
MTF 282	Screenwriting	
MTF 284	Digital Filmmaking	
MTF 382	Advanced Screenwriting	
MTF 383	Directing for Film/TV	
MTF 384	Advanced Light, Camera, Design	
MTF 386	Editing & Post-Production	
Total Hours		18

Computer Science

The Department of Computer Science is dedicated to equipping students with the tools necessary to become analytical problem solvers. Much of what a computer scientist does involves finding ways to make computers complete useful and interesting tasks. An ability to see the large-scale structure of a problem, a measure of persistence and attention to detail, will be rewarded with the satisfaction of making something work. Few inventions have had as much impact on modern life as the computer. Many fields of human endeavor have changed, and are changing, beyond all recognition as a result of the use of computers. A degree in computer science allows you to share in the excitement of a rapidly developing field.

Classes are taught by distinguished computer science faculty who bring their applicable experience working in the field and apply that knowledge directly in the classroom. Classes are small and student-focused, allowing for one-on-one interaction between students and faculty and close mentorship.

Faculty

The Computer Science Department's faculty and staff have been widely published in research journals related to image processing, medical imaging, computer graphics, numerical methods, social information-assisted system design and more. They are dedicated to sharing their research and knowledge with students and helping them learn the various aspects of the information technology and computer science industries to help them grow and succeed in their future careers.

Department of Computer Science Faculty & Staff (<https://www.sju.edu/departments/compsci/faculty-staff/>)

Department of Computer Science Part-Time Faculty

Programs

Undergraduate Majors

- Computer Science (p. 98)
- Information Technology (p. 101)

Undergraduate Minors

- Computer Science (p. 99)
- Information Technology (p. 103)

Graduate

- Computer Science (p. 100)

Computer Science Major

The program prepares students for professional careers and for advanced degree programs. Students learn to solve problems using the tools of computer science: networking, database management, artificial intelligence, 3D game development, graphics, web technologies, etc. Not only do students learn the science of the field in this program, but also the art of computer science as a creative endeavor.

Learning Goals and Outcomes

Goal 1: Students will learn how to perform the requirements of a practicing computer scientist.

Outcome 1: Students will be able to solve technical problems and implement their solutions in an appropriate computational environment.

Goal 2: Students will study the foundations of scientific and mathematical principles that support the computing discipline.

Outcome 2: Students will be able to design systems, components, or processes to meet specified requirements.

Goal 3: Students will be prepared to utilize what they have learned and communicate it to others.

Outcome 3: Students will be able to analyze and communicate contemporary issues related to the field orally and in written form.

Goal 4: Students will understand how to adapt and evolve in complex technological environments.

Outcome 4: Students will be able to work in teams to create various software systems.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		

Major Requirements

Code	Title	Hours
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
MAT 120	Precalculus	3
or MAT 161	Calculus I	
MAT 118	Introduction to Statistics	3
or MAT 128	Applied Statistics	
Core Courses		
CSC 120	Computer Science I	4
CSC 121	Computer Science II	4
CSC 201	Data Structures	4
CSC 202	Computer Architecture	3
CSC 240	Discrete Structures	3
CSC 261	Principles of Programming Lang	3

CSC 281	Design & Analysis Algorithms	3
CSC 310	Computer Systems	3
CSC 315	Software Engineering	3
CSC 495	Senior Project	3
Select five including any CSC courses numbered 320 or above		15
Total Hours		57-58

Free Electives

Seven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Areas of Interest

Students interested in **Artificial Intelligence** can take three electives from the following list:

Code	Title	Hours
CSC 330	Generative AI	3
CSC 349	Machine Learning	3
CSC 362	Artificial Intelligence	3
CSC 372	Game AI	3

Students interested in **Cybersecurity** can take three electives from the following list:

Code	Title	Hours
CSC 340	Intro to Cybercrime	3
CSC 364	Network Forensics	3
CSC 366	Intro to Ethical Hacking	3

Double Major in Computer Science

With the approval of the Department Chair, students who wish to double major in Computer Science and another discipline shall first satisfy the major's requirement of the nine required core courses and then take three additional Computer Science elective courses.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CSC 120	Computer Science I	4
INT 151	Inequality in American Society	1
Philosophy Level One or Theology		3
Mathematics		3-4
World History		3
Hours		14-15
Spring		
CSC 121	Computer Science II	4
MAT 155 or MAT 161	Fundamentals of Calculus or Calculus I	3-4
Non-Native Language		3-4
Social Science		3
ENG 101	Craft of Language	3
Hours		16-18
Sophomore		
Fall		
CSC 240	Discrete Structures	3
CSC 201	Data Structures	4

CSC 202	Computer Architecture	3
Theology or PHL Level One		3
Free Elective		3
Hours		16
Spring		
CSC 261	Principles of Programming Lang	3
CSC 281	Design & Analysis Algorithms	3
PHL Level Two		3
Diversity		3
Free Elective		3
Hours		15
Junior		
Fall		
CSC 315	Software Engineering	3
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
CSC Elective 1		3
Natural Science		3-4
Free Elective		3
Hours		15-16
Spring		
CSC 310	Computer Systems	3
CSC Elective 2		3
Literature		3
Elective or Writing Intensive overlay		3
Social Science		3
Hours		15
Senior		
Fall		
CSC Elective 3		3
CSC Elective 4		3
Fine & Performing Arts, Design, & Creativity		3
Elective or Mission Overlay		3
Religious Difference		3
Hours		15
Spring		
CSC 495	Senior Project	3
CSC Elective 5		3
Free Electives		9
Hours		15
Total Hours		121-125

Computer Science Minor

With the approval of the Department, students may minor in Computer Science. Upon acceptance, the advisor will assist in selecting courses appropriate for their area of interest. Students who elect this minor must take six (6) computer science courses.

Learning Goals and Outcomes

Goal 1: Graduates will be practicing computer scientists.

Outcome 1.1: Apply their knowledge of computer science, mathematics, and science to solve technical problems in an appropriate computational environment.

Goal 2: Graduates adapt and evolve in complex technological environments such as those found in the workplace.

Outcome 2.1: Apply their knowledge of computer science, mathematics, and science to solve technical problems in an appropriate computational environment.

Outcome 2.2: Analyze contemporary issues related to the evolving discipline of computer science.

Goal 3: Graduates have a firm foundation in the scientific and mathematical principles that supports the computing discipline.

Outcome 3.1: Apply their knowledge of computer science, mathematics, and science to solve technical problems in an appropriate computational environment.

Requirements

Code	Title	Hours
CSC 120	Computer Science I	4
CSC 121	Computer Science II	4
CSC 201	Data Structures	4
Three Computer Science electives numbered 202 and above.		9
Total Hours		21

Computer Science MS

The MS in Computer Science provides a comprehensive approach to advanced study in computer science. It also prepares the student to hold a variety of professional and technical positions in all areas of computer science.

Learning Goals and Outcomes

Goal 1: Graduates succeed as practicing computer scientists.

Outcome 1 (General Option): Solve problems and implement their solutions in an appropriate computational environment.

Outcome 1 (Artificial Intelligence): Solve problems and implement their solutions in an appropriate computational environment focusing on AI techniques and tools

Outcome 1 (Cybersecurity): Solve security-related problems and implement their solutions using appropriate computational tools, focusing on safeguarding digital systems and data.

Goal 2: Graduates adapt and evolve in complex technological environments such as those found in the workplace.

Outcome 2 (General Option): Analyze contemporary issues related to the evolving discipline of computer science.

Outcome 2 (Artificial Intelligence): Apply machine learning and AI algorithms to analyze and solve technical problems, leveraging the latest advancements in AI.

Outcome 2 (Cybersecurity): Apply knowledge of cryptography, network security, and risk management to address real-world cybersecurity challenges.

Goal 3: Graduates are careful, precise, mature thinkers, and take with them, the intellectual preparation they need to apply what they have learned and communicate it to others.

Outcome 3 (General Option): Communicate effectively, orally and in written form, individually and/or in teams.

Outcome 3 (Artificial Intelligence): Communicate effectively, orally and in written form, individually and/or in teams.

Outcome 3 (Cybersecurity): Communicate effectively, orally and in written form, individually and/or in teams.

Requirements

A student who receives a grade lower than a **B** in a core course must retake the course.

MS in Computer Science: General Option

A total of ten (six core and four elective) courses is the minimum required for the MS in Computer Science with General Option. Of these, a maximum of two courses may be for an approved research project.

Code	Title	Hours
Core Courses		
Select six of the following:		18
CSC 550	Object Oriented Design & Data Structures	
CSC 551	Design and Analysis	
CSC 552	Computer Architecture	
CSC 553	Computer Systems	
CSC 610	Software Engineering	
CSC 621	Database Systems	
CSC 680	Artificial Intelligence	
CSC 620	Internet Application Development	
Elective Courses		
Select any four CSC courses numbered 600 and more		12
Total Hours		30

MS in Computer Science: Concentration Option

A total of ten (four core and six elective) courses is the minimum for obtaining an MS degree in Computer Science in one of the following concentrations:

- Artificial Intelligence
- Cybersecurity

Students who do not need prerequisite courses take the following two required core courses during their first and second semesters, respectively.

Code	Title	Hours
Core Courses		
CSC 550	Object Oriented Design & Data Structures	3
CSC 551	Design and Analysis	3
Elective Courses		
Select two of the following:		6
CSC 552	Computer Architecture	
CSC 553	Computer Systems	
CSC 610	Software Engineering	
CSC 621	Database Systems	
CSC 680	Artificial Intelligence	

CSC 659	Intro to Cloud Computing
CSC 620	Internet Application Developmnt

Artificial Intelligence Concentration

Code	Title	Hours
Select four of the following plus any two CSC courses numbered 600 18 and above:		
CSC 680	Artificial Intelligence	
CSC 688	Generative AI	
CSC 673	Game AI	
CSC 643	Big Data and Web Intelligence	
CSC 672	Machine Learning	
CSC 685	Advanced Machine Learning	

Cybersecurity Concentration

Code	Title	Hours
Select four of the following plus any two CSC courses numbered 600 18 and above:		
CSC 665	Intro to Cybercrime	
CSC 668	Cybersecurity Core Domains	
CSC 645	Intro to Ethical Hacking	
CSC 652	Network Forensics	
CSC 656	Info Security Mgmt Systems	
CSC 667	Info Govern, Risk & Compliance	

Information Technology Major

The Department offers a BS in Information Technology program which prepares students for professional careers or advanced degree programs in the field of information technology with emphasis on database management, internet application development, software engineering and web technologies.

Learning Goals and Outcomes

Goal 1: Students will learn how to perform the requirements of a practicing informational technologists.

Outcome 1: Students will be able to solve technical problems and implement their solutions in an appropriate technological environment.

Goal 2: Students will study the foundations of scientific and mathematical principles that support the IT discipline.

Outcome 2: Students will be able to design systems, components, or processes to meet specified requirements of IT.

Goal 3: Students will be prepared to utilize what they have learned and communicate it to others.

Outcome 3: Students will be able to analyze and communicate contemporary issues related to the IT field orally and in written form.

Goal 4: Students will understand how to adapt and evolve in complex technological environments.

Outcome 4: Students will be able to work in teams to create various software systems within IT environments.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Social Science		
ECN 101	Introductory Economics Micro	

Major Requirements

Code	Title	Hours
Required Core Courses		
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
CSC 120	Computer Science I	4
CSC 121	Computer Science II	4
CSC 201	Data Structures	4
CSC 202	Computer Architecture	3
CSC 240	Discrete Structures	3
CSC 261	Principles of Programming Lang	3
CSC 310	Computer Systems	3
CSC 315	Software Engineering	3
CSC 495	Senior Project	3
ECN 102	Introductory Economics Macro	3
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Select five additional courses ¹		15
Total Hours		57-58

¹ Any ACC, CSC, DSS, ECN, or FIN courses with advisor approval.

Free Electives

Six courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Areas of Interest

Students interested in **Artificial Intelligence** can take three electives from the following list:

Code	Title	Hours
CSC 330	Generative AI	3
CSC 349	Machine Learning	3
CSC 362	Artificial Intelligence	3
CSC 372	Game AI	3

Students interested in **Cybersecurity** can take three electives from the following list:

Code	Title	Hours
CSC 340	Intro to Cybercrime	3
CSC 364	Network Forensics	3
CSC 366	Intro to Ethical Hacking	3

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CSC 120	Computer Science I	4
INT 151	Inequality in American Society	1
Philosophy Level One or Theology		3
World History		3
Mathematics		3-4
Hours		14-15
Spring		
CSC 121	Computer Science II	4
MAT 155	Fundamentals of Calculus	3-4
or MAT 161	or Calculus I	
or ECN 101	or Introductory Economics Micro	
Non-Native Language		3-4
Social Science		3
ENG 101	Craft of Language	3
Hours		16-18
Sophomore		
Fall		
CSC 201	Data Structures	4
CSC 240	Discrete Structures	3
ACC 101	Concepts of Financial Acct	3
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
PHL Level I or Theology		3
Hours		16
Spring		
CSC 261	Principles of Programming Lang	3
ACC 102	Managerial Accounting	3
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
PHL Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
CSC 202	Computer Architecture	3
CSC 351	Database Management Systems	3
Diversity		3
Natural Science		3-4
Free Elective		3
Hours		15-16
Spring		
CSC 310	Computer Systems	3
CSC 357	Internet of Things	3
or CSC 360	or Intro to Cloud Computing	
Literature		3
Elective or Writing Intensive overlay		3
Free Elective		3
Hours		15

Senior		
Fall		
CSC 315	Software Engineering	3
CSC 353	Internet Application Developmnt	3
ACC, CSC, DSS, ECN or FIN elective		3
Fine & Performing Arts, Design, & Creativity		3
Elective or Mission Overlay		3
Hours		15
Spring		
CSC 495	Senior Project	3
ACC, CSC, DSS, ECN or FIN elective		3
Religious Studies		3
Free Electives		6
Hours		15
Total Hours		121-125

Information Technology Minor

With the approval of the Department, students may minor in Information Technology. Upon acceptance, the advisor will assist in selecting courses appropriate for their area of interest. Students who elect this minor must take six (6) computer science courses.

Learning Goals and Outcomes

Goal 1: Graduates will be practicing information technologists.

Outcome 1.1: Apply their knowledge of information technology and business to solve technical problems in an appropriate computational environment.

Goal 2: Graduates adapt and evolve in complex technological environments such as those found in the workplace.

Outcome 2.1: Apply their knowledge of information technology and business to solve technical problems in an appropriate computational environment.

Outcome 2.2: Analyze contemporary issues related to the evolving discipline of information technology.

Goal 3: Graduates have a firm foundation in the computing and business principles that support the IT discipline.

Outcome 3.1: Apply their knowledge of information technology and business to solve technical problems in an appropriate computational environment.

Requirements

With the approval of the Department, students may minor in Information Technology. Upon acceptance, the advisor will assist in selecting courses appropriate for their area of interest.

Code	Title	Hours
CSC 120	Computer Science I	4
CSC 121	Computer Science II	4
CSC 201	Data Structures	4
Three (3) Computer Science electives numbered 202 and above.		9
Total Hours		21

Criminal Justice Faculty

The Department of Sociology and Criminal Justice prides itself on excellence in teaching. Faculty members bring their research interests and expertise in criminal justice into the classroom.

Department of Sociology and Criminal Justice (<https://www.sju.edu/departments/sociology/faculty-staff/>) Faculty & Staff (<https://www.sju.edu/departments/sociology/faculty/>)

Programs Undergraduate Major

- Criminal Justice (p. 103)

Undergraduate Minor

- Criminal Justice (p. 105)

Graduate

- Criminal Justice (p. 105)

Criminal Justice Major

The criminal justice major is designed to provide theoretical and practical knowledge for students interested in professional careers in traditional law enforcement fields such as federal law enforcement, corrections, courts, police, and probation; in administrative and management positions in criminal justice and private security; and in law and para-legal occupations. Moreover, the major's curriculum is intended to facilitate entry into graduate programs in criminal justice, sociology, and law, while also retaining a humanistic understanding of the study of crime. The criminal justice major at Saint Joseph's is distinguished by its emphasis on creative participation, student-faculty interaction, and independent research projects.

Learning Goals and Outcomes

Goal 1: Criminal justice majors will gain foundational knowledge of the core concepts and theoretical perspectives that define the causes of and responses to crime.

Outcome 1: Students will be able to define, classify, and compare the core concepts and theoretical perspectives that explain individual behaviors and criminal justice systems.

Goal 2: Criminal justice majors will analyze social problems with appropriate social scientific research methods.

Outcome 2: Students will be able to design a research study and apply appropriate designs and analytic methods to answer research questions.

Goal 3: Criminal justice majors will effectively communicate about their discipline.

Outcome 3: Students will be able to interpret and explain course content and empirical findings in oral and written communications.

Goal 4: Criminal justice majors will examine the impacts of culture and social structure on the criminal justice system.

Outcome 4: Students will be able to explain and critically assess the significance of race, class, gender identity, sexual identity, and age in the social construction of crime and justice.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		

Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
or GIS 101	Introduction to GIS	
or GIS 201	Intermediate GIS	
SOC 101	Intro to Sociology (will count for CCC: Diversity)	3
SOC 102	Social Problems (will count for CCC: Social Science)	3
SOC 118	Statistics in Social Sciences	3
SOC 190	Strategies for Success	1
SOC 206	Theories of Crime	3
SOC 207	Juvenile Justice	3
SOC 225	Intro to American CJ	3
SOC 290	Professional Prep Seminar	1
SOC 312	Research Methods	3
SOC 313	Data Analysis	3
SOC 470	Special Topics	3
SOC 495	Senior Thesis	3
Experiential learning is also a requirement and can include: study abroad, internships, study tour, or service learning classes.		0-3
Select five other SOC courses with a criminal justice attribute numbered above SOC 102. ¹		15
Total Hours		50-53

¹ Approved courses are indicated in the Sociology course descriptions.

Free Electives

Seven elective courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Requirements for College Honors in Sociology

To receive College Honors credit, Sociology majors will participate in the Senior Capstone experience required of all majors by taking SOC 495 as an honors course during the fall of the senior year. Additionally, College Honors candidates in Sociology will complete a second honors course during the spring of the senior year (SOC 497) that includes research, extending the senior capstone experience beyond what non-Honors students complete.

For students in the University Honors program, these two upgraded courses may be counted toward the eight course Honors requirement.

To be eligible to participate in College Honors, a student must have a 3.5 GPA. If you are interested in completing the College Honors project during your senior year, please be in touch with the department chair early in the spring of your junior year. More details concerning College Honors may be found under Honors Program (p. 46).

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
World History		3
SOC 101	Intro to Sociology	3
SOC 190	Strategies for Success	1
Philosophy Level One		3
Literature or Theology		3
Non-Native Language or Free Elective		3-4
Hours		16-17
Spring		
ENG 101	Craft of Language	3
SOC 225	Intro to American CJ	3
Philosophy Level Two		3
Theology or Literature		3
INT 151	Inequality in American Society	1
Free Elective or Non-Native Language		3-4
Hours		16-17
Sophomore		
Fall		
SOC 118 or MAT 118	Statistics in Social Sciences or Introduction to Statistics	3
Natural Science		3-4
SOC 102	Social Problems	3
SOC 207	Juvenile Justice	3
Free Elective		3
Hours		15-16
Spring		
SOC 206	Theories of Crime	3
Religious Studies		3
Experiential Learning		3
Major Elective		3
SOC 290		
Mission-Specific Overlay		3
Hours		15
Junior		
Fall		
SOC 312	Research Methods	3
Fine & Performing Arts, Design & Creativity		3
Mathematics		3-4
Major Elective		3
Free-Elective		3
Hours		15-16
Spring		
SOC 313	Data Analysis	3
Major Elective		3
Free Electives		9
Hours		15
Senior		
Fall		
SOC 495	Senior Thesis	3
Major Elective		3
Free Elective		9
Hours		15

Spring		
SOC 470	Special Topics	3
Major Elective		3
Free Elective		6-9
Hours		12-15
Total Hours		119-126

Criminal Justice Minor

Learning Goals and Outcomes

Goal 1: Criminal justice minors will gain foundational knowledge of the core concepts and theoretical perspectives that define the causes of and responses to crime.

Outcome 1: Students will be able to define, classify, and compare the core concepts and theoretical perspectives that explain individual behaviors and criminal justice systems.

Goal 2: Criminal justice minors will analyze social problems with appropriate social scientific research methods.

Outcome 2: Students will be able to design a research study and apply appropriate designs and analytic methods to answer research questions.

Goal 3: Criminal justice minors will effectively communicate about their discipline.

Outcome 3: Students will be able to interpret and explain course content and empirical findings in oral and written communications.

Goal 4: Criminal justice minors will examine the impacts of culture and social structure on the criminal justice system.

Outcome 4: Students will be able to explain and critically assess the significance of race, class, gender identity, sexual identity, and age in the social construction of crime and justice.

Requirements

Code	Title	Hours
SOC 102	Social Problems	3
SOC 206	Theories of Crime	3
SOC 207	Juvenile Justice	3
SOC 225	Intro to American CJ	3
SOC 312	Research Methods	3
or SOC 313	Data Analysis	
Select one additional 200+ course with a Criminal Justice attribute.		3

Sociology majors are required to take SOC 206, SOC 207, SOC 225 and any three additional SOC courses with a Criminal Justice attribute.

Psychology majors are required to take SOC 102, SOC 206, SOC 207, SOC 225 and any two additional SOC courses with a Criminal Justice attribute.

Total Hours **18**

Criminal Justice MS

Professor and Chair: Keith Brown, Ph.D., Department of Sociology and Criminal Justice

Graduate Director: Melissa A. Logue, Ph.D., Assistant Professor, Department of Sociology and Criminal Justice

The Master of Science in Criminal Justice is designed to meet the graduate education needs of practitioners and students pursuing careers in criminal justice in both the public and private sectors. While the 30-credit curriculum requires degree candidates to take four core courses, the student selects the remainder, dependent upon selected concentration. This arrangement allows individuals to create unique plans of graduate study that are compatible with their interests and career objectives in the field of criminal justice. The program is flexible enough to allow students to concentrate on the theoretical, methodological, and practical knowledge needed to become practitioners in criminal justice, pursue a degree beyond the Master's, or enhance the management skills necessary to succeed as upper-level decision-makers.

Course offerings and schedules are conveniently arranged to accommodate the needs of both full-time and part-time students. Courses are offered online.

Learning Goals and Outcomes

Goal 1: Students will demonstrate comprehension of criminological theories and/or ethical principles in criminal justice.

Outcome 1.1: (GEN) Students will evaluate criminological theories and/or ethical principles' applicability to criminal justice issues.

Outcome 1.2: (ICA): Students will assess ethical issues or dilemmas in intelligence and crime analysis by applying ethical principles and/or criminological theories to the production and use of intelligence data.

Outcome 1.3: (FBH): Students will analyze ethical issues or dilemmas and/or apply criminological theories to therapeutic interventions with offenders experiencing behavioral health issues.

Goal 2: Students will demonstrate proficiency in criminological research methods and/or writing skills to address criminal justice issues.

Outcome 2.1: (GEN): Students will evaluate research that shapes public policy and/or draft evidence-based approaches to criminal justice issues.

Outcome 2.2: (ICA): Students will develop analytical reports or briefings that effectively communicate intelligence-driven recommendations to policymakers.

Outcome 2.3: (FBH): Students will evaluate research on evidence-based therapeutic strategies and/or write a critical analysis of the impact of these strategies on offenders experiencing behavioral health issues.

Requirements

Core Requirements

A total of 30 credits for all concentrations is the minimum requirement for the degree. The graduate director serves as the students' advisor in the program. All students must satisfactorily complete the following core courses:

Code	Title	Hours
Core Courses:		
CRJ 550	Research Methods and Analysis	3

or CRJ 575	Adv Resrch Methds & Analysis	
CRJ 560	Criminological Theory	3
CRJ 565	Ethics and Criminal Justice	3
CRJ 570	Prof Writ for Criminal Justice	3
Total Hours		12

The remaining coursework should be chosen to facilitate the student's individual professional growth and/or is dependent upon concentration.

General Concentration

This concentration provides students the opportunity to enhance their theoretical foundation of criminal justice; develop cognitive skills including application of ethics, written and oral communications, critical thinking, reasoning, understanding, and conducting research; and prepare for their professional future.

Code	Title	Hours
Electives		18
Select six electives chosen from any available Criminal Justice Graduate courses.		
Total Hours		18

Concentration in Intelligence and Crime Analysis

This concentration provides insights into the contemporary functions of law enforcement intelligence and crime analysis. The specialized courses develop the deliberative and cognitive activities and methodologies including crime mapping that produce intelligence information in support of decision-making at the strategic, tactical, and operational levels of law enforcement. Students will be prepared for the growing number of intelligence and criminal analyst positions at the federal, state, and local levels.

Code	Title	Hours
Required Concentration Courses		
CRJ 642	Law Enforc Intel Analysis	3
CRJ 643	L.E. Intelligence:Policy & Pro	3
Specialized Area Courses		6
Select two courses from the following:		
CRJ 635	White Collar Crime	
CRJ 640	Terrorism: Threats and Strateg	
CRJ 641	Homeland Security	
CRJ 646	Risk Assessment	
CRJ 660	Foundations of Cybersecurity	
Electives		6
Select two Criminal Justice courses.		
Total Hours		18

Concentration in Forensic Behavioral Health

This is an excellent concentration for students and clinicians who want to learn about evidence-based and promising practices in the treatment of children, adolescents, and adults who become involved in the criminal justice system. This program focuses on the prevention, intervention, and treatment of offenders with behavioral health issues and the interface

of the socio-legal and political climate that impacts these individuals. Social justice, rehabilitation, and the use of treatment modalities and interventions in correctional settings and in the community found to reduce recidivism, restore wellness and provide a holistic approach to restorative justice, will be explored in this program. Those admitted into the concentration prior to the Fall 2021 semester will continue to have their concentration called Behavior Management and Justice. Students admitted for the Fall 2021 semester will have the concentration named Forensic Behavioral Health. Currently, only the name of the concentration has changed.

Code	Title	Hours
Choose Four Required Concentration Courses		12
CRJ 615	Youth Cultures and Deviance	
CRJ 616	Juvenile Justice & Delinquency	
CRJ 617	Mental Health & The Law	
CRJ 618	Therapeutic Strat Crim Justice	
CRJ 619	Fnds of Addiction:CRJ Profess	
CRJ 620	Evid Bas Prac Subt Ab/Beh Hlth	
Electives		6
Select two Criminal Justice courses.		
Total Hours		18

Data Science

Data science is an interdisciplinary field that employs methods and theories drawn from statistics, computer science (computer programming, databases, machine learning) and mathematics (calculus, probability, linear algebra) to extract insights from data with special emphasis on big data. Machine learning is a branch of artificial intelligence that deals with the study and development of algorithms and statistical models that allow computers to automatically learn patterns from data without being explicitly programmed. The field of data science encompasses topics such as exploratory data analysis, statistical inference, regression analysis, machine learning, cluster analysis, data wrangling, data mining, and data visualization.

Big data can be found in almost every sector of society, from business and industry, healthcare, education, and government. This necessitates the need to train individuals who can work with and analyze massive amounts of data to help organizations make informed decisions. The Data Science program at Saint Joseph's University is a joint interdisciplinary program of the Departments of Mathematics, Computer Science and Decision & System Sciences. The program offers a major and a minor in data science, which include electives not just in mathematics, computer science and decision & system sciences but also in other departments such as economics and biology.

Faculty

The required courses in the Data Science major and minor are taught by faculty from the Departments of Mathematics, Computer Science and Decision & System Sciences. Courses that count for the Data Science electives are taught not just by faculty in the three participating departments but also by faculty in other departments such as Economics and Biology.

Director

Dr. Rommel Regis

Advisory Board

Dr. Babak Forouraghi

Dr. Wei Chang

Dr. Ginny Miori

Dr. Abolfazl Saghaei

Dr. Baha Taoufik

Programs

Undergraduate Major

Data Science (p. 107)

Undergraduate Minor

Data Science (p. 109)

Data Science Major

The major in data science provides students with the skills and the theory necessary to analyze and derive insights from large sets of structured and unstructured data. The program aims to provide students with the computing and programming skills needed for data science. It also aims to provide them with a broad and deep understanding of the concepts in statistics, machine learning, neural networks, artificial intelligence, natural language processing, data visualization, data mining, and the mathematics that is foundational to these concepts.

Learning Goals and Outcomes

Goal 1: Students will be prepared for a variety of professions in data science and be able to adapt to complex technological and analytical environments in the workplace.

Outcome 1.1: Students will be able to perform standard data science tasks such as data wrangling, data visualization, statistical modeling, and the application of machine learning models.

Outcome 1.2: Students will be able to communicate, orally and in writing, the results of technical data analysis to both specialists and non-specialists.

Goal 2: Students will know the fundamental mathematical, statistical and computing skills needed for data science.

Outcome 2.1: Students will be able to write computer programs to solve a problem or perform a task needed for data science.

Outcome 2.2: Students will be able to perform basic computations in areas of math and statistics that are needed for understanding the methodologies and algorithms in data science.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3

World History Course Area	3
Philosophy Requirements	
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.	
Philosophy Level One	3
Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151 Inequality in American Society	1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
DSC 223	Intro Math of Data Science	3
DSC 325	Essentials of Data Science	3
or CSC 346	Introduction to Data Science	
DSC 326	Advanced Data Science	3
or CSC 347	Advanced Data Science	
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4
MAT 213	Calculus III	4
MAT 226	Introduction to Linear Algebra	3
MAT 321	Probability	3
CSC 115	Intro to Computer Science	3
or CSC 133	Python Programming for All	
CSC 120	Computer Science I	4
CSC 351	Database Management Systems	3
CSC 362	Artificial Intelligence	3
DSS 415	Data Wrangling & Visualization	3
or DSS 416	Data Wrangling: Ethics Int.	
DSS 445	Statistical Programming Lang	3
Statistics or Applied Math Elective (select one course, the others may be taken as Data Science Electives):		3
MAT 322	Mathematical Statistics	
MAT 313	Mathematical Optimization	
MAT 316	Operations Research	
DSC 424	Regression and Time Series	
Data Science Electives (select three courses):		9
DSC 225	Data Science for Sports	
DSC 424	Regression and Time Series	
DSC 425	Machine Learning/Data Science	
MAT 328	Design of Experiments	
MAT 423	Applied Statistical Methods	
MAT 311	Numerical Analysis	
MAT 313	Mathematical Optimization	
MAT 316	Operations Research	
MAT 322	Mathematical Statistics	
MAT 334	Combinatorics & Graph Theory	
MAT 420	Convex Analysis & Optimization	
CSC 330	Generative AI	
CSC 345	Image Data Science	
CSC 348	Advanced Machine Learning	
CSC 365	Intro to Security	
CSC 358	Big Data and Web Intelligence	
CSC 353	Internet Application Developmnt	
CSC 372	Game AI	
DSS 420	Introduction to Data Mining	
DSS 435	Advanced Business Analytics	
DSS 451	Machine Learning for Bus I	
DSS 455	Machine Learning for Bus II	
ECN 410	Econometrics	
ECN 487	Research Methods	

BIO 420 & 420L	Bioinformatics and Bioinformatics Lab
PHY 332	Intro. to Network Science
<hr/>	
Total Hours	58

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Double Major in Data Science

A double major in Data Science and Mathematics and a double major in Data Science and Computer Science are possible and can be completed within four years. A double major in Data Science and some other discipline might also be possible. For students who are interested in a double major in Data Science, please contact the program director.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CSC 115 or CSC 133	Intro to Computer Science or Python Programming for All	3
MAT 161	Calculus I	4
Non-native language or Social Science		3-4
World History		3
Philosophy Level One or Free Elective		3
Hours		16-17
Spring		
DSC 223	Intro Math of Data Science	3
MAT 162	Calculus II	4
ENG 101	Craft of Language	3
Social Science or Non-native language		3-4
Free Elective or Philosophy Level One		3
Hours		16-17
Sophomore		
Fall		
DSC 325	Essentials of Data Science	3
MAT 213	Calculus III	4
Natural Science		4
Literature		3
INT 151	Inequality in American Society	1
Hours		15
Spring		
DSC 326	Advanced Data Science	3
MAT 226	Introduction to Linear Algebra	3
Data Science Elective		3
Diversity		3
Free Elective		3
Hours		15
Junior		
Fall		
MAT 321	Probability	3
CSC 120	Computer Science I	4
DSS 445	Statistical Programming Lang	3
Philosophy Level Two		3
Free Elective		3
Hours		16
Spring		
Statistics or Applied Math Elective		3

DSS 415 or DSS 416	Data Wrangling & Visualization or Data Wrangling: Ethics Int.	3
Data Science Elective		3
Theology		3
Free Elective		3
Hours		15
Senior		
Fall		
CSC 351	Database Management Systems	3
CSC 362	Artificial Intelligence	3
Data Science Elective		3
Free Electives		6
Hours		15
Spring		
Religious Studies		3
Fine & Performing Arts, Design, & Creativity		3
Free Electives		6
Optional Free Elective		0-3
Hours		12-15
Total Hours		120-125

Data Science Minor

The Data Science Minor provides students with the skills and theory necessary to analyze and derive insights from large data sets. The curriculum includes techniques from statistics, mathematics and computer science. It encompasses academic topics including descriptive and inferential statistics, machine learning, cluster analysis, data mining, and data visualization.

Learning Goals and Outcomes

Goal 1: Students will learn basic statistical and computing skills and be prepared to enter the data science profession.

Outcome 1.1: Students will be able to perform standard data science tasks such as data wrangling, data visualization, statistical modeling, and the application of machine learning models.

Outcome 1.2: Students will be able to write computer programs to solve a problem or perform a task needed for data science.

Outcome 1.3: Students will be able to communicate, orally and in writing, the results of technical data analysis to both specialists and non-specialists.

Requirements

Code	Title	Hours
Six courses are required.		
Three Core Courses:		
CSC 115 or CSC 133	Intro to Computer Science Python Programming for All	3
DSC 223	Intro Math of Data Science	3
DSC 325 or CSC 346	Essentials of Data Science Introduction to Data Science	3
Three Elective Courses (select from the list below; at least one must be a DSC, CSC or MAT course):		9
DSC 225	Data Science for Sports	
DSC 326 or CSC 347	Advanced Data Science Advanced Data Science	

DSC 424	Regression and Time Series
DSC 425	Machine Learning/Data Science
MAT 311	Numerical Analysis
MAT 313	Mathematical Optimization
MAT 316	Operations Research
MAT 322	Mathematical Statistics
MAT 328	Design of Experiments
MAT 420	Convex Analysis & Optimization
MAT 423	Applied Statistical Methods
CSC 132	Artificial Intellig for All
or CSC 362	Artificial Intelligence
CSC 134	Databases for All
or CSC 351	Database Management Systems
CSC 330	Generative AI
CSC 342	Computer Vision
CSC 345	Image Data Science
CSC 348	Advanced Machine Learning
CSC 353	Internet Application Developmnt
CSC 358	Big Data and Web Intelligence
CSC 362	Artificial Intelligence
CSC 372	Game AI
ECN 410	Econometrics
ECN 487	Research Methods
DSS 415	Data Wrangling & Visualization
DSS 416	Data Wrangling: Ethics Int.
DSS 420	Introduction to Data Mining
DSS 435	Advanced Business Analytics
DSS 445	Statistical Programming Lang
DSS 451	Machine Learning for Bus I
DSS 455	Machine Learning for Bus II
BIO 420	Bioinformatics
& 420L	and Bioinformatics Lab
PHY 332	Intro. to Network Science
Any internship course (in any department) that is pre-approved as having sufficient data science content.	

Total Hours 18

Economics

Economics, at its core, is the relationship between unlimited needs and limited resources. It helps us understand trade-offs, big and small. In its introductory courses, the Department of Economics gives students an appreciation of the way economists view the world and some acquaintance with the economist’s techniques for analyzing problems. It strives to produce professionals who will be informed and valuable participants in public and private decision-making.

With two degree options, the BA in Economics and the BS in Quantitative Economics, the Department endeavors to offer a sufficient range of upper division courses so that students with a variety of intellectual and after-graduation career plans might be able to select a set of courses that matches individual interests and provides an appropriate preparation for individual careers. Economics advisors will help students select the best degree option and assortment of courses for those seeking careers in the private sector, or with non-profit organizations, international

organizations, or government agencies, and for those going on to graduate school or law school.

Faculty

All faculty members in Saint Joseph's University's economics department have published in prestigious economic journals and previously held positions as consultants and economists with high-level corporations and government entities.

Department of Economics Faculty & Staff (<https://www.sju.edu/departments/economics/faculty-staff/>)

Programs Undergraduate Majors

- Economics (p. 110)
- Quantitative Economics (p. 113)

Undergraduate Minor

- Economics (p. 112)
- Public Policy (p. 112)

Economics Major

The Bachelor of Arts in Economics provides a range of coursework in economics and related fields to prepare students for a wide range of careers in economics-related occupations.

Learning Goals and Outcomes

Goal 1: Students will understand how all issues in economics involve making choices in the context of scarcity.

Outcome 1.1: Students will be able to explain key concepts related to tradeoffs including opportunity cost and/or marginal decision-making of consumers and/or firms.

Goal 2: Students will understand how economic agents interact.

Outcome 2.1: Students will be able to explain the supply and/or demand model and/or how it is applied to input and/or output markets.

Goal 3: Students will understand important economic variables, how they are measured, and their relevance.

Outcome 3.1: Students will be able to define and explain key macroeconomic variables and/or how they affect the economy.

Goal 4: Students will understand how public policy impacts the economy.

Outcome 4.1: Students will be able to explain how policy affects the economy from micro and/or macroeconomic perspectives.

Requirements Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3

World History Course Area

3

Philosophy Requirements

Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One

3

Philosophy Level Two

3

Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology

3

Religious Studies

3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity

3

INT 151 Inequality in American Society

1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics

3-4

Natural Science

4

Social Science Requirement

3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive

3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay

3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours**47-49**

Major Requirements

Code	Title	Hours
ECN 101	Introductory Economics Micro (May be taken for CCC Social Science)	3
ECN 102	Introductory Economics Macro	3
ECN 290	Professional Prep Seminar	1
ECN 301	Microeconomic Theory	3
ECN 302	Macroeconomic Theory	3
Any six additional ECN 300/400-level economics courses ^{1 2}		18
Statistics (may be taken for CCC Math Requirement)		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
MAT 148	Applied Statistics Plus	
MAT 322	Mathematical Statistics (does NOT meet CCC: Mathematics requirement)	
DSS 210	Business Statistics (does NOT meet CCC: Mathematics requirement)	
One Course from the Following Quantitative Course List:		3
Any ECN, MAT, CSC, DSC, DSS, or GIS course		
One Course from the Following:		3-4
Any Course in Languages & Linguistics		
Any Course in Social Sciences (POL, IR, HIS, SOC, PSY, ECN)		
THE 373	Economic Ethics	
PSY 127	Behavioral Economics	
Experiential Learning Requirement		0-4
Includes ECN491, ANS490, Service-Learning course, Study abroad, The Washington Center, Independent Study – research, Summer Scholars, Winter Immersion Program (WIP), or Honors Thesis.		
Total Hours		40-46

¹ MAT 311, MAT 322, DSC 424, DSC 425, DSS 420, DSS 435, DSS 470, FIN 201 and FIN 302 can be substituted for the above requirements at a maximum of two substitutions.

² For students completing ECN 410 Econometrics, only five (5) economics electives are required (in total).

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
PHL Level One		3
World History		3
Non-Native Language		3
Free Elective		3
Hours		15
Spring		
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3

DLL or Social Science (Major)		3-4
ENG 101	Craft of Language	3
PHL Level Two		3
Free Elective		3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
ECN 301	Microeconomic Theory	3
Mathematics		3
Theology		3
ECN 290	Professional Prep Seminar	1
Free Elective		6
Hours		16
Spring		
ECN 302	Macroeconomic Theory	3
Literature		3
Natural Science		3-4
Free Electives		6
Hours		15-16
Junior		
Fall		
ECN 410	Econometrics	3
Religious Studies		3
Mission-Specific Overlay or Free Elective		3
Free Electives		6
Hours		15
Spring		
ECN Elective and/or Experiential Learning		3
Quantitative course (MAT/CSC/DSC/DSS/GIS/ECN) (major)		3
Diversity or Free Elective		3
Writing Intensive Overlay or Free Elective		3
Free Elective		3
Hours		15
Senior		
Fall		
ECN 410	Econometrics (or ECN Elective)	3
ECN Elective		6
Fine & Performing Arts, Design, & Creativity		
Free Electives		6
Hours		15
Spring		
ECN Electives		6
Free Electives		9
Hours		15
Total Hours		122-124

Economics Minor

Learning Goals and Outcomes

Goal 1: Students will understand how all issues in economics involve making choices in the context of scarcity.

Outcome 1.1: Students will be able to explain key concepts related to tradeoffs including opportunity cost and/or marginal decision-making of consumers and/or firms.

Goal 2: Students will understand how economic agents interact.

Outcome 2.1: Students will be able to explain the supply and/or demand model and/or how it is applied to input and/or output markets.

Goal 3: Students will understand important economic variables, how they are measured, and their relevance.

Outcome 3.1: Students will be able to define and explain key macroeconomic variables and/or how they affect the economy.

Goal 4: Students will understand how public policy impacts the economy.

Outcome 4.1: Students will be able to explain how policy affects the economy from micro and/or macroeconomic perspectives.

Requirements

Code	Title	Hours
ECN 101	Introductory Economics Micro	3
ECN 102	Introductory Economics Macro	3
Any four economics courses numbered 300 level or higher *		12
Total Hours		18

* MAT 311, MAT 322, DSC 424, DSC 425, DSS 420, DSS 435, DSS 470, FIN 201, or FIN 302 can be used in place of one of the four additional 300 level or higher ECN courses.

Public Policy Minor

Learning Goals and Outcomes

Goal 1: Learn Fundamental Knowledge: Students will gain foundational knowledge in the primary subfields of Public Policy and understand the content, core concepts, and theories within the discipline.

Outcome 1.1: Students will identify, define, and explain the content, core concepts, and theories that guide the creation of public policy from an integrated, interdisciplinary perspective.

Goal 2: Think and Make Arguments: Students will think critically and develop arguments based on evidence.

Outcome 2.1: Students will articulate verbally and/or in writing an argument which defines, explains, and/or analyzes the content, process, and outcomes of public policy.

Goal 3: Think and Apply their Skills to Analysis: Students will evaluate arguments based on empirical evidence and assertions rooted in the discipline.

Outcome 3.1: Students will apply a variety of tools, methods, and perspectives to critically analyze and evaluate issues relevant to the discipline of Public Policy.

Requirements

Code	Title	Hours
Four Core Courses		
POL 111	Intro to American Politics	3
or POL 113	Intro to Comparative Politics	
ECN 101	Introductory Economics Micro	3
SOC 101	Intro to Sociology	3
or SOC 102	Social Problems	

POL 313	Public Policy	3
or ECN 340	Public Finance & Public Policy	
Data Methods Course		3
ECN 410	Econometrics	
POL 415	Applied Research Mixed Methods	
SOC 313	Data Analysis	
Elective Course		3
Cannot be from student's major		
COM 371	Media Advocacy	
COM 460	Health Communication Advocacy	
ECN 330	Economics of Labor	
ECN 340	Public Finance & Public Policy	
ECN 375	Environmental Economics	
ECN 382	Urban Economics	
ECN 390	The Economics of Healthcare	
ECN 483	Ripped from the Headlines	
ECN 484	Race and the Economy	
ECN 485	Food and the U.S. Economy	
ECN 487	Research Methods	
ECN 491	Economics Internship	
GIS 101	Introduction to GIS	
GIS 201	Intermediate GIS	
HIS 392	Museums, Monuments, and Media	
HIS 491	Philadelphia Area Internship	
POL 304	Engaging Communities	
POL 306	Political Participation in US	
POL 309	Advising and Advocacy	
POL 316	State and Local Government	
POL 319	Public Opinion & Media	
POL 323	Women and American Politics	
POL 324	Race & Ethnic Politics in U.S.	
POL 326	Protesting Inequality	
POL 328	U.S. Immigration	
POL 331	Latin American Politics	
POL 334	Understanding Putin's Russia	
POL 336	The EU and European Politics	
POL 337	Contemp Cuban Pol & Society	
POL 352	Global Political Economy	
POL 356	American Foreign Policy	
POL 364	IR of East Asia: War and Peace	
POL 367	Ethics in International Affairs	
POL 368	Sex & Power around the World	
POL 390	Minternship 1	
POL 391	Minternship 2	
POL 392	Minternship 3	
POL 402	Capstone: Contentious Pol in US	
POL 403	Capstone: Nations & Nationalism	
POL 404	Capstone: Transforming Conflict	
POL 405	Capstone: Pol of Labor & Work	
POL 413	International Internship I	
POL 414	International Internship II	
POL 490	Global Smarts Internship	

POL 491	Philadelphia-Area Internship
SOC 253	Race and Social Justice
SOC 270	Special Topics (Discovering Urban Layers)
SOC 312	Research Methods
SOC 349	Poverty Ethics & Social Policy
SOC 355	Race, Crime & CJ
SOC 378	Urban and Public Policy
SOC 401	Higher Education Policy
SOC 490	Internship
ANS 490	CAS Internship I
HAD 304	Health Policy

Total Hours**18**

Quantitative Economics Major

The Bachelors of Science in Quantitative Economics provides a range of coursework in economics and related fields to prepare students for careers in a variety of quantitative occupations as well as graduate school in economics or related fields.

Learning Goals and Outcomes

Goal 1: Students will understand how all issues in economics involve making choices in the context of scarcity.

Outcome 1.1: Students will be able to explain key concepts related to tradeoffs including opportunity cost and/or marginal decision-making of consumers and/or firms.

Goal 2: Students will understand how economic agents interact.

Outcome 2.1: Students will be able to explain the supply and/or demand model and/or how it is applied to input and/or output markets.

Goal 3: Students will understand important economic variables, how they are measured, and their relevance.

Outcome 3.1: Students will be able to define and explain key macroeconomic variables and/or how they affect the economy.

Goal 4: Students will be able to demonstrate knowledge of econometric and quantitative methodology in economics.

Outcome 4.1: Students will be able to apply quantitative methods to economic theories and/or models and/or analysis.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		

Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
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Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
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Religious Studies	3
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Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
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INT 151	Inequality in American Society	1
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Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
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Natural Science	4
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Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Major Requirements

Code	Title	Hours
ECN 101	Introductory Economics Micro (will count for CCC: Social Science)	3
ECN 102	Introductory Economics Macro	3
ECN 290	Professional Prep Seminar	1
ECN 301	Microeconomic Theory	3
ECN 302	Macroeconomic Theory	3
ECN 410	Econometrics	3
Any 300/400-level ECN course		3
Any three of the following quantitative economics electives ¹		9
ECN 322	International Macroeconomics	
ECN 330	Economics of Labor	
ECN 350	Monetary Economics	
ECN 365	Game Theory	
ECN 375	Environmental Economics	
ECN 382	Urban Economics	
ECN 487	Research Methods	
ECN 491	Economics Internship	
ANS 490	CAS Internship I	
Any Statistics Course		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
MAT 148	Applied Statistics Plus	
MAT 322	Mathematical Statistics	
DSS 210	Business Statistics	
Calculus (will count as CCC: Mathematics)		3-4
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Choose one from the following list of Quantitative Courses:		3
Any one course from MAT, CSC, DSC, DSS, GIS, or ECN		
Experiential Learning Requirement		0-4
Includes ECN491, ANS490, Service-Learning course, Study abroad, The Washington Center, Independent Study – research, Summer Scholars, Winter Immersion Program (WIP), or Honors Thesis.		
Total Hours		37-43

¹ MAT 311, MAT 322, DSC 424, DSC 425, DSS 420, DSS 435, and DSS 470 can be substituted for the above economics requirements at a maximum of two substitutions.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
PHL Level One		3

World History		3
Non-Native Language		3
INT 151	Inequality in American Society	1
Free Elective		3
Hours		16
Spring		
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
Mathematics		3-4
ENG 101	Craft of Language	3
PHL Level Two		3
Free Elective		3
Hours		15-16
Sophomore		
Fall		
ECN 301	Microeconomic Theory	3
Statistics		3
ECN 290	Professional Prep Seminar	1
Theology		3
Free Electives		6
Hours		16
Spring		
ECN 302	Macroeconomic Theory	3
Literature		3
Natural Science or Free Elective		3-4
Free Electives		6
Hours		15-16
Junior		
Fall		
ECN 410	Econometrics	3
Religious Studies		3
Mission-Specific Overlay or Free Elective		3
Free Elective or Natural Science		3-4
Free Elective		3
Hours		15-16
Spring		
Quantitative ECN Elective and/or Experiential Learning		3
Additional course from MAT/DSC/CSC/DSS/GIS/ECN (major)		3
Diversity or Free Elective		3
Writing Intensive Overlay or Free Elective		3
Free Elective		3
Hours		15
Senior		
Fall		
Quantitative ECN Elective		3
ECN Elective		3
Fine & Performing Arts, Design, & Creativity		3
Free Electives		6
Hours		15
Spring		
Quantitative ECN Elective		3
Free Electives		12
Hours		15
Total Hours		122-125

English, Writing & Journalism

Crucial to the centuries-old Ignatian vision that guided the establishment of Jesuit colleges and universities are two concepts: caring for the student as an individual (*cura personalis*) and imparting to the student a

skill in thoughtful, imaginative, and well-organized language (*eloquentia perfecta*).

The Department of English, Writing & Journalism and its curriculum encourage the growth of our students in these traditions. Our courses guide them to appreciate imaginative literature and to master rhetorical skills traditionally associated with Jesuit education—including cultivating an individual and discerning voice in both writing and speaking.

We are committed to the University's mission by connecting faith, intellectual commitment, and social justice in our teaching. By offering service-learning and diversity courses and by developing mentoring relationships between faculty and students, we encourage a striving for the greater intellectual and social good.

The Department of English, Writing & Journalism supports the University mission by calling upon our students to embrace:

- An openness to imaginative, moral, and spiritual growth
- A confidence in their own intellectual reach and competence
- A commitment to being men and women with and for others
- A commitment to social justice
- A willingness and an ability to lead.

Faculty

The teacher-student relationship is one of the department's greatest strengths. Classes are taught by a committed and highly accomplished faculty who are enthusiastic about research and writing and publish frequently but who are particularly devoted to teaching and student development. In fact, faculty members have frequently received awards and grants in teaching, literature, creative writing and journalism. Small classes, careful advising, individualized instruction, discussion-oriented seminars and writing workshops provide a personal atmosphere for learning. Students are encouraged to consult their advisor and teachers frequently and freely.

Department of (<https://www.sju.edu/departments/english-writing-journalism/faculty-staff/>) English, Writing and Journalism Faculty & Staff (<https://www.sju.edu/departments/english-writing-journalism/faculty-staff/>)

Programs Undergraduate Major

- English (p. 117)

Undergraduate Minors

- Creative Writing (p. 116)
- English (p. 119)
- Journalism (p. 120)

Graduate

- Writing Studies (p. 120)

Graduate Certificate

- Creative and Professional Writing (p. 116)

Creative and Professional Writing Graduate Certificate

Overview

Students who enroll in this certificate program may take courses within the existing Writing Studies MA program, housed in the English Department. The 15-credit certificate program takes half the time of the MA and does not require a thesis. Certificate students who wish to continue on to the MA are welcome to do so.

Learning Goals and Outcomes

Goal 1: Acquire knowledge of the writing process (addressed specifically in ENG 550)

Objective 1.1: Exercise patterns of invention for creating original work by following a process-oriented approach to writing that includes brainstorming, drafting, and revision.

Goal 2: Develop editorial skills (addressed in all our offerings)

Objective 2.1: Formulate constructive responses to the work of their peers regarding stylistic choices and organizational principles in one or more creative literary forms, such as poetry, fiction, and creative nonfiction. (Addressed specifically in ENG 550 and all our workshop offerings)

Objective 2.2: Practice editing skills through examining their own writing. (Addressed specifically in ENG 550 and all our workshop offerings.)

Goal 3: Acquire knowledge of the publishing process (addressed specifically in ENG 550)

Objective 3.1: Locate publishing venues and prepare a manuscript for submission in one or more genres, such as fiction, nonfiction, poetry, journalism, academic writing, or online content.

Goal 4: Develop rhetorical skills through analysis and practice (addressed in all our course offerings)

Objective 4.1: Demonstrate knowledge of rhetorical concepts, such as audience, purpose, and medium.

Objective 4.2: Practice analyzing appeals to character, emotion, and logic in persuasive discourse.

Requirements

Code	Title	Hours
Choose 5 Electives:		15
Five elective courses of level ENG 550 or above within Writing Studies. Such courses include but are not limited to the following:		
ENG 550	The Practice of Writing	
ENG 600	Poetry Today	
ENG 612	Biography	
ENG 614	The Short Story	
ENG 616	Writing and Inciting	
ENG 617	Writing and the Other Arts	
ENG 619	Reading & Writing Y.A. Novels	
ENG 620	Special Topics in Lit/Culture	

ENG 621	Horror in Literature & Film
ENG 630	Composition Theory
ENG 635	The Writing Teacher Writing
ENG 636	Writing & Empowerment
ENG 640	Experiments in Narrative
ENG 641	RhetoricalTheory:SpecialTopics
ENG 642	Style
ENG 643	Special Topics in Essay
ENG 646	Multimedia Writing Workshop
ENG 665	Memoir
ENG 668	Creative Nonfiction Workshop
ENG 669	Poetry Writing Workshop
ENG 670	Fiction Writing Workshop
ENG 671	Fiction Writing Workshop II
ENG 673	Screenwriting Workshop
ENG 675	Special Topics Writing Wkshop
ENG 676	Writing for Publication
ENG 677	Case Study:Public Relations
ENG 678	Case Study: MagazinePublishing
ENG 679	Special Topics in Journalism
ENG 680	Writing for Nonprofits
ENG 681	Writers at Work
ENG 682	New Media
ENG 683	Editing Practicum
ENG 684	Health Writing

Total Hours 15

Creative Writing Minor

Learning Goals and Outcomes

Goal 1: Develop creative abilities.

Outcome 1.1: Students will exercise their imaginations in crafting their own creative works.

Goal 2: Develop revision strategies and editing skills.

Outcome 2.1: Students will improve their creative work through revision and editing.

Goal 3: Practice a range of creative writing genres, including but not limited to: fiction, poetry, creative nonfiction, screenwriting, and playwriting.

Outcome 3.1: Students will write in various creative writing genres with an understanding of the conventions of each.

Goal 4: Learn to critique and revise creative work by way of workshops.

Outcome 4.1: Students will critique the creative work of others in a constructive and insightful manner.

Requirements

The minor in Creative Writing requires four creative writing courses beyond ENG 101 and ENG 241. Students may use ENG Creative Writing courses from their Fine Arts, Design, and Creativity requirement and Diversity requirement to complete the minor.

English majors minoring in Creative Writing must take four ENG Creative Writing courses beyond the ten courses required for the major.

Code	Title	Hours
Two required courses:		
ENG 101	Craft of Language	3
ENG 241	Creative Writing: Intro Wrkshop	3
Four additional Creative Writing courses from the list below:		12
ENG 332	Playwriting	
ENG 333	Read, Write, Adapt Thtre Drama	
ENG 341	Poetry Workshop	
ENG 342	Fiction Workshop	
ENG 343	Creative Nonfiction	
ENG 344	Screenwriting	
ENG 384	The Essay	
ENG 424	Contemporary American Poetry	
ENG 426	Nature & Environmental Writing	
ENG 443	Special Topics in Writing	
ENG 444	Race, Class, and Gender	
ENG 449	Travel Writing Abroad	
ENG 450	Health, Advocacy, Storytelling	
ENG 451	N. Ireland Conflict & Story	
ENG 452	Writing and Reading Animals	
Independent studies may be approved by the Chair to count towards the Creative Writing minor depending on the topic.		
Total Hours		18

English Major

Through its challenging and rewarding program of study, the Department of English, Writing & Journalism introduces students to the formative traditions in literature; supports students as they develop as creative and professional writers; and provides students with a wide array of news writing, reporting, editing and multimedia skills.

English majors can explore their particular interests through a variety of courses in literature, writing, theatre/drama, and journalism. Over the course of our program, students will integrate close reading and extensive writing. They will also learn fundamentals of research in order to foster critical thinking, as well as digital and information literacies.

The English major thus equips our students to enter many careers, including editing, publishing, teaching, technical writing, business, and the law. Current graduates include college professors, teachers, journalists, novelists, poets, lawyers, pharmacists, physicians, social workers, and public-relations specialists.

Learning Goals and Outcomes

Goal 1: Study literature in diverse genres and by diverse authors.

Outcome 1.1: Students will be able to analyze and examine how the study of literature reveals the diversity of human experience and the complex and dynamic nature of culture and literary expression.

Goal 2: Learn diverse principles of composing as modeled by diverse authors.

Outcome 2.1: Students will be able to identify, analyze, and apply rhetorical, aesthetic, material, technical, and/or creative principles of composing.

Goal 3: Develop core journalistic skills for diverse and inclusive storytelling.

Outcome 3.1: Students will be able to analyze and/or apply core journalistic skills in research, interviewing, storytelling, and editing across various media platforms, taking into account their ethical responsibilities in decision-making, and/or best practices for diverse and inclusive storytelling.

Goal 4: Participate in and reflect on experiential learning opportunities.

Outcome 4.1: Students will be able to engage in and critically reflect upon experiential learning opportunities—such as internships, study abroad programs, and/or service-learning courses.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3

If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Major Requirements

Code	Title	Hours
Courses		Credits
2	Literature Courses	6
2	Writing Courses	6
2	ENG Diversity Courses	6
1	Sophomore Seminar (ENG 222)	3
3	ENG Electives	9
1	Experiential Learning Overlay ¹	
Total Hours		30

¹ Majors must also take an Experiential Learning Overlay, either as one of the ten required ENG courses or as a course from a different subject area. Options for fulfilling the Experiential Learning Overlay requirement include service learning courses, study tours and courses taken while studying abroad, internships, and field experiences for education courses. Please consult with your advisor or the department chair about how experiential learning can complement your program of study.

Independent Studies and Internships

English majors who have completed four regular semesters with an overall grade point average of 3.0 (or a cumulative average of 3.4 or higher for courses in English) may apply for credit in an independent study program, generally involving a topic that is not typically offered in the English curriculum and that will enrich the student's study in the major. At the end of the sophomore or early in the junior year, interested students should submit a written proposal describing, with particulars, the planned study project. The minimum requirement for such a proposal is that it include a substantial critical or creative writing project. If the proposal is accepted, the student will be assigned a faculty mentor who will oversee the writing project, offer advice on readings, help with the selection of courses, and establish a timetable for the completion of

the writing project. The project may extend over one or two semesters. Serious and satisfactory work for one semester will earn three credits. A student who successfully completes the two-semester project will receive six credits.

The English Internship course ENG 492 is designed to guide students who wish to earn credit for professional work experience in areas such as writing, editing, social media management, or journalism. Possible venues include, but are not limited to, newspapers and magazines, academic journals, publishing companies, television stations, radio stations, public relations firms and communications departments, online media outlets, advertising agencies, governmental and university departments, nonprofit organizations, and private and public schools. Students must complete a minimum of 112 hours at the internship site during the semester. Course requirements include a statement of goals, a journal or field notes, a profile of an English graduate for the English Department blog, attendance at a career-related panel or activity, a letter of assessment from an internship supervisor, a final Reflection Essay, and an updated resume or link to a web-based resume. A minimum GPA of 3.0 (or cumulative average of 3.4 or higher for courses in the major field), or permission of instructor is required.

The independent study and internship courses are:

Code	Title	Hours
ENG 370	Independent Study:Jr. Level	3
ENG 470	Independent Study:Senior Level	3
ENG 492	English Internship	3
ENG 493 & ENG 494	Indep Research Project (Fall) and Indep Research Project (SPR)	6-9

Free Electives

The number of free electives will vary. Students must complete enough electives to reach a minimum total of 120 credits for graduation. Students are encouraged to use their electives to explore a secondary major or minor.

Typical Course Sequence

This is a typical sequence. Consult with your faculty advisor regarding the most appropriate sequence of courses for your circumstances.

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
Non-Native Language		3-4
Mathematics		3-4
Philosophy Level One or Theology		3
Social Science		3
INT 151	Inequality in American Society (save for Spring if 18 credits)	1
Hours		16-18
Spring		
World History		3
Literature		3
Diversity		3
Theology or Philosophy Level 1		3
Free Elective/Minor/Secondary Major		3
INT 151	Inequality in American Society (If not taken in Fall)	1
Hours		16

Sophomore		
Fall		
English Major Course #1		3
English Major Course #2		3
Religious Studies or Philosophy Level 2		3
Fine & Performing Arts, Design, Creativity		3
Free Elective/Minor/Secondary Major		3
Hours		15
Spring		
ENG 222	SophSem:Critical App Lit Study (English Major Course #3)	3
English Major Course #4		3
Philosophy Level 2 or Religious Studies		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Hours		15
Junior		
Fall		
English Major Course #5		3
English Major Course #6		3
Natural Science		4
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Hours		16
Spring		
English Course #7		3
English Course #8		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Hours		15
Senior		
Fall		
English Course #9		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Hours		15
Spring		
English Course #10		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Free Elective/Minor/Secondary Major		3
Hours		15
Total Hours		123-125

English/Secondary Education

Students majoring in English who are interested in teaching grades 7-12 can dual major in English/Secondary Education (7-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In consultation with their advisor, English/Secondary Education dual majors will follow a course sequence that incorporates their required Education courses into the English major and ends with student teaching in the spring semester of their senior year. In addition to their English

advisor, English/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 ([https://academiccatalog.sju.edu/search/?P=EDU %20491](https://academiccatalog.sju.edu/search/?P=EDU%20491)) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i).

See the English major for specific requirements. (p. 117)

See the Secondary Education (7-12) major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

English Minor

Learning Goals and Outcomes

Goal 1: Study literature in diverse genres and by diverse authors.

Outcome 1.1: Students will be able to analyze and examine how the study of literature reveals the diversity of human experience and the complex and dynamic nature of culture and literary expression.

Goal 2: Learn diverse principles of composing as modeled by diverse authors.

Outcome 2.1: Students will be able to identify, analyze, and apply rhetorical, aesthetic, material, technical, and/or creative principles of composing.

Goal 3: Develop core journalistic skills for diverse and inclusive storytelling.

Outcome 3.1: Students will be able to analyze and/or apply core journalistic skills in research, interviewing, storytelling, and editing across various media platforms, taking into account their ethical responsibilities in decision-making, and/or best practices for diverse and inclusive storytelling.

Requirements

The minor in English requires five upper-level (200 or above) English courses beyond ENG 101. Students may choose any combination of English courses in literature, writing, journalism, or drama/theatre, including independent studies and internships. Students may use ENG courses from their Fine and Performing Arts, Creativity, and Design requirement, Diversity requirement, and Literature requirement to complete the minor.

Journalism Minor

Learning Goals and Outcomes

Goal 1: Explore the vital role that media organizations play in sustaining democracies by holding governments, institutions, organizations, and individuals accountable to their constituents.

Outcome 1.1: Students will be able to explain the rights and responsibilities of a free press and its practitioners.

Goal 2: Learn basic journalism principles and accepted tenets of journalism ethics and the law.

Outcome 2.1: Students will be able to apply basic journalism principles that follow ethical guidelines and/or knowledge of communication law.

Goal 3: Develop ideation, reporting, writing/production, revision and copy editing skills to create journalistic content that is consistent with accepted journalism practice and style.

Outcome 3.1: Students will be able to ideate, report, create, and edit journalistic content in a variety of formats and styles.

Goal 4: Learn best practices for diverse and inclusive storytelling.

Outcome 4.1: Students will be able to ideate, report and produce content that reflects best journalistic practices in inclusive storytelling.

Requirements

The minor in Journalism requires six journalism courses.

Code	Title	Hours
Two required Journalism courses:		
ENG 261	News Reporting	3
ENG 492	English Internship	3
Four additional Journalism courses from the list below:		12
ENG 268	Fact-checking and Fake News	
ENG 269	Intro Media &Cultural Studies	
ENG 346	The Art of The Interview	
ENG 350	Advanced News Reporting	
ENG 360	Feature Writing	
ENG 362	Photojournalism	
ENG 363	Sports Journalism	
ENG 364	Stunt Journalism	
ENG 365	Multimedia Journalism	
ENG 460	Magazine Writing	
ENG 461	Food Writing	
ENG 462	Travel Writing	
ENG 463	Literary Journalism	
ENG 464	Media, Politics & the Election	
ENG 465	Special Topics in Journalism	
ENG 466	Journalism & Entrepreneurship	
ENG 467	Communication and the Law	
ENG 468	Media/Culture in South Africa	

ENG 469	The Art of Editing
Total Hours	18

For English majors minoring in journalism: of the six required courses for the Journalism Minor, no more than two courses may also count towards the English Major.

Writing Studies MA

Director: Cristina Hanganu-Bresch (<https://directory.sju.edu/cristina-hanganu-bresch/>), PhD.

The Writing Studies program is unique to the Philadelphia area. Our program bridges the gap between traditional master’s degrees in English and creative writing degrees by emphasizing that all writing is creative. Our students take a wide variety of courses in order to explore the craft of writing from various perspectives.

This innovative program has several distinguishing features: it offers excellent training for magazine or journal editors and freelance writers; it provides rich growth opportunities for teachers of writing at the secondary or community college level; it provides important experience for traditional journalists; it incorporates collaborative workshops to stimulate creativity; and it develops skills important for success in corporate communications and public relations.

All of the teachers in the Writing Studies program are practicing writers who write in the genre that they teach. In other words, our public relations writing courses are taught by public relations writers, and published novelists teach our novel writing courses. All of our courses are small—typically fifteen students or less—to enable each student to get individual feedback from the instructor and detailed feedback from peers.

The students in the Writing Studies program are diverse in age, race, occupation, gender, and belief systems. The diversity of our students contributes to the success of our program. In addition to world-class writing faculty, students in our MA bring a wide range of ideas, creativity, and energy to our classes. Each class becomes its own community of writers.

In the Jesuit tradition of *eloquentia perfecta*, all Writing Studies courses engage students in using speech and writing effectively, logically, gracefully, persuasively, and responsibly. Students focus on developing the craft of a professional writer through drafting, revising, and incorporating feedback from peers and instructors as the writing progresses toward publication. We hope all of our students will become working writers who write for a wide variety of audiences.

This program is designed to position its graduates to be very competitive in the broad field of professional writing and communications. The courses in the program are all focused, in one way or another, on the work of the writer. Graduates will pursue careers in a wide range of areas: public relations, magazine and book editing, freelance writing (fiction and nonfiction), print and broadcast journalism, corporate communications, and the teaching of writing. The Writing Studies program accommodates both full-time and part-time students.

Learning Goals and Outcomes

Goal 1: Acquire knowledge of the writing process.

Outcome 1.1: Students will exercise patterns of invention for creating original work by following a process-oriented approach to writing that includes brainstorming, drafting, and revision.

Goal 2: Develop editorial skills.

Outcome 2.1: Students will formulate constructive responses to the work of their peers regarding stylistic choices and organizational principles in one or more creative literary forms (poetry, fiction, and creative nonfiction).

Outcome 2.2: Students will practice editing skills through examining their own writing.

Goal 3: Acquire knowledge of the publishing process.

Outcome 3.1: Students will locate publishing venues and prepare a manuscript for submission in one or more genres, such as fiction, nonfiction, poetry, journalism, academic writing, or online content.

Goal 4: Develop rhetorical skills through analysis and practice.

Outcome 4.1: Students will demonstrate knowledge of rhetorical concepts, such as audience, purpose, and medium.

Outcome 4.2: Students will practice analyzing appeals to character, emotion, and logic in persuasive discourse.

Goal 5: Develop long-form writing skills.

Outcome 5.1: Students will plan, write, revise, and edit a work of at least 60-80 pages.

Requirements

The MA in Writing Studies requires 30 credits of graduate work. Six credits will come from a thesis project (either an analytical study or a collection of original creative material at the 700 level). The remaining credits involve courses at the 500 and 600 level. The program includes provisions for internships and directed individual projects of various kinds.

All students in the program will take one core course: **ENG 550 The Practice of Writing**. All Writing Studies courses provide breadth of perspective on all of the general issues and circumstances faced by writers in the process of engaging an audience and making a living through the craft of language. All courses are designed to have writing as the center of concern, and many courses will emphasize writing for publication, from blogs to print.

Environmental Science Faculty Director

John Braverman, PhD

Environmental Science Advisory Board

Jonathan Fingerut, PhD

Steve Rossi, MFA

Diane Phillips, PhD

Usha Rao, PhD

Clint Springer, PhD

Programs Undergraduate Major

- Environmental Science (p. 122)

Undergraduate Minors

- Environmental Science (p. 124)
- Environmental and Sustainability Studies (p. 121)

Environmental And Sustainability Studies Minor

The environment is receiving significant attention in recent years in light of issues such as climate change, declining energy resources, and other sustainability related issues. A minor in Environmental and Sustainability Studies is meant to serve a broad student population and will provide students with an extensive understanding of environmental and sustainability issues. The minor will yield graduates who are truly "men and women for others" by preparing students for careers that will identify and study the causes and effects of current and future environmental challenges, educate others about the environment, and help write and analyze related policy.

Learning Goals and Outcomes

Goal 1: Students will develop an understanding of the importance of the environment, the extent to which societal actions impact it, the need for sustainability, and how that sustainability can be achieved.

Outcome 1.1: Students will be able to describe the basic environmental challenges facing the world today, their causes, and possible solutions.

Outcome 1.2: Students will be able to describe the scientific, ethical, and moral imperatives behind the need to protect and sustain a healthy environment and the role of environmental science and environmental scientists in those efforts.

Goal 2: Students will develop an understanding of the opportunities and challenges facing efforts to protect the environment and develop a sustainable society.

Outcome 2.1: Students will demonstrate an understanding of the linkages between environmental science and non-natural science disciplines such as business, economics, history, politics, sociology, philosophy, theology, and law.

Outcome 2.2: Students will be able to improve and apply their skills to real-world issues via engaged learning such as an internship with environmental professionals.

Requirements

Students must take six courses for the Minor in Environmental and Sustainability Studies. Courses taken to fulfill requirements of the minor may also fulfill the GEP or CCC requirements, as well as the student's major.

Code	Title	Hours
All students will take (preferably in this sequence):		
ENV 106 & 106L	Exploring the Earth and Exploring the Earth Laboratory	4
ENV 102	Environmental Ethics ¹	3
ENV 390	Environmental Science Seminar	0
Students are required to take four additional courses from the following four groups (Groups A-D). Courses do not need to be taken in any particular order, but some courses may require prerequisites. No more than two courses can be taken from each group.		12
Group A Understanding our planet		
BIO 165 & 165L	Exploring the Living World and Exp. Living World Lab	
GIS 101	Introduction to GIS	
PHY 112	Energy: Problems & Promises	
PHY 113	Physics by Experiment	
PHY 221 & 221L	Intro to Renewable Energy and Intro to Renewable Energy Lab	
Group B Societal responses past and present		
ART 146	Sculpture and the Environment	
ART 177	Photography & Climate Crisis	
ENG 314	Irish Environmental Writing	
ENG 426	Nature & Environmental Writing	
ENG 433	Environmental Justice	
ENG 434	Climate Change Stories	
ENV 471	Environmental Law	
HIS 386	American Environmental History	
PHL 295	Philosophy of the Environment	
Group C Economic Issues and solutions		
ECN 375	Environmental Economics	
GIS 175	Environmental Economics	
MGT 212	Organizational Sustainability	
SOC 316	Fair Trade Coffee: Study Tour	
Group D Experiential learning		
ENV 490	Environmental Sci Internship	
Total Hours		19

¹ ENV 102 may not be offered every year and fulfills the Ethics Intensive overlay.

Note: Students majoring in Biology, Chemistry, Chemical Biology, or Physics may minor in Environmental and Sustainability Studies. These students should fulfill at least three of their electives from groups B-D. The fourth can be chosen from Group A or B of the Environmental Science Major.

Environmental Science Major

The Environmental Science Program prepares students for careers in the ever-growing field of environmental science. The curriculum of the Environmental Science Program emphasizes a deep understanding of contemporary environmental and sustainability issues through an interdisciplinary approach. This approach reflects the interdisciplinary nature of the requirements for careers in environmental related fields in academia, industry, government, non-profit and service organizations. Students enrolled in the major will work through a course

of study that will develop a strong foundation in the natural sciences and mathematics while also exploring the complex interconnected nature of sustainability and environmental topics through courses focused on environmental topics in the humanities, social sciences, and business. Students have the opportunity to choose a course of study that focuses on what interests them most. Students also complete a semester-long experiential learning requirement that aims to give graduates an inside understanding of career paths for environmental science graduates. This course of study coupled with the General Education Curriculum at Saint Joseph's University creates a transformative Jesuit education that prepares graduates to be agents of change in their communities through both professional and personal action.

Learning Goals and Outcomes

Goal 1: Students will develop an interdisciplinary understanding of the importance of the environment, the extent to which societal actions impact it, the need for sustainability, and how sustainability can be achieved.

Outcome 1.1: Students will be able to describe the basic environmental challenges facing the world today, their causes, and possible solutions.

Outcome 1.2: Students will be able to describe the scientific, ethical, and moral imperatives behind the need to protect and sustain the environment.

Goal 2: Students will develop a strong foundation in the physical and natural sciences, including environmental science, biology, chemistry, and physics, as well as quantitative skills such as statistics and computation.

Outcome 2.1: Students will be able to explain basic concepts in biology, general chemistry, and physics.

Outcome 2.2: Students will be able to apply quantitative and computer skills such as statistics and Geographic Information Systems to answer research questions and implement solutions.

Goal 3: Students will develop the skills needed for a successful career in Environmental Science, including presentation skills, networking, and familiarity with career paths in the field.

Outcome 3.1: Students will be able to communicate scientific research through written and oral formats.

Outcome 3.2: Students will be able to improve and apply their skills to real-world issues in an internship with environmental professionals.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
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Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
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Religious Studies	3
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Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
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INT 151	Inequality in American Society	1
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Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
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Natural Science	4
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Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Major Requirements

Code	Title	Hours
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 201	Bio III: Organismic Biology	4
BIO 201L	Bio III: Organismic Biol Lab	0
BIO 429	Environmental Science	4
BIO 429L	Environmental Science Lab	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
ENV 102	Environmental Ethics	3
ENV 390	Environmental Science Seminar (each semester in major)	0
ENV 490	Environmental Sci Internship (junior or senior year)	3
MAT 128	Applied Statistics	3
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Select one of the following:		4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	
PHY 105 & 105L	University Physics I and University Physics Lab I	
Select one from each of the following groups:		
Group A: Biological Sciences		4
BIO 401	Animal Behavior	
BIO 405	Biomechanics	
BIO 409	Ecology	
BIO 413	Plant Physiological Ecology	
BIO 414	Plant Systematics	
BIO 416	Microbiology	
BIO 419	Invertebrate Zoology	
BIO 422	Applied & Environ Microbiology	
BIO 423	Evolution	
BIO 472	Aquatic Biology	
BIO 472L	Aquatic Biology Lab	
Group B: Physical Science		3
ENV 302	Environmental Geology	
ENV 440	Environmental Toxicology	
CHM 420	Atmospheric Environmental Chem	
CHM 460	Water Chemistry	
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	
PHY 102 & 102L	General Physics II and General Physics Laboratory II	

PHY 106 & 106L	University Physics II and University Physics Lab II	
Group C: Environmental Studies		3
ART 146	Sculpture and the Environment	
ART 177	Photography & Climate Crisis	
BIO 360	God and Evolution	
ECN 375	Environmental Economics	
SPA 322	Environ Challenges LatAmerica	
ENG 314	Irish Environmental Writing	
ENG 426	Nature & Environmental Writing	
ENG 433	Environmental Justice	
ENG 434	Climate Change Stories	
ENV 471	Environmental Law	
GIS 101	Introduction to GIS	
GIS 175	Environmental Economics	
GIS 201	Intermediate GIS	
HIS 386	American Environmental History	
MGT 212	Organizational Sustainability	
PHL 295	Philosophy of the Environment	
SOC 316	Fair Trade Coffee: Study Tour	
THE 339	Darwin, Dogma, and Ecology	
Select four additional upper-level environmental science electives.		12
Total Hours		66-67

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
Freshman		
Fall		
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
MAT 155 or MAT 161 or MAT 120	Fundamentals of Calculus or Calculus I or Precalculus	3
Non-Native Language		3
ENG 101	Craft of Language	3
World History		3
ENV 390	Environmental Science Seminar	0
Hours		16
Spring		
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
MAT 128	Applied Statistics	3
Theology		3
Philosophy Level One		3
INT 151	Inequality in American Society	1
ENV 390	Environmental Science Seminar	0
Hours		14
Sophomore		
Fall		
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4

Social Science		3
Major Elective C / Writing intensive Overlay		3
Philosophy Level Two		3
ENV 390	Environmental Science Seminar	0
Hours		17
Spring		
BIO 429 & 429L	Environmental Science and Environmental Science Lab	4
ENV 102	Environmental Ethics	3
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
Free Elective		3
Diversity		3
ENV 390	Environmental Science Seminar	0
Hours		17
Junior		
Fall		
Major Elective		3-4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
Group C Major Elective		3
Literature		3
Free Elective		3
ENV 390	Environmental Science Seminar	0
Hours		16-17
Spring		
Group B Major Elective		3-4
Major Elective		3
Religious Studies		3
Free Elective		3
Fine & Performing Arts, Design & Creativity		3
ENV 390	Environmental Science Seminar	0
Hours		15-16
Senior		
Fall		
Free Elective		3
Overlay		3
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
Major Elective		3
ENV 490	Environmental Sci Internship	3
ENV 390	Environmental Science Seminar	0
Hours		16
Spring		
Free Elective	minimum credits here or elsewhere up to 120 total, with minimum 12 credits this semester	12
ENV 390	Environmental Science Seminar	0
Hours		12
Total Hours		123-125

Environmental Science Minor Learning Goals and Outcomes

Goal 1: Students will develop an interdisciplinary understanding of the importance of the environment, the extent to which societal actions impact it, the need for sustainability, and how sustainability can be achieved.

Outcome 1.1: Students will be able to describe the basic environmental challenges facing the world today, their causes, and possible solutions.

Outcome 1.2: Students will be able to describe the scientific, ethical, and moral imperatives behind the need to protect and sustain the environment.

Goal 2: Students will develop a strong foundation in the physical and natural sciences, including environmental science, biology, chemistry, and physics, as well as quantitative skills such as statistics and computation.

Outcome 2.1: Students will be able to explain basic concepts in biology, general chemistry, and physics.

Outcome 2.2: Students will be able to apply quantitative and computer skills such as statistics and Geographic Information Systems to answer research questions and implement solutions.

Goal 3: Students will develop the skills needed for a successful career in Environmental Science, including presentation skills, networking, and familiarity with career paths in the field.

Outcome 3.1: Students will be able to communicate scientific research through written and oral formats.

Outcome 3.2: Students will be able to improve and apply their skills to real-world issues in an internship with environmental professionals.

Requirements

The minor in environmental science requires completion of the following (along with their respective laboratory sections) and three additional courses representing at least two of the course groups (A, B and C).

Code	Title	Hours
BIO 101 & 101L or BIO 151L	Bio I: Cells and Bio I: Cells Lab Phage Lab	4
BIO 102 & 102L or BIO 150L	Bio II: Genetics and Bio II: Genetics Lab Bio I: Cells Lab Phage	4
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab	4
ENV 106 & 106L or BIO 429 & 429L	Exploring the Earth and Exploring the Earth Laboratory Environmental Science and Environmental Science Lab	4
ENV 102	Environmental Ethics	3
ENV 490	Environmental Sci Internship	3
ENV 390	Environmental Science Seminar (2 semesters)	0
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4

Three additional courses representing at least two of the following course groups (A, B and C) 9

Group A: Biological Sciences

BIO 401 & 401L	Animal Behavior and Animal Behavior Lab
BIO 405 & 405L	Biomechanics and Biomechanics Lab

BIO 409 & 409L	Ecology and Ecology Lab
BIO 413 & 413L	Plant Physiological Ecology and Plant Physiological Eco Lab
BIO 414 & 414L	Plant Systematics and Plant Systematics Lab
BIO 416 & BIO 417L	Microbiology and Systemic Physiology Lab
BIO 419 & 419L	Invertebrate Zoology and Invertebrate Zoology Lab
BIO 422 & 422L	Applied & Environ Microbiology and Applied & Environ Micro Lab
BIO 423 & 423L	Evolution and Evolution Lab
BIO 472 & 472L	Aquatic Biology and Aquatic Biology Lab

Group B: Physical Science

ENV 302	Environmental Geology
ENV 440	Environmental Toxicology
CHM 420	Atmospheric Environmental Chem
CHM 460	Water Chemistry
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II

Select one of the following:

PHY 102 & 102L	General Physics II and General Physics Laboratory II
PHY 106 & 106L	University Physics II and University Physics Lab II

Group C: Environmental Studies

ENV 471	Environmental Law
ECN 375	Environmental Economics
ENG 314	Irish Environmental Writing
ENG 426	Nature & Environmental Writing
ENG 433	Environmental Justice
ENG 434	Climate Change Stories
GIS 101	Introduction to GIS
GIS 201	Intermediate GIS
GIS 175	Environmental Economics
SPA 322	Environ Challenges LatAmerica
HIS 386	American Environmental History
MGT 212	Organizational Sustainability
SOC 316	Fair Trade Coffee: Study Tour
ART 146	Sculpture and the Environment
ART 177	Photography & Climate Crisis
THE 339	Darwin, Dogma, and Ecology
PHL 295	Philosophy of the Environment
BIO 360	God and Evolution

Total Hours

43

Gender Studies Minor

Gender Studies is an interdisciplinary field that investigates the social construction of gender in societies, politics, economies, the arts, and cultures in the United States and around the world. At Saint Joseph's, it is a multi-disciplinary minor that allows students from a variety of majors

to investigate the ways in which gender intersects with race, ethnicity, class, sexuality, nationality, ability, age, and other identity factors to produce system-wide structures and individual-level psychologies. Gender, therefore, creates opportunities and constraints for individuals based on their particular identities within specific temporal, sociopolitical settings.

Gender Studies minors select approved courses from a variety of disciplines in the fine arts, humanities, education, health studies, social sciences, and business. These courses complement their major fields of study and give students a useful lens for understanding and interacting with their school, family, social, and professional environments, places where equality and justice claims are increasingly important.

Mission Statement

The Gender Studies Program gives students a grounding in gender, feminist, and intersectional theories. While learning about gender as a concept and using methods such as intersectional analysis, students explore how gender interacts with other aspects of identity. As minors, students study these theoretical constructs and learn how they function as systematic and structural processes at the individual, societal/ cultural, and/or institutional levels. Gender Studies minors will also have the opportunity to develop their own project(s) in various disciplines that are grounded in gender, feminist, and/or intersectional analysis.

Faculty Co-Directors

- L. Baglione (POL) and E. Morgan (MTF)

Committee on Gender Studies

- Albright
- Burkhalter
- Hall
- Hoffman
- Joyce
- Logue
- Regis
- Scola
- Sillup
- Wetzel

Learning Goals and Outcomes

Goal 1: Learn Fundamental Knowledge: Students will gain foundational knowledge of gender, feminism, and/or intersectionality as core concepts and theoretical constructs.

Outcome 1.1: Students will **identify, define, and/or explain** the core concepts and theories related to gender, feminism, and intersectionality, as appropriate to the discipline.

Goal 2: Think and Make Analytical Arguments: Students will think critically and develop arguments that address how gender, feminism, and intersectionality function as systematic and structural processes at the individual, societal/cultural, and/or institutional levels.

Outcome 2.1: Students will **articulate verbally and/or in writing arguments** that **analyze** how gender, feminism, and/or intersectionality function as systematic and structural processes

at the individual, societal/cultural, and/or institutional levels, as appropriate to the discipline.

Goal 3: Apply Skills to Analyze and Assess: Students will apply their knowledge of gender, feminism, and intersectionality by developing a project, broadly defined, that analyzes and/or assesses real world phenomena and/or creative works through the lens of the core theoretical constructs.

Outcome 3.1: Students will **write, create, and/or present** a project that **analyzes and/or assesses** the application of gender, feminism, and intersectionality to real world phenomena and/or creative works, as appropriate to the discipline.

Requirements

Gender Studies minors **complete six (6) courses from the list** of approved classes. Their set of six courses must simultaneously satisfy **two additional** criteria:

- 1. No more than **three (3) courses** can be from the same discipline (with the same three-letter course code)
- 2. At least **one (1) course** must come from the designated “Theories Courses” list

These conditions help assure that students have a sufficiently multidisciplinary and theoretically sophisticated understanding of Gender Studies when they complete the minor.

Code	Title	Hours
Choose 6 Courses:		18
Theories Courses: ¹		
POL 323	Women and American Politics	
POL 325	Intersectionality	
POL 368	Sex & Power around the World	
SOC 208	Sociology of Gender	
THE 357	Feminist Theologies	
Other Gender Studies Courses: ²		
ARH 107	Women, Gender, and Art	
ENG 226	Brit/Irish Detective Fiction	
ENG 309	British/Irish Immigration Lit	
ENG 312	Modern Irish Drama	
ENG 313	Cont Irish Women's Writing	
ENG 444	Race, Class, and Gender	
ENG 450	Health, Advocacy, Storytelling	
FRE 322	Mkg Vces Hrd: FrWomWri MA &Ren	
FRE 422	Mkg Vces Hrd: FrWomWri MA &Ren	
HIS 385	Women in America	
PHL 294	Reproducing Persons	
POL 113	Intro to Comparative Politics	Baglione Section ONLY
POL 309	Advising and Advocacy	
PSY 212	Multicultural Psychology	Shih Section ONLY
REL 382	Women & Religion in Anc Wrld	
SOC 102	Social Problems	Begen Section ONLY
SOC 202	Advanced Social Problems	Begen Section ONLY
SOC 209	Intimate Relations	
SOC 215	Gender, Race, and Justice	

SOC 356	Gender, Crime & CJ
SOC 470	Special Topics <small>Begen Section ONLY</small>
Total Hours	
18	

¹ Courses that qualify as Theories classes are those that are particularly heavy in gender, feminist, and/or intersectional theories. Students will read foundational theoretical texts themselves (rather than only reading texts which apply those theories as critical frameworks in the study of other topics) and engage rigorously with concepts that are at the root of gender, feminist, and/or intersectional studies.

- ²
- Gender, feminism, and/or intersectionality are woven through the fabric of the class and at the center of analysis. These theories and concepts must permeate the entire course and cannot simply be a single unit in the class. Theoretical frameworks and concepts that provide sustained analytical inquiry are expected, and course content, materials, and assignments must be critical and analytical in nature.
 - The courses analyze the construction and maintenance of gender as systematic and structural processes at the individual, societal/cultural, and/or institutional levels, as appropriate to the discipline.
 - The courses emphasize the ways in which identities intersect, overlap, and interact to produce multiple experiences of gender, and then attend to the complex consequences of these intersections.
 - The courses encourage students to see themselves as potential social justice advocates and agents for social change.

Geographical Information Systems Undergraduate Certificate

The program in Geographical Information Systems is a four course (12 credit) interdisciplinary program that leads to an undergraduate certificate in geographical information systems and spatial literacy. It can be completed by students in conjunction with any major across the university.

Learning Goals and Outcomes

Goal 1: Develop critical interdisciplinary spatial literacy

Goal 2: Acquire proficiency in geospatial technologies and methods in order to discover, retrieve, interpret, analyze, visualize, and store spatial data

Goal 3: Understand and adopt the ethical principles and collaborative spirit of the academic GIS community

Goal 4: Understand the relationship between geography, culture, and justice and how they relate to real world issues

Requirements

Code	Title	Hours
GIS 101	Introduction to GIS	3
GIS 201	Intermediate GIS	3
Choose 2 courses:		6
GIS 170	Special Topics in GIS	
GIS 270	Special Topics in GIS	

GIS 370	Special Topics in GIS
Total Hours	
12	

Health Care Ethics Minor

The interdisciplinary minor in Health Care Ethics seeks to encourage learning and thinking from an interdisciplinary perspective and to foster a critical analysis of bioethical topics through the interplay between moral theory and medical practice. More and more people are beginning to realize the inherent importance of ethics in the clinical setting. Health care professionals are confronted with numerous complex ethical dilemmas that they may not be well prepared to handle. Therefore, it is imperative that they or those preparing to work in the field of health care be trained to understand the principles of ethics and how they can be utilized in clinical decision-making.

The minor program is open to all majors in the university. Students have the option to pursue either the Basic Track or the Global Track. Both tracks are designed to expose students to the complex and growing field of biomedical ethics.

The Basic Track comprises one required course (THE 366: Christian Medical Ethics), Five electives and an exit interview. The Global Track is more rigorous. It requires the student to either take the Just Health Care in Developing Nations course (THE 368), that requires a study abroad for 2 weeks, or design a research project as part of an Independent Study that has been approved by a faculty member associated with the Minor program and the Institute of Clinical Bioethics. The idea is to encourage the student to explore many complex ethical dilemmas on the global scale, especially as they pertain to underdeveloped countries. Among the many issues to be considered are: the devastating impact of HIV/AIDS on Sub Saharan Africa, the ethics of human research in the developing world and the moral responsibility of developed countries to the health care needs of developing countries.

In addition to the course work, minors are encouraged to attend the events sponsored by the Institute of Clinical Bioethics especially the annual McCormick lecture.

Faculty

Director

- Aloysius Ochasi

Advisory Board

- Allan (MKT)
- Angiolillo (PHY)
- Brennan (ENG)
- Balotsky (MGT)
- Croce (University Press)
- Jursca-Keffer (FJI)
- Kuykendall (IHS)
- O'Sullivan (THE)
- Sillup (PMK)
- Sullivan (IHS)
- Warren (HIS)
- Zurbach (CHM)

Learning Goals and Outcomes

Goal 1: Students will gain an appreciation of philosophical and theological ethics both within the curriculum and through extracurricular activities.

Outcome 1.1: Students will demonstrate the ability to discuss and argue positions on a wide range of ethical issues related to health care.

Goal 2: Students will gain insight into the clinical side of health care as well as the pharmaceutical industry, the health care insurance industry, health care administration and education and medical research.

Outcome 2.1: Students will apply ethical theories and principles to the resolution of “real life” ethical dilemmas.

Goal 3: Students will possess the skills to analyze topics in health care from an ethical perspective.

Outcome 3.1: Students will articulate ethical positions from the perspective of varied disciplines (Theology, Philosophy, Law, Business, Sociology, Public Health etc.).

Outcome 3.2: Students will craft an ethical analysis of a designated bioethics topic and propose policy solutions or program development initiative. In addition, students will:

- Develop a basic understanding of moral philosophy and theology.
- Understand the basic ethical principles – beneficence, non-maleficence, autonomy and justice.
- Learn how to apply risk vs. benefit analysis to concrete ethical situations.
- Develop basic proficiency in the analysis of case studies in bioethics.
- Understand the distinction and interrelationship between ethics and law.
- Appreciate how advances in technology pose complex ethical questions for society.
- Identify a wide range of ethical challenges facing the medical, pharmaceutical and insurance industries.
- Understand the importance of bioethics for those who aspire to be health professionals.
- Attend and participate in events sponsored by the Institute of Catholic Bioethics, such as lectures, panels, service experiences, etc.
- Integrate ethical principles in the analysis of a topic in bioethics.

Requirements

Students seeking the Interdisciplinary Health Care Ethics Minor are required to complete six courses from at least three departments; no more than three courses from any one department may count for credit toward the minor. The prerequisite course is PHL 154: Moral Foundations.

Basic Track

Six courses are required for this track. Students are expected to complete:

Code	Title	Hours
Select five electives courses (listed below)		15
THE 366	Christian Medical Ethics	3
An exit interview		
Total Hours		18

Global Track

Six courses are required for this track. Students are expected to complete:

Code	Title	Hours
THE 366	Christian Medical Ethics	3
An exit interview		
Select five elective courses (listed below):		15
HCE 400	Fieldwork: Clinical Bioethics	
ECN 390	The Economics of Healthcare	
ENG 377	Inside-Out	
ENG 450	Health, Advocacy, Storytelling	
PHL 250	Philosophy of Death	
PHL 264	Topics in Moral Psychology	
PHL 286	Philosophy of Mental Illness	
PHL 377	Inside-Out	
SOC 216	Alcohol, Drugs & Society	
SOC 217	Mental Health & Society	
SOC 323	Health and Society	
THE 261	Christianity & Media	
THE 349	Theology of Disability	
THE 368	Just Hlth Care in Dev Nations	
HSC 211	Health Care Systems	
HSC 216	Alcohol, Drugs and Society	
HSC 217	Ethics & Equity Mental Health	
HSC 251	Healthcare Law and Ethics	
HSC 253	Nutrition: Health & Disease	
HSC 256	HIV/AIDS	
HSC 285	Med Terminology & Health Comm	
HSC 323	Social Determinants of Health	
HSC 345	DyingWell:The Hospice Movement	
Total Hours		18

History

History is the study of the human past as it is constructed and interpreted with human artifacts, written evidence, and oral traditions. It requires empathy for historical actors, respect for interpretive debate, and the skillful use of an evolving set of practices and tools.

As an inquiry into human experience, history demands that we consider the diversity of human experience across time and place.

As a public pursuit, history requires effective communication to make the past accessible; it informs and preserves collective memory; it is essential to active citizenship.

As a discipline, history requires a deliberative stance towards the past; the sophisticated use of information, evidence, and argumentation; and the ability to identify and explain continuity and change over time. Its

professional ethics and standards demand peer review, citation, and acceptance of the provisional nature of knowledge.

The Department's advanced courses continue to emphasize the investigation of the ideas and institutions—religious, political, social, and economic—through which people have endeavored to order their world. Advanced courses, with their more precise focus on place, time, and method, allow students to gain a deeper understanding of the field and its practices. The Department also offers internships and independent research opportunities to enhance students' preparation for the future.

Faculty

The faculty in Saint Joseph's University's history department regularly carry out extensive historical research around the world. They are devoted to sharing their historical insight and knowledge with students and are dedicated to preparing them for successful careers as historians, lawyers, educators, writers and more.

Department of History Faculty & Staff (<https://www.sju.edu/departments/history/faculty-staff/>)

Programs

Undergraduate Major

- History (p. 129)

Undergraduate Minor

- History (p. 131)

History Major

Learning Goals and Outcomes

Goal 1: Students gain a body of knowledge, with chronological and geographic breadth and depth, and the tools and habits to grow in understanding the diversity of the human experience.

Outcome 1: Students will identify, define, explain, compare, and contextualize historical phenomena from different times, places, and experiences.

Goal 2: Students interpret cases, issues, and trends, developing a range of skills to elucidate the incomplete, complex, and provisional nature of the pursuit of human understanding.

Outcome 2: Students will analyze and assess verbally or in writing competing explanations about historical phenomena and diverse human experiences.

Goal 3: Students create and communicate their own research findings, developing professional skills and ethical standards.

Outcome 3: Students will identify and access primary and secondary sources and use them to generate and defend interpretations of historical phenomena based on the professional and ethical standards of the discipline of History.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Code	Title	Hours
Required Courses:		
HIS 201	U.S. History to 1877	3
HIS 202	U.S. History since 1865	3
Ten approved History courses, HIS 203 or higher:		30
Upper-division course in U.S. History		
HIS 360	Colonial America	
HIS 361	America in Age of Revolutions	
HIS 362	The American Civil War	
HIS 363	American Medicine Since 1865	
HIS 366	Reform and Reaction in the US	
HIS 379	Black History Since Civil War	
HIS 381	US in the World since WWI	
HIS 382	American Foreign Policy	
HIS 383	Food in American History	
HIS 385	Women in America	
HIS 386	American Environmental History	
HIS 387	Popular Culture in the US	
HIS 391	American Military History	
HIS 392	Museums, Monuments, and Media	
HIS 483	Readings in American Hist	
Upper-division course in non-U.S. or non-European History		
HIS 203	Historical Intro to Latin Am	
HIS 204	Latin American-U.S. Migration	
HIS 208	Historical Intro to Asian Civs	
HIS 210	History of Modern Africa	
HIS 301	Latin America and the U.S.	
HIS 303	History of Modern Mexico	
HIS 324	Vietnam War in Film & History	
HIS 337	War & Peace in Imperial Russia	
HIS 338	Russia & USSR, 1881-1991	
HIS 339	The Mongol Empire	
HIS 340	Stalinism in the USSR	
HIS 341	Genocide & Human Rights	
HIS 343	African Ethnicities	
HIS 346	Religion & Philosophy: Africa	
HIS 350	Exchnng & Conq in Mod E. Asia	
HIS 351	Gndr, Ideolgy & Rev in E. Asia	
HIS 352	Late Imperial China	
HIS 353	Modern China	
HIS 354	Japan Since 1600	
HIS 356	Modern South Asia	
HIS 357	History of Islam in Asia	
HIS 358	Contemporary China	
HIS 359	India & Pak: Colony to Nation	

HIS 370	Special Topics in History
HIS 480	Readings in Latin Amer Hist
HIS 481	Readings in Asian Hist
HIS 482	Readings in European Hist
HIS 484	Readings in African History
Upper-division course in European History	
HIS 209	AP European History Credit
HIS 270	Special Topics in History
HIS 306	Sports & Spectacle Greece/Rome
HIS 307	Ancient Greece & Rome Cinema
HIS 308	Race & Ethnicity Greece/Rome
HIS 315	The Glory that was Greece
HIS 316	The Grandeur that Was Rome
HIS 319	Reform/Rev in Europe 1500-1650
HIS 327	Early Modern Europe 1400-1800
HIS 329	Crime & Punishment in Europe
HIS 348	Witches in Early Modern Europe
HIS 470	Special Topics in History
Seminar	
HIS 471	Seminar in American History
HIS 472	Seminar in European History
HIS 473	Seminar in Eurasian History
HIS 474	Seminar in Latin Am His
HIS 476	Seminar in Asian History
HIS 477	Seminar in African History
HIS 478	Seminar Global Comparative His
Experiential Learning	
HIS 491	Philadelphia Area Internship
HIS 493	Honors Research & Ind Study I
HIS 494	Honors Research & Ind Study II

Total Hours 36

Free Electives

Ten courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Internships

Qualified history majors are eligible to participate in a variety of internships for academic credit with historical, cultural, educational, governmental, and other organizations. See course descriptions for more information.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
World History		3
ENG 101	Craft of Language	3
Mathematics		3-4
Non-Native Language		3
Philosophy Level One		3
Hours		15-16

Spring		
INT 151	Inequality in American Society	1
Religious Studies		3
History upper division		3
Philosophy Level Two		6
Free Electives		6
Hours		19
Sophomore		
Fall		
HIS 201	U.S. History to 1877	3
Literature		3
Theology		3
History upper division		3
Free Elective		3
Hours		15
Spring		
HIS 202	U.S. History since 1865	3
Natural Science		3-4
History upper division		3
Social Science		3
Free Elective		3
Hours		15-16
Junior		
Fall		
Fine & Performing Arts, Diversity, & Creativity		3
History upper division		3
History seminar (400 level; WI)		3
Free Electives		6
Hours		15
Spring		
History upper division		6
Diversity		3
Free Electives		6
Hours		15
Senior		
Fall		
History Seminar (400-level)		3
History upper division		3
Free Electives		9
Hours		15
Spring		
History upper division		3
Free Electives		12
Hours		15
Total Hours		124-126

History/Secondary Education

Students majoring in History who are interested in teaching grades 7-12 can dual major in History/Secondary Education (7-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their History advisor, History/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year.

Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 (<https://academiccatalog.sju.edu/search/?P=EDU%20491>) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i).

See the History major for specific requirements. (p. 129)

See the Secondary Education (7-12) major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

History Minor

Learning Goals and Outcomes

Based on the American Historical Association's Tuning Project

Goal 1: Build historical knowledge.

Outcome 1.1: Gather and contextualize information in order to convey both the particularity of past lives and the scale of human experience.

Outcome 1.2: Develop a body of historical knowledge with breadth of time and place—as well as depth of detail—in order to discern context.

Goal 2: Develop historical methods.

Outcome 2.1: Collect, sift, organize, question, synthesize, and interpret complex material.

Outcome 2.2: Practice ethical historical inquiry that makes use of and acknowledges sources from the past as well as the scholars who have interpreted that past.

Goal 3: Recognize the provisional nature of knowledge, the disciplinary preference for complexity, and the comfort with ambiguity that history requires.

Outcome 3.1: Describe past events from multiple perspectives.

Outcome 3.2: Identify, summarize, appraise, and synthesize other scholars' historical arguments.

Goal 4: Apply historical methods to the historical record because of its incomplete, complex, and contradictory nature.

Outcome 4.1: Consider a variety of historical sources for credibility, position, perspective, and relevance.

Outcome 4.2: Evaluate historical arguments, explaining how they were constructed and might be improved.

Goal 5: Create historical arguments and narratives.

Outcome 5.1: Generate substantive, open-ended questions about the past and develop research strategies to answer them.

Outcome 5.2: Craft well-supported historical narratives, arguments, and reports of research findings in a variety of media for a variety of audiences.

Goal 6: Use historical perspective as central to active citizenship.

Outcome 6.1: Apply historical knowledge and historical thinking to contemporary issues.

Outcome 6.2: Develop positions that reflect deliberation, cooperation, and diverse perspectives.

Requirements

Code	Title	Hours
HIS 154	Forging the Modern World	3
Five (5) History courses HIS 201 or higher		15
Total Hours		18

International Relations

Faculty Director

Dr. Richard Gioioso (Political Science)

Programs

Undergraduate Major

- International Relations (p. 132)

Undergraduate Minor

- International Relations (p. 134)

International Relations Major

International Relations is a degree program that offers the student a truly cross-disciplinary course of study. The major concentration emphasizes modern history, economics, and political science. The IR faculty encourages its majors to enhance the cross-disciplinary nature of their studies by completing a minor concentration in modern language, economics, history, political science, business, or one of the interdisciplinary and area studies programs that the University offers (Asian Studies, Latin American Studies, Gender Studies, American Studies); by studying abroad; and/or by participating in the Washington and Philadelphia Internship Programs.

Students majoring in International Relations acquire valuable skills in communication and analysis, independent judgment, appreciation of different societies and cultures, and knowledge of world affairs and trends, all of which are critical in the increasingly global environment of today and tomorrow.

International Relations is a major rooted in the Jesuit tradition of liberal arts, especially suited to those whose orientation may be toward graduate or legal studies, government service, international business, communications, and education.

Learning Goals and Outcomes

Goal 1: Key Concepts/Theories: Students will understand core concepts and/or theories within international relations.

Outcome 1: Students will identify, define, and/or explain the content, core concepts, and theories that guide international relations from an integrated, interdisciplinary perspective.

Goal 2: Write/Argue: Students will develop arguments based on evidence.

Outcome 2: Students will articulate verbally and/or in writing an argument which defines, explains, and/or analyzes the content, process, and/or outcomes relevant to international relations.

Goal 3: Analyze: Students will evaluate arguments using empirical evidence.

Outcome 3: Students will apply a variety of tools, methods, or perspectives to critically analyze and/or evaluate issues relevant to international relations.

Goal 4: World outside the classroom: Students will participate in experiential learning related to international relations.

Outcome 4: Students will demonstrate career preparation through experiential learning opportunities that are closely related to international relations or a related field through the development of interpersonal, analytical, and/or problem-solving skills.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
POL 115	Intro to Global Politics (will count for CCC: Social Science)	3
Statistics (will count for CCC: Mathematics)		3-4
MAT 118	Introduction to Statistics	
MAT 148	Applied Statistics Plus	
Foundational Courses: Three Additional Courses		
ECN 101	Introductory Economics Micro	3
ECN 102	Introductory Economics Macro	3
POL 113	Intro to Comparative Politics	3
A Second Non-Native Language Course		3-4
Professional Development Requirement		
POL 190	Strategies for Success ⁵	1
POL 290	Career Prep Seminar ⁴	1
Capstone Course (1 course):		3
Capstone Course from: POL 403, POL 404, or POL 409. ¹		
IR majors who double-major in POL must complete a second Senior Capstone Course to fulfill the POL major requirements. In addition, Capstone Courses do not count towards the Upper Division Course requirements for either major.		
Experiential Learning (1 course):		3
POL Internship Course (INT 191, INT 192, INT 193, POL 411, POL 412, POL 413, POL 414, POL 490, ANS 490)		
OR any Service Learning course (with SLR attribute)		

OR completion of three Minternship courses (1 credit each) POL 390, POL 391, or POL 392

Upper Division Courses (9 courses): ^{2, 3} **27**

Majors will select a total of 9 courses from the list of approved IR courses (see below). In completing this requirement, students must take (1) at least one upper division IR course in Economics, (2) at least two upper division IR courses in History, and (3) at least two upper division IR courses in Political Science. Course descriptions can be found in the relative Departmental listings of the catalog.

Economics	
ECN 321	International Trade
ECN 322	International Macroeconomics
ECN 375	Environmental Economics
ECN 475	Asian Economies
ECN 476	Women & Econ Dev in South Asia
ECN 477	Chinese Economics

History	
HIS 203	Historical Intro to Latin Am
HIS 204	Latin American-U.S. Migration
HIS 208	Historical Intro to Asian Civs
HIS 210	History of Modern Africa
HIS 301	Latin America and the U.S.
HIS 303	History of Modern Mexico
HIS 337	War & Peace in Imperial Russia
HIS 338	Russia & USSR, 1881-1991
HIS 340	Stalinism in the USSR
HIS 343	African Ethnicities
HIS 350	Exchng & Conq in Mod E. Asia
HIS 351	Gndr, Ideolgy & Rev in E. Asia
HIS 353	Modern China
HIS 354	Japan Since 1600
HIS 356	Modern South Asia
HIS 357	History of Islam in Asia
HIS 358	Contemporary China
HIS 359	India & Pak: Colony to Nation
HIS 366	Reform and Reaction in the US
HIS 381	US in the World since WWI

Political Science	
POL 305	Politics, Ideology, & Film
POL 331	Latin American Politics
POL 333	Asian Democ at the Crossroads
POL 334	Understanding Putin's Russia
POL 336	The EU and European Politics
POL 337	Contemp Cuban Pol & Society
POL 339	Asian Dictators
POL 340	Political Geography
POL 350	Haunted by the Past
POL 352	Global Political Economy
POL 356	American Foreign Policy
POL 364	IR of East Asia: War and Peace
POL 367	Ethics in International Affairs

POL 368	Sex & Power around the World
Total Hours	
53-55	

- ¹ The Department strongly recommends that all students take the appropriate introductory and upper division courses prior to enrolling in a Capstone.
- ² IR majors who double-major in POL may not count more than 3 Upper Division courses towards either degree requirement.
- ³ IR majors may only count 2 study abroad courses towards their degree requirements.
- ⁴ P/NP requirement for all classes 2024 and beyond
- ⁵ P/NP requirement for all classes 2026 and beyond.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Internships

The Washington Internship is described under Special Programs and allows students to work in Washington for a whole semester and earn course credits. The Global Smarts Internship is described under the Political Science Program (as POL 490). The Philadelphia-Area Internship Program is described under the Political Science Program (as POL 491) and History Program (as HIS 491). IR students can take both HIS 491 and POL 491. However, only one of the two courses will be counted towards the IR course requirements.

University Honors Requirements

To receive University Honors credit, an Honors Program student who is a International Relations major must have a 3.5 GPA; complete the Honors curriculum of 8 specified courses; and must undertake two consecutive semesters of research/study in the form of a senior thesis with a faculty mentor, OR engage in honors-level work in two IR courses/capstone during their senior year. These two courses may be counted toward the student's total upper division IR courses/capstone, and one semester of the thesis can replace the Capstone Course requirement. Specific requirements for the Honors thesis may be found under the Honors Program.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
POL 115 or POL 113	Intro to Global Politics or Intro to Comparative Politics	3
World History		3
Philosophy Level One or Theology		3
Non-Native Language		3
ECN 101	Introductory Economics Micro	3
INT 151	Inequality in American Society	1
POL 190	Strategies for Success	1
Hours		17
Spring		
POL 113 or POL 115	Intro to Comparative Politics or Intro to Global Politics	3
Philosophy Level One or Theology		3
ENG 101	Craft of Language	3

Second Non-Native Language (Mission Overlay)		3-4
Free Elective		3
Hours		15-16
Sophomore		
Fall		
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
IR Major Elective #1		3
MAT 118 or MAT 148	Introduction to Statistics (or Complementary Analytical Skills) or Applied Statistics Plus	3
PHL Level Two or Religious Studies		3
Free Elective		3
POL 290	Career Prep Seminar	1
Hours		16
Spring		
Major Elective		3
Major Elective		3
Complementary Analytical Skills or MAT 118 or 148		
Philosophy Level Two or Religious Studies		3
Free Elective		3
Hours		12
Junior		
Fall		
Major Electives		6
Natural Science or Free Elective		3-4
Experiential Learning or Free Elective		3
Diversity or Free Elective		3
Hours		15-16
Spring		
Major Electives		6
Natural Science or Free Elective		3-4
Experiential Learning or Free Elective		3
Diversity or Free Elective		3
Hours		15-16
Senior		
Fall		
IR Capstone (WI Overlay) or IR Major Elective		3
Major Elective		3
Fine & Performing Arts, Design & Creativity or Literature		3
Free Electives		6
Hours		15
Spring		
Fine & Performing Arts, Design & Creativity or Literature		3
Free Electives		6-9
Hours		9-12
Total Hours		114-120

International Relations Minor Learning Goals and Outcomes

- Goal 1:** Key Concepts/Theories: Students will understand core concepts and/or theories in the discipline.

Outcome 1: Students will identify, define, and/or explain the content, core concepts, and theories in the discipline.
- Goal 2:** Write/Argue: Students will develop arguments based on theory and/or evidence.

Outcome 2: Students will articulate verbally and/or in writing an argument which defines, explains, and/or analyzes the content, process, and/or outcomes relevant to the discipline.

Goal 3: Analyze: Students will evaluate arguments using theoretical principles or empirical evidence.

Outcome 3: Students will apply a variety of tools, methods, or perspectives to critically analyze and/or evaluate issues relevant to the discipline.

Goal 4: World outside the classroom: Students will participate in experiential learning related to the discipline.

Outcome 4: Students will demonstrate career preparation through experiential learning opportunities that are closely related to international relations or a related field through the development of interpersonal, analytical, and/or problem-solving skills.

Requirements

Code	Title	Hours
POL 115	Intro to Global Politics	3
Select one of the following:		3
ECN 101	Introductory Economics Micro	
ECN 102	Introductory Economics Macro	
POL 113	Intro to Comparative Politics	
Any HIS 200-level course (except HIS 201, 209, 211)		
Plus four upper division International Relations courses. ¹		12
Total Hours		18

¹ In completing these four upper division courses, students must take at least one approved in each of the contributing departments: one ECN, one HIS, and one POL course.

Irish Studies Minor

With its interdisciplinary focus on Irish literature, culture and politics as well as the problematics of immigration, migration and diaspora, Saint Joseph's University's Irish Studies program is an exceptional platform from which to investigate issues of diversity, globalization and social justice.

After registering with the program coordinator, students earn the Irish Studies minor by completing any six approved courses. Irish and Ireland-related courses taken while studying abroad may also count towards the minor, upon approval by the program coordinator.

Learning Goals Outcomes

Goal 1: Understand Ireland's complex present and past through multiple disciplinary perspectives.

Goal 2: Demonstrate understanding of Irish culture and its contexts.

Goal 3: Employ primary and secondary sources (including digital resources) appropriate for the study of Ireland.

Requirements

Code	Title	Hours
Choose six of the following:		18
ENG 223	Global Irish Lit	
ENG 224	Intro to Irish Literature	
ENG 225	Ireland in Lit and Film	
ENG 226	Brit/Irish Detective Fiction	
ENG 308	Global Literary Marketplace	
ENG 309	British/Irish Immigration Lit	
ENG 311	21st Century Irish Literature	
ENG 312	Modern Irish Drama	
ENG 313	Cont Irish Women's Writing	
ENG 314	Irish Environmental Writing	
ENG 409	Art Ethics Irish Troubles Lit	
ENG 410	Irish Gothic Fiction	
ENG 451	N. Ireland Conflict & Story	
GAE 101	Beginning Irish (Gaelic) I	
GAE 102	Beginning Irish (Gaelic) II	
ARH 202	Medvl Art Ctcombs to Cthdrals	
HON 221	Rebels&Revolutionaries:Art&Lit	
MTF 156	Intro to World Music	
POL 328	U.S. Immigration	
POL 336	The EU and European Politics	
POL 340	Political Geography	
POL 409	Capstone: Global Migration	
PHL 294	Reproducing Persons	
THE 374	War and Peace	
FMK 202	Overview of the Globl Food Ind	
FMK 250	The Future of Food	
FMK 314	International Food Marketing	
IBU 310	Essentials of Global Business	
Total Hours		18

Languages and Linguistics

In an increasingly interdependent world community, the mission of the Department of Languages and Linguistics is to help students become articulate, knowledgeable and culturally aware, in accordance with the values and traditions of Saint Joseph's University and the Society of Jesus. We pursue this mission by:

- Fostering language proficiency
- Promoting an appreciation for the richness and complexity of language
- Deepening students' understanding of cultural diversity
- Encouraging student engagement in active, collaborative and critical learning
- Emphasizing a learner-centered pedagogy and care for the individual

Upper Division Courses Taken in Study Abroad Programs

The Department will count a maximum of four upper division courses toward all majors offered by the Department. This represents half of the

upper division courses required. A total of three courses taken abroad may count for any minor.

Faculty

Faculty within the Department of Languages and Linguistics have received several prestigious fellowships and are well-established experts in language, culture, history and more. Faculty members are dedicated to providing an interactive, learner-centered environment that allows students to actively participate in the curriculum and make significant use of digital media and current events.

Department of Languages and Linguistics Faculty & Staff (<https://www.sju.edu/departments/mcl/faculty-staff/>)

Programs

Undergraduate Majors

- Communication Sciences & Disorders (p. 136)
- Francophone Studies (p. 138)
- French (p. 140)
- Italian Studies (p. 142)
- Linguistics (p. 144)
- Spanish (p. 148)

Undergraduate Minors

- Ancient Cultures (p. 136)
- Chinese Language and Culture (p. 136)
- Classical Studies (p. 136)
- French (p. 142)
- Italian (p. 142)
- Linguistics (p. 147)
- Spanish (p. 150)
- Teaching English to Speakers of Other Languages (p. 150)

Ancient Cultures Minor

The Ancient Cultures minor aims to be a model for visionary, interdisciplinary thinking, offering courses that serve the needs of multiple academic departments as well as the university core curriculum. Courses in ancient language, literature, and civilization complement courses in other disciplines so that students may combine their Ancient Cultures minor with a major in English, fine and performing arts, history, languages, psychology, theology, philosophy, or elementary education. Knowledge of Greek and Latin are not required for civilization courses, which may be taken to fulfill requirements for the minor, to fulfill the Art/Literature, Diversity, Writing Intensive, and Ethics Intensive areas of the GEP/CCC, or as free electives. These courses are interdisciplinary and stress connections with other disciplines such as history, literature, philosophy, theology, gender studies, and the social and natural sciences.

Requirements

With the approval of the Director of the Classical Studies Program, students may elect a minor in Ancient Cultures by taking any 6 ancient studies courses in CLA, LAT, HIS, HON, PHL, REL or THE courses at any level.

Chinese Language and Culture Minor Requirements

Code	Title	Hours
CHN 102	Beginning Chinese II	4
CHN 201	Intermediate Chinese I	3
CHN 202	Intermediate Chinese II	3
CHN 301	Chinese Conv and Comp I (and higher)	3
CHN 302	Chinese Conv and Comp II	3
One course in Chinese culture, which may be taken in English, from a pre-approved list.		3
Total Hours		19

Classical Studies Minor

The Classical Studies minor is a model for visionary, interdisciplinary thinking, offering courses that serve the needs of multiple academic departments and the university core, including courses in Latin, literature, and civilization that complement disciplines such as English, fine and performing arts, history, languages, psychology, theology, philosophy, and elementary education. First-year Latin courses explore language, classical society, and culture and fulfill the non-native language core curriculum requirement.

Requirements

With the approval of the Director of the Classical Studies Program, students may elect a minor in Classical Studies by taking a minimum of 2 LAT courses at any level, 2 CLA courses at any level, and 2 additional ancient studies courses (CLA, LAT, HIS, HON, PHL, REL or THE) at any level.

Communication Sciences & Disorders Major

To be a speech-language pathologist or an audiologist, a graduate degree is required for certification and state licensure. An undergraduate major in Communication Sciences & Disorders provides excellent preparation for subsequent graduate-level work. Graduate speech-language pathology programs have varying requirements. Students should check their targeted graduate programs early on to determine those graduate programs' admission requirements and plan accordingly.

Learning Goals and Objectives

Goal 1: Identify linguistic, cognitive, affective, and social aspects of communication.

Outcome 1: Summarize research about linguistics or communication disorders.

Goal 2: Compare and contrast typical and atypical communication and swallowing development across the lifespan.

Outcome 2: Describe normative data concerning first language acquisition, or present a case study of a person with a communication or swallowing disorder.

Goal 3: Apply the foundational principles of biological and physical science to describe communication and swallowing systems.

Outcome 3: Conduct and interpret an oral motor examination, use acoustic analysis software to measure the basic properties of a person's voice, or conduct a hearing screening.

Goal 4: Identify linguistic and cultural diversity among speakers and critically assess its implications for assessment and intervention.

Outcome 4: Explain linguistic features of varieties of English.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
If approved, Literature courses may count toward a student's overlay requirements.		

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
LIN 317	Sociolinguistics	
or SOC 317	Sociolinguistics	
Literature		
Literature course in FRE, ITA, or SPA		
Social Science		
PSY 100	Introductory Psychology	
SOC 101	Intro to Sociology	
Writing Intensive		
LIN 420	SLP/AuD Research Methods	
Mission-Overlay		
LIN 260	Language and the Law	
or SOC 260	Language and the Law	

Major Requirements

Please note that Communication Sciences & Disorders majors are required to maintain a minimum 3.0 overall GPA. Always check the SLP graduate programs where you plan to apply to confirm that your undergraduate courses satisfy their admissions requirements.

Code	Title	Hours
LIN 101	Language and Communication (will count for CCC: Philosophy Level One)	3
or PHL 102	Language and Communication	
LIN 160	Intro Communication Disorders	3
LIN 203	English Grammar	3
or ENG 203	English Grammar	
LIN 215	Anat&Phys of Speech&Hearing	3
LIN 261	Psycholinguistics	3
or PSY 261	Psycholinguistics	
LIN 262	First Language Acquisition	3
or PSY 262	First Language Acquisition	
LIN 320	Phonetics	3
LIN 322	Intro to Audiology	3
LIN 325	Tour of the Brain	3
LIN 326	Speech and Hearing Sciences	3
LIN 420	SLP/AuD Research Methods	3

or HSC 331	Health Sciences Research	
or SOC 312	Research Methods	
or PSY 210	Research Methods	
LIN 421	Clinical Methods	3
MAT 118	Introduction to Statistics (will count for CCC: Mathematics)	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
Additional courses for admission to graduate SLP programs ¹		
PHY 101	General Physics I	
PHY 101L	General Physics Laboratory I	
CHM 120	General Chemistry I	
CHM 120L	General Chemistry Lab I	
PSY 120	Lifespan Development	
PSY 231	Developmental Psychology	
Two additional LIN courses from the list below or approved by the Linguistics Program Director:		6
LIN 110	Language Games	
LIN 140	Language Matters	
LIN 250	Social Media Discourse	
LIN 280	Second Lang Acquis & Lrning	
LIN 340	Communication in Soc Contexts	
25 SLP observation hours are also required		
Total Hours		49

¹ This is a standard requirement for admission to graduate-level SLP programs and one of these two courses should be taken as part of the CSD undergraduate degree. Please note that though the corresponding labs (PHY 101L and CHM 120L, respectively) are required corequisites at SJU and students must take the corresponding lab if they take those courses at SJU, most graduate-level SLP programs do not require that a lab be taken with PHY 101 or CHM 120 and the SJU CSD major does not require those labs. Check the graduate programs where you plan to apply for more information.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
LIN 101	Language and Communication	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
Theology		3
Non-Native Language		3-4
Hours		16-17
Spring		
World History		3
LIN xxx or LIN 101 (PHL Level One) or LIN 160		3
Philosophy Level Two		3

LIN xxx		3
INT 151	Inequality in American Society	1
Theology		3
Hours		16
Sophomore		
Fall		
LIN xxx		3
Literature		3
MAT 118	Introduction to Statistics	3
PHY 101 or CHM 120	General Physics I or General Chemistry I	3
PHY 101L or CHM 120L	General Physics Laboratory I or General Chemistry Lab I	1
Philosophy Level Two or Religious Studies		3
Hours		16
Spring		
LIN xxx		3
LIN xxx		3
Free Elective		3
PSY 100 or SOC 101	Introductory Psychology or Intro to Sociology	3
LIN 260	Language and the Law	3
Hours		15
Junior		
Fall		
LIN xxx		3
PSY 120 or PSY 231	Lifespan Development or Developmental Psychology	3
Fine & Performing Arts, Design & Creativity		3
LIN 317 or SOC 317	Sociolinguistics or Sociolinguistics	3
LIN xxx		3
Hours		15
Spring		
LIN xxx		3
LIN xxx		3
Religious Studies		3
Free Electives		6
Hours		15
Senior		
Fall		
LIN xxx		3
LIN xxx		3
Free Electives		9
Hours		15
Spring		
LIN xxx		3
LIN xxx		3
Free Electives		6
Hours		12
Total Hours		120-121

Francophone Studies Major Learning Goals and Outcomes

Goal 1: Develop an understanding of the Francophone world as viewed through multiple disciplinary perspectives

Outcome 1: Analyze issues in the Francophone world through the lenses of at least two distinct disciplines

Goal 2: Demonstrate knowledge of the colonial and postcolonial evolution of France and another region in the Francophone world

Outcome 2: Identify key historical events and their importance for the relations between France and another Francophone region

Goal 3: Demonstrate knowledge of a Francophone culture outside of France

Outcome 3: Describe accurately in French some aspect of Francophone culture (perspectives, products, and/or practices) outside of France

Goal 4: Communicate effectively in the target language

Outcome 4: Communicate effectively in French in oral and/or written form, as is appropriate for this level

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement 3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement 3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Literature		
FRE Literature Course		
Social Science		
LIN 101	Language and Communication	
Mission-Overlay		
Second French Course		

Major Requirements

The Francophone Studies major is an interdisciplinary program designed for students interested in the language, literature and culture of France, but also the art, history, philosophy and political systems of the wider French-speaking world. The major is also appropriate for students interested in multiple academic disciplines and cross-discipline perspectives. The Francophone Studies major requires 10 courses, at least five courses taught in French, and up to five courses taught in English.

Code	Title	Hours
Courses in French (minimum of five (5) courses required; all courses taught in French.) 15		
FRE 325	The Francophone World	
At least four courses from FRE 202 - FRE 499, with at least one course at the 400 level		
Francophone Studies courses taught in English (may take up to 5) 15		
This list is not binding or exhaustive. Some courses may have prerequisites. Students majoring in Francophone Studies must take courses from at least two of three following categories:		
Culture and Society		
ARH 101	Intro to Global Art History I	

ARH 102	Intro to Global Art History II
ARH 103	Art of Africa/African Diaspora
ARH 104	History of Global Architecture
ARH 202	Medvl Art Ctcombs to Cthdrals
ARH 205	Revolution to Realism1780-1880
ARH 206	Impressionism & Post-Impress
ARH 208	Modern Art & Architecture
REL 271	African & Caribbean Religions
Historical and Political Frameworks	
HIS 210	History of Modern Africa
HIS 327	Early Modern Europe 1400-1800
HIS 343	African Ethnicities
POL 113	Intro to Comparative Politics
POL 115	Intro to Global Politics
POL 117	Intro to Political Thought
POL 336	The EU and European Politics
POL 352	Global Political Economy
POL 367	Ethics inInternational Affairs
Conceptual Foundations	
LTT 461	Franco-Afro-Caribbean Story
PHL 304	African Philosophy
PHL 428	The Enlightenment& Its Critics
PHL 434	Existentialism
PHL 440	Phenomenology
PHL 474	Language and Thought
Total Hours	
30	

Free Electives

A varying number of courses, typically nine to twelve. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
FRE 202 or FRE 301	Intermediate French II or French Conversation	3
ENG 101	Craft of Language	3
Social Science (Recommended: LIN 101 or other approved Soc.Sci. course)		3
Mathematics		3-4
Free Elective (or secondary major course)		3
Hours		15-16
Spring		
FRE 301	French Conversation (or 3xx (Global Citizenship))	3
World History		3
Theology		3
INT 151	Inequality in American Society	1
Free Electives		6
Hours		16
Sophomore		
Fall		
FRE 3xx (CCC Literature)		3
Philosophy Level One		3
Natural Science		4

Free Electives		6
Hours		16
Spring		
FRE 325	The Francophone World	3
Fine & Performing Arts, Design, Creativity		3
FRS course in English (1 of 5)		3
Free Electives		6
Hours		15
Junior		
Fall		
FRE 4XX		3
Religious Studies		3
FRS course in English (2 of 5)		3
Free Electives		6
Hours		15
Spring		
FRS course in English (3 of 5)		3
Diversity		3
Writing-Intensive course (can be FRE/FRS or other)		3
Free Electives		6
Hours		15
Senior		
Fall		
FRS course in English (4 of 5)		3
Philosophy Level Two		3
Free Electives		9
Hours		15
Spring		
FRS course in English (5 of 5)		3
Free Electives		12
Hours		15
Total Hours		122-123

French Major

In a complex, increasingly interdependent world community, the French program helps students become articulate, knowledgeable and culturally aware global citizens in accordance with the values and traditions of Saint Joseph's University and of the Society of Jesus. We actively pursue this mission by:

- Fostering proficiency in French
- Promoting an appreciation for the richness and complexity of language in general
- Deepening students' understanding of cultural diversity
- Encouraging student engagement in active, collaborative and critical learning in the French-language classroom
- Emphasizing learner-centered pedagogy and care for the individual

Learning Goals and Outcomes

Goal 1: Communicate effectively in the target language.

Outcome 1: Communicate effectively in the target language in oral and/or written form, as is appropriate for this level.

Goal 2: Think critically and interpretively about content in the target language.

Outcome 2: Interpret and analyze main ideas, relevant facts and details in the target language.

Goal 3: Demonstrate knowledge of the target language culture(s).

Outcome 3: Describe accurately in the target language some aspect of the target language cultures (perspectives, products, and/or practices).

Goal 4: Engage with concepts of diversity, equity, and inclusion relevant to the target language and culture.

Outcome 4: Describe, in a local and/or global context, diverse human beliefs, abilities, experiences, identities, or cultures.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		

Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Literature		
FRE Literature Course		
Social Science		
LIN 101	Language and Communication	
Writing Intensive		
FRE 302	French Composition	
Mission-Overlay		
Second French Course		

Major Requirements

The French major emphasizes the acquisition of competence in spoken and written French, a sound understanding of the structures of modern French, and the ability to understand and analyze literary texts and cultural notions from a variety of periods. All courses are offered in French.

Course requirements for the major in French are ten FRE courses (30 credits) at the 201 level or higher (depending on placement). At least two courses must be at the 400 level.

Code	Title	Hours
FRE 201	Intermediate French I (or higher, depending on placement)	3
FRE 202	Intermediate French II (or higher, depending on placement)	3
FRE 301	French Conversation (or higher, depending on placement)	3
Seven courses FRE 302 - FRE 499 (at least two must be at 4xx level)		21

Students in French are strongly encouraged to participate in a study abroad program such as those in Paris, France. Please see Study Abroad. Courses from other institutions must be pre-approved by the appropriate Associate Dean in consultation with Dr. Burr, the study abroad coordinator in French.

Free Electives

A varying number of courses, typically nine to twelve. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Study Abroad Courses

For study in Francophone countries, including semester-long programs in Paris, France, see Study Abroad.

French Honor Society

The department has an active chapter of Pi Delta Phi, the National French Honor Society. A yearly initiation ceremony is held during the spring semester. Qualified students are encouraged to apply; please contact the French faculty for more information.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
FRE 201 or FRE 202 or FRE 301	Intermediate French I or Intermediate French II or French Conversation	3
ENG 101	Craft of Language	3
LIN 101	Language and Communication	3
Mathematics		3-4
Free Elective		3
Hours		15-16
Spring		
FRE 202 or FRE 301	Intermediate French II or French Conversation	3
World History		3
Theology		3
INT 151	Inequality in American Society	1
Free Electives		6
Hours		16
Sophomore		
Fall		
FRE 301	French Conversation (or higher)	3
Philosophy Level One		3
Natural Science		4
Free Electives		6
Hours		16
Spring		
300 Level FRE course		3
Fine & Performing Arts, Design, Creativity		3
Free Electives		9
Hours		15
Junior		
Fall		
FRE 3XX or 4XX		3
FRE 3XX or 4XX		3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
FRE 302 or other approved FRE Writing-Intensive course		3
FRE 3XX or 4XX		3
Diversity		3
Free Electives		6
Hours		15

Senior	
Fall	
FRE 4XX elective	3
Philosophy Level Two	3
Free Elective	9
Hours	
15	
Spring	
FRE 4XX elective	3
Free Electives	12
Hours	
15	
Total Hours	
122-123	

French/PK-12 Education

Students majoring in French who are interested in teaching in grades PK-12 can dual major in World Languages Education (PK-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I World Language PK-12 Education Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their French advisor, French and World Languages Education (PK-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 492 PK-12 Student Teaching in their senior year. Students must maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

See the French major for specific requirements. (p. 141)
See the PK-12 Education major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/prek-12-major/>)

French Minor Requirements

Completing the French Minor requires taking six courses (18 credits) numbered FRE 201 or higher. For further information, please contact Dr. Kristin Burr (klburr@sju.edu).

Italian Minor Requirements

Completing the Italian Minor requires taking six courses (20 credits) numbered ITA 101 or higher. For further information, please contact Dr. Kristi Grimes (kgrimes@sju.edu).

Italian Studies Major Learning Goals and Outcomes

- Goal 1: Communicate effectively in the target language.
- Outcome 1: Communicate effectively in the target language in oral and/or written form, as is appropriate to this level.

Goal 2: Think critically and interpretively about content in the target language.

Outcome 2: Interpret and analyze main ideas, relevant facts, and details in the target language.

Goal 3: Demonstrate knowledge of the target language culture(s).

Outcome 3: Describe accurately in the target language some aspect of the target language cultures (perspectives, products, and/or practices).

Goal 4: Engage with concepts of diversity, equity and inclusion relevant to the target language and culture.

Outcome 4: Describe, in a local and/or global context, diverse human beliefs, abilities, experiences, identities, or cultures.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Fine & Performing Arts, Design & Creativity		
ARH 115	Italy Through Art	
Social Science		
LIN 101	Language and Communication	
Mission-Overlay		
Second ITA Course		

Major Requirements

The requirements for the Italian Studies major are 10 courses, five of which must be ITA courses starting at the 100 level or higher (conducted entirely in Italian), and five of which are interdisciplinary courses.

Code	Title	Hours
Required Courses:		
ITA 101	Beginning Italian I	4
ITA 102	Beginning Italian II	4
ITA 201	Intermediate Italian I	3
ITA 202	Intermediate Italian II	3
One course at the ITA 3xx level (or higher)		3
Required Latin Courses:		
LAT 101	Beginning Latin I	4
LAT 102	Beginning Latin II	4
Select three interdisciplinary courses from list:		9
ARH 115	Italy Through Art	
ARH 203	Renaissance Art & Architecture	
ARH 204	Baroque Art and Architecture	
ARH 210	Museum Studies	

HIS 307	Ancient Greece & Rome Cinema	
HIS 308	Race & Ethnicity Greece/Rome	
HIS 316	The Grandeur that Was Rome	
IST 115	Italy Through Art	
IST 170	Special Topics	
IST 270	Special Topics	
IST 318	Italian Journeys	
IST 350	Mangia! Flavors of Italy	
IST 360	Italian Identities	
IST 370	Topics in Italian Studies	
IST 375	Shadow State: Mafia in Italy	
IST 420	Italian Cinema and the Sacred	
IST 460	The Art of Dante's Inferno	
LIN 101	Language and Communication	
LIN 280	Second Lang Acquis & Lrning	
LIN 301	Teaching Lang at Home/Abroad	
LIN 401	Bilingualism & Lang Diversity	
LTT 150	First Year Seminar	
MTF 157	Westrn Music Hist: MidAge-1750	
MTF 158	Western Music Hist: 1750-Pres	
PHL 402	Plato and Aristotle	
PHL 412	The Philosophy of Aquinas	
POL 336	The EU and European Politics	
Total Hours		34

(This list is illustrative, not exhaustive; for more information, please consult the faculty in Italian Studies.)

Free Electives

A varying number of courses, typically nine to twelve. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Study Abroad Courses

For study at SJU in Rome and Florence, Italy, see Study Abroad. (p.)

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ITA 101 or ITA 201	Beginning Italian I or Intermediate Italian I	4
ENG 101	Craft of Language	3
Social Science (LIN 101 or other approved course)		3
LAT 101	Beginning Latin I	4
Free Elective		3
Hours		17
Spring		
ITA 102 or ITA 202	Beginning Italian II or Intermediate Italian II	4
World History		3
Theology		3
LAT 102	Beginning Latin II	4
Free Elective		3
Hours		17

Sophomore		
Fall		
ITA 201	Intermediate Italian I	3
Philosophy Level One		3
Mathematics		3
Writing Intensive Course		3
INT 151	Inequality in American Society	1
Free Elective		3
Hours		16
Spring		
ITA 202	Intermediate Italian II	3
Fine & Performing Arts, Design, Creativity (ARH 115 or other approved FPADC course)		3
Natural Science		4
Diversity		3
Free Elective		3
Hours		16
Junior		
Fall		
ITA course (CCC Literature) (5 of 5 ITA courses)		3
IST course (1 of 3 IST courses)		3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
IST course (2 of 3 IST courses)		3
Free Electives		12
Hours		15
Senior		
Fall		
IST course (3 of 3 IST courses)		3
Philosophy Level Two		3
Free Electives		9
Hours		15
Spring		
Free Electives		15
Hours		15
Total Hours		126

Linguistics Major

As an increasingly interdisciplinary field, Linguistics is closely related to many other academic fields including Autism Studies, Classical and Modern Languages, Communication Sciences & Disorders, Communication Studies, Computer Science, Criminal Justice, Education, English, Philosophy, Political Science, Psychology, Sociology, and TESOL. Students of Linguistics often pursue careers as clinical psychologists, educators, information technology specialists, lawyers, linguists, marketing and advertising consultants, social workers, audiologists, speech pathologists, speech therapists, teachers, translators and interpreters. For that reason, several courses in other SJU programs count toward a major in Linguistics while fulfilling requirements in their respective programs.

Learning Goals and Objectives

Goal 1: Students will know what the field of linguistics is and understand how language works.

Outcome 1: Identify the main areas of linguistic analysis and analyze relevant examples.

Goal 2: Students will connect linguistic topics to real life.

Outcome 2: Explain linguistic topics in oral presentations.

Goal 3: Students will understand language differences that exist among speakers of the same and different languages.

Outcome 3: Analyze particular aspects of linguistic beauty and creativity.

Goal 4: Students will understand beliefs about language that exist among speakers of the same or different languages.

Outcome 4: Analyze their own language beliefs as well as those of others.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
3-4		

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Philosophy Level One		
LIN 101	Language and Communication	
PHL 102	Language and Communication	
Literature		
Literature course in FRE, ITA, or SPA		
Diversity		
LIN 317	Sociolinguistics	
SOC 317	Sociolinguistics	
Social Science		
LIN 262	First Language Acquisition	
PSY 262	First Language Acquisition	
Mission-Overlay		
LIN 260	Language and the Law	
SOC 260	Language and the Law	

Major Requirements

There are two ways to major in Linguistics:

1. Linguistics
2. Linguistics - TESOL Concentration

Course requirements for the Linguistics Major include a general introduction to the field and at least one course in several of the main areas of linguistics (applied linguistics, sociolinguistics, psycholinguistics, phonetics, and pragmatics). Specific course requirements and options are listed below. Course requirements for the Linguistics Major-TESOL concentration include a general introduction to the field of linguistics, an English grammar course, a course on psycholinguistics, a course on second language acquisition, a language teaching methods course and phonetics.

Please note that students may also choose to double major in Linguistics and Communication Sciences & Disorders or to combine a major in Linguistics with a minor in TESOL (a total of at least 13 courses¹) or to complete a double minor in both Linguistics and TESOL (a total of at least 9 courses¹).

Please note that students may also choose to combine a major in Communication Sciences & Disorders with a double major or minor in Linguistics. A total of 3 courses may double count for the two majors.

¹ Please note that students who are double majoring/minoring may count a maximum of 3 courses toward requirements in each area.

Code	Title	Hours
Required Courses:		
LIN 101 or PHL 102	Language and Communication	3
LIN 110 or LIN 250 or LIN 340	Language Games Social Media Discourse Communication in Soc Contexts	3
LIN 203	English Grammar	3
LIN 260 or SOC 260	Language and the Law Language and the Law	3
LIN 261 or PSY 261	Psycholinguistics Psycholinguistics	3
LIN 262 or PSY 262	First Language Acquisition First Language Acquisition	3
LIN 280 or LIN 301	Second Lang Acquis & Lrning Teaching Lang at Home/Abroad	3
LIN 320	Phonetics	3
Any 2 additional courses including those below or approved by the Linguistics Program Director:		6
LIN 140	Language Matters	
LIN 160	Intro Communication Disorders	
LIN 170	Topics in Linguistics	
LIN 215	Anat&Phys of Speech&Hearing	
LIN 220 or PHL 220	Logic Logic	
LIN 240 or PHL 240	Symbolic Logic Symbolic Logic	
LIN 250	Social Media Discourse	
LIN 270	Topics in Linguistics	
LIN 301	Teaching Lang at Home/Abroad	
LIN 317	Sociolinguistics	
LIN 325	Tour of the Brain	
LIN 340	Communication in Soc Contexts	
LIN 370	Special Topics in Linguistics	
LIN 381	History of the Eng Language	
LIN 401	Bilingualism & Lang Diversity	
LIN 470	Topics in Linguistics	
LIN 474 or PHL 474	Language and Thought Language and Thought	
LIN 475 or PHL 475	Language and Meaning Language and Meaning	

SPA 375	Translation ¹	
SPA 380	Intro to Spanish Linguistics ¹	
SPA 381	Spanish Phonetics & Phonology ¹	
SPA 460	Advanced Oral Communication ¹	
SPA 461	Methods for Teaching Spanish ¹	
SPA 466	Spanish Dialectology ¹	
SPA 466	Spanish Dialectology ¹	
SPA 467	Lang Contact & Pol in U.S. ¹	
SPA 480	Topics in Spanish Linguistics ¹	
Total Hours		30

¹ Please note that students who are double majoring/minoring may count a maximum of 3 courses toward requirements in each area.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
LIN 101	Language and Communication	3
Non-Native Language		3
ENG 101	Craft of Language	3
Mathematics		3
Natural Science		4
Hours		16
Spring		
LIN XXX		3
World History		3
Theology		3
INT 151	Inequality in American Society	1
Free Electives		6
Hours		16
Sophomore		
Fall		
LIN 280 or LIN 261 or LIN 301	Second Lang Acquis & Lrning or Psycholinguistics or Teaching Lang at Home/Abroad	3
LIN Major Course Requirement		3
THE 154 or PHL 154	Catholic Theological Tradition or Moral Foundations	3
Math Beauty		3
Free Elective		3
Hours		15
Spring		
LIN 317 or LIN 261 or LIN 401	Sociolinguistics or Psycholinguistics or Bilingualism & Lang Diversity	3
LIN Major Course Requirement		3
Natural Science		3
Writing Intensive Overlay 1		3
Free Elective		3
Hours		15
LIN 261	Psycholinguistics	3
Hours		3

Junior		
Fall		
LIN major course requirement		3
PHL Anthropology or Religious Difference		3
Faith & Reason		3
DGNW Overlay		3
Integrative Learning Course		3
Hours		15
Spring		
LIN 320	Phonetics	3
or SPA 466	or Spanish Dialectology	
Fine & Performing Art or Literature		3
Integrative Learning Course		3
PHL Anthropology or Religious Difference		3
Free Elective		3
Hours		15
Senior		
Fall		
LIN major course requirement		3
Integrative Learning Course		3
Free-Elective or 2nd Natural Science, if needed		3
Ethics Overlay		3
Free- lective		3
Hours		15
Spring		
LIN major course requirement		3
Free Electives		12
Hours		15
Total Hours		125

Concentration Option TESOL Concentration

Code	Title	Hours
LIN 101	Language and Communication	3
or PHL 102	Language and Communication	
LIN 203	English Grammar	3
or ENG 203	English Grammar	
LIN 261	Psycholinguistics	3
or PSY 261	Psycholinguistics	
LIN 280	Second Lang Acquis & Lrning	3
LIN 301	Teaching Lang at Home/Abroad	3
LIN 320	Phonetics	3
Select three of the following:		12
LIN 110	Language Games	
LIN 140	Language Matters	
LIN 220	Logic	
or PHL 220	Logic	
LIN 250	Social Media Discourse	
LIN 262	First Language Acquisition	
or PSY 262	First Language Acquisition	
LIN 325	Tour of the Brain	
LIN 340	Communication in Soc Contexts	
LIN 401	Bilingualism & Lang Diversity	
SPA 375	Translation ¹	
SPA 380	Intro to Spanish Linguistics ¹	
SPA 381	Spanish Phonetics & Phonology	

SPA 466	Spanish Dialectology
SPA 467	Lang Contact & Pol in U.S. ¹
SPA 480	Topics in Spanish Linguistics ¹
Total Hours	30

¹ Please note that students who are double majoring/minoring may count a maximum of 3 courses toward requirements in each area.

Linguistics Minor

As an increasingly interdisciplinary field, Linguistics is closely related to many other academic fields including Autism Studies, Classical and Modern Languages, Communication Studies, Computer Science, Criminal Justice, Education, English, Philosophy, Political Science, Psychology, Sociology, and TESOL. Students of Linguistics often pursue careers as clinical psychologists, educators, information technology specialists, lawyers, linguists, marketing and advertising consultants, social workers, speech pathologists, speech therapists, teachers, translators and interpreters. For that reason, several courses in other SJU programs count toward a minor in Linguistics while fulfilling requirements in their respective programs.

Students who are interested in English language teaching may also want to consider adding a second minor in TESOL (Teaching English to Speakers of Other Languages). For more information, visit the TESOL website (<https://www.sju.edu/degree-programs/teaching-english-speakers-other-languages-tesol-minor/>).

Learning Goals and Objectives

Goal 1: Students will know what the field of linguistics is and understand how language works.

Outcome 1: Identify the main areas of linguistic analysis and analyze relevant examples.

Goal 2: Students will connect linguistic topics to real life.

Outcome 2: Explain linguistic topics in oral presentations.

Goal 3: Students will understand language differences that exist among speakers of the same and different languages.

Outcome 3: Analyze particular aspects of linguistic beauty and creativity.

Goal 4: Students will understand beliefs about language that exist among speakers of the same or different languages.

Outcome 4: Analyze their own language beliefs as well as those of others.

Requirements

A student may minor in Linguistics by taking six courses:

Code	Title	Hours
LIN 101	Language and Communication	3
or PHL 102	Language and Communication	
Select five (5) additional preapproved courses		15
Total Hours		18

Those approved include all courses taught in Linguistics (LIN) and some courses in English, French, Philosophy, Psychology, Sociology, and Spanish. Contact the Linguistics Program Director, Dr. Jennifer Ewald for more information and visit the Linguistics Program website at <http://www.sju.edu/int/academics/cas/linguistics/index.html> (<http://www.sju.edu/int/academics/cas/linguistics/>).

Spanish Major

The Spanish major emphasizes the learning of both spoken and written Spanish, a sound understanding of the linguistic structures of modern Spanish, an appreciation for cultures of the Spanish-speaking world, and the ability to analyze literary texts from a variety of periods. Students may choose from a variety of offerings in Latin American or Peninsular literature, film, culture, language, and Spanish linguistics. All courses are offered in Spanish. See individual faculty members for more information.

Learning Goals and Outcomes

Goal 1: Communicate effectively in the target language.

Outcome 1: Communicate effectively in the target language in oral and/or written form.

Goal 2: Think critically and interpretively about content in the target language.

Outcome 2: Interpret and analyze main ideas, relevant facts, and details in the target language.

Goal 3: Demonstrate knowledge of the target language culture(s).

Outcome 3: Describe accurately in the target language some aspect of the target language cultures (perspectives, products, and/or practices).

Goal 4: Engage with concepts of diversity, equity, and inclusion relevant to the target language and culture.

Outcome 4: Describe, in a local and/or global context, diverse human beliefs, abilities, experiences, identities, or cultures.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151	Inequality in American Society 1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
3-4	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
3	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
3	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	
47-49	

Recommended CCC Courses

Code	Title	Hours
Philosophy Level One		
LIN 101	Language and Communication	
PHL 102	Language and Communication	
Social Science		
LIN 101	Language and Communication	
Writing Intensive		
SPA 302	Spanish Composition	

Mission-Overlay

Second Spanish Course

Major Requirements

Requires 10 SPA courses (30 credits) including:

Code	Title	Hours
SPA 201	Intermediate Spanish I (depending on placement)	3
SPA 202	Intermediate Spanish II (depending on placement)	3
SPA 301	Spanish Conversation (depending on placement)	3
or SPA 303	Spanish for Heritage Speakers	
SPA 302	Spanish Composition ¹	3
SPA 380	Intro to Spanish Linguistics	3
or SPA 466	Spanish Dialectology	
The remaining SPA credits must include at least 2 4xx level SPA courses (a total of 10 SPA courses). Students must also complete a World Language Capstone, which is an Oral Proficiency Interview (OPI) in Spanish. For more information, please refer to the World Languages International website (https://www.languageTesting.com/academic-testing-instruments) and follow the links to Oral Proficiency Interview > Schedule a Test (and then select language).		15
Total Hours		30

¹ Heritage speakers of Spanish having completed SPA 303 complete a SPA elective in place of SPA 302.

² A student may count only one of these two courses toward the major or minor.

Free Electives

A varying number of courses, typically nine to twelve. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Study Abroad

Spanish majors and minors are strongly encouraged to study abroad in a Spanish-speaking country of their choice. The Center for International Programs (<https://www.sju.edu/offices/student-life/cip/>) provides information on SJU-approved programs in Argentina, Chile, Central America, and Spain, as well as programs in other Latin American countries, for which students may petition credit. Languages and Linguistics faculty also offer Study Tour Courses to Latin America and Spain. Study Tours offered by other departments have included destinations such as Bolivia, Costa Rica, Cuba, the Dominican Republic and Nicaragua. Study Tours offered by other departments do not count toward the Spanish major or minor, but they do complement students' interests in Spanish. Students who are interested in studying abroad should meet with Dr. Elaine Shenk, the Spanish Program Coordinator for Study Abroad.

Spanish Honor Society

The department has an active chapter, Omicron Phi, of the National Spanish Honorary Society Sigma Delta Pi. A yearly initiation ceremony is held in the spring semester. Qualified students are encouraged to apply; please contact the Spanish faculty for more information.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
SPA 201	Intermediate Spanish I	3
or SPA 202	or Intermediate Spanish II	
or SPA 301	or Spanish Conversation	
or SPA 303	or Spanish for Heritage Speakers	
ENG 101	Craft of Language	3
LIN 101	Language and Communication	3
Mathematics		3
Free Elective		3
Hours		15
Spring		
SPA 202	Intermediate Spanish II	3
or SPA 301	or Spanish Conversation	
or SPA 302	or Spanish Composition	
World History		3
Theology		3
Free Electives		6
Hours		15
Sophomore		
Fall		
SPA 301	Spanish Conversation	3
or SPA 302	or Spanish Composition	
Philosophy Level One		3
Natural Science		4
Free Electives		6
Hours		16
Spring		
SPA 302	Spanish Composition (or SPA 3XX)	3
Fine & Performing Arts, Design, Creativity		3
Free Electives		9
Hours		15
Junior		
Fall		
SPA 3xx or 4xx (CCC Literature)		3
SPA 3xx or 4xx		3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
SPA 3xx or 4xx		3
SPA 3xx or 4xx		3
Diversity		3
Free Electives		6
Hours		15
Senior		
Fall		
SPA 4xx elective		3
Philosophy Level Two		3
Free Electives		9
Schedule/Do Oral Prof. Interview (OPI)		
Hours		15
Spring		
SPA 4xx elective		3
Free Electives		12
Hours		15
Total Hours		121

Spanish/PK-12 Education

Students majoring in Spanish who are interested in teaching in grades PK-12 can dual major in World Languages Education (PK-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I World Language PK-12 Education Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their Spanish advisor, Spanish and World Languages Education (PK-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 492 PK-12 Student Teaching in their senior year. Students must maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

See the Spanish major for specific requirements. (p. 148)
 See the PK-12 Education major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/prek-12-major/>)

Spanish Minor Requirements

Requires six SPA courses (18 credits) including:

Code	Title	Hours
SPA 201	Intermediate Spanish I (or higher, depending on placement)	3
SPA 202	Intermediate Spanish II (or higher, depending on placement)	3
SPA 301	Spanish Conversation (or higher, depending on placement)	3
or SPA 303	Spanish for Heritage Speakers	
SPA 302	Spanish Composition (or higher) ¹	3
SPA 3xx or 4xx course		3
SPA 4xx course		3

Course sequence depends on initial placement. All Spanish minors are required to take at least one 400-level course. See Dr. Enrique Téllez-Espiga for more information about the minor.

¹ Heritage speakers of Spanish having completed SPA 303 complete a SPA elective in place of SPA 302.

Teaching English to Speakers of Other Languages Minor

Teaching English to Speakers of Other Languages (TESOL) is a six-course minor that provides essential training for the challenging task of teaching the English language at home or abroad in private language schools, community centers or bilingual programs, and in other contexts that do not require state certification. A minor in TESOL incorporates important pedagogical training that prepares students to teach English with both cultural and linguistic sensitivity. This minor opens doors to opportunities

to travel, live, and work around the globe. Students who are interested in TESOL might also be interested in studying linguistics, including areas such as dialectology and forensic linguistics. While completion of a TESOL minor does not certify students to teach English in public schools, it does offer undergraduate students numerous professional and volunteer opportunities. TESOL can be combined with any number of majors or minors and enhances students' applications for fellowships such as the Fulbright. The coursework also provides general background for related graduate study and equips students to serve as English language teachers in the United States and in other countries.

As an increasingly interdisciplinary field, Linguistics is closely related to many other academic fields including Autism Studies, Classical and Modern Languages, Communication Studies, Computer Science, Criminal Justice, Education, English, Philosophy, Political Science, Psychology, Sociology, and TESOL. Students of Linguistics often pursue careers as clinical psychologists, educators, information technology specialists, lawyers, linguists, marketing and advertising consultants, social workers, speech pathologists, speech therapists, teachers, translators and interpreters.

Learning Goals and Objectives

Goal 1: Students will know what the field of linguistics is and understand how language works.

Outcome 1: Identify the main areas of linguistic analysis and analyze relevant examples.

Goal 2: Students will connect linguistic topics to real life.

Outcome 2: Explain linguistic topics in oral presentations.

Goal 3: Students will understand language differences that exist among speakers of the same and different languages.

Outcome 3: Analyze particular aspects of linguistic beauty and creativity.

Goal 4: Students will understand beliefs about language that exist among speakers of the same or different languages.

Outcome 4: Analyze their own language beliefs as well as those of others.

Requirements

A TESOL minor consists of six courses (18 credits) including the following:

Code	Title	Hours
LIN 101	Language and Communication	3
or PHL 102	Language and Communication	
LIN 203	English Grammar	3
or ENG 203	English Grammar	
LIN 280	Second Lang Acquis & Lrning	3
LIN 301	Teaching Lang at Home/Abroad	3
Select two of the following:		6
LIN 110	Language Games	
LIN 140	Language Matters	
LIN 150	First Year Seminar	
LIN 261	Psycholinguistics	
or PSY 261	Psycholinguistics	

LIN 317	Sociolinguistics
or SOC 317	Sociolinguistics
LIN 320	Phonetics
LIN 340	Communication in Soc Contexts
LIN 401	Bilingualism & Lang Diversity
PHL 220	Logic
EDU 246	Language and Culture w/ Field
SPA 380	Intro to Spanish Linguistics
SPA 381	Spanish Phonetics & Phonology
SPA 461	Methods for Teaching Spanish
SPA 466	Spanish Dialectology
SPA 467	Lang Contact & Pol in U.S.
FRE 470	Topics in French
or ITA 470	Topics in Italian

Total Hours

18

Latin American and Latinx Studies Minor

The Latin American and Latinx Studies (LALS) Program provides a multidisciplinary education on key issues and dynamics in Latin America and Latinx communities in the United States and prepares students for work and future study in an array of fields, including business, government and diplomacy, education, health care, journalism and communications, private and public development organizations and non-profits. It also offers an array of relevant programming on campus and promotes experiential learning in and related to the region.

The Minor in Latin American and Latinx Studies (LALS) equips students with multiple frameworks for understanding and analyzing significant realities in Latin America and Latinx communities. Students explore perspectives and approaches from within the region and among peoples of Latin American origins in the U.S., including those expressed in the primary languages of Latin America. By selecting courses most relevant to their primary areas of study, students prepare themselves for professional opportunities in or related to Latin America and Latinx communities.

Faculty

Latin American and Latinx Studies Advisory Board

- Fr. Peter Clark (Theology and Religious Studies)
- Dr. Richard Gioioso (Political Science)
- Dr. Heather Hennes (Languages and Linguistics)
- Dr. Claudia Pérez-Lotero (Languages and Linguistics)
- Dr. Michelle Ramírez (Sociology)
- Dr. Elaine Shenk (Languages and Linguistics)
- Dr. Richard Warren (History)

Learning Goals and Outcomes

Goal 1: be knowledgeable about the history, cultures, economic, business, political and/or social trends of Latin America and/or Latinx communities in the United States.

Objective 1.1: describe accurately and with substantive detail some aspect of the history, cultures, economic, business, political and/or social trends of Latin America and/or Latinx communities.

Goal 2: develop modes of analysis and ways of critical thinking about Latin America and/or Latinx communities through multiple lenses (e.g. historical, literary, political, sociological, artistic, business, economic).

Objective 2.1: apply appropriate, discipline-specific theoretical and/or analytical frameworks to interpret ideas and beliefs, events, practices, texts (broadly conceived), and/or material culture from Latin America and/or among Latinx communities.

Requirements

Students complete the Minor in Latin American and Latinx Studies (LALS) with six courses. To ensure the interdisciplinary focus of the minor, courses from at least three participating departments must be represented among the six courses. Students may petition the LALS Program Director to receive credit for courses not listed below, such as courses taken abroad. Students participating in a study abroad or a study tour to Latin America are encouraged to ask the LALS Program Director about financial support for travel.

Please note: Students may count a maximum of two of the following courses towards the Minor in Latin American and Latinx Studies: SPA 201 SPA 202, SPA 301, SPA 302, SPA 303. Students studying another language of the region (French, Portuguese) can request that comparable courses count toward the LALS minor.

Course Offerings

Code	Title	Hours
ARH 106	Latin American Art & Architect	3
HIS 203	Historical Intro to Latin Am	3
HIS 204	Latin American-U.S. Migration	3
HIS 301	Latin America and the U.S.	3
HIS 303	History of Modern Mexico	3
HIS 474	Seminar in Latin Am His	3
HIS 480	Readings in Latin Amer Hist	3
HSC 368	Just Hlth Care Dev Nations	3
POL 328	U.S. Immigration	3
POL 331	Latin American Politics	3
POL 337	Contemp Cuban Pol & Society	3
POL 352	Global Political Economy	3
SOC 314	Cultures of Latin America	3
SOC 316	Fair Trade Coffee: Study Tour	3
SPA 201	Intermediate Spanish I ¹	3
SPA 202	Intermediate Spanish II ¹	3
SPA 301	Spanish Conversation ¹	3
SPA 302	Spanish Composition ¹	3
SPA 303	Spanish for Heritage Speakers ¹	3
SPA 310	Intro to Latin American Lit	3
SPA 315	Animals in Literature	3
SPA 320	Cur Evnts in the Sp-Lang Media	3
SPA 350	Intro to Latin Amer Cultures	3
SPA 353	Latin American Cinema	3
SPA 360	Spanish in the Community	4
SPA 401	Topics in Latin Am Cultures	3

SPA 415	Iconic Women of Latin America	3
SPA 420	Major Latin American Authors	3
SPA 422	Culture and Dictatorship	3
SPA 423	Latin Am Short Story	3
SPA 425	Imagery of the Conquest	3
SPA 426	Culture in Revolution	3
SPA 428	Rainforest: A Literary Journey	3
SPA 431	Commonplaces of Colonial Exp	3
SPA 466	Spanish Dialectology	3
SPA 467	Lang Contact & Pol in U.S.	3
THE/HSC 368	Just Hlth Care in Dev Nations	3

¹ Students may count a maximum of two of the following courses towards the Minor in Latin American Studies: **SPA 201**, SPA 202, SPA 301, SPA 302, SPA 303

Provisional Courses

The following courses may count toward the Minor in Latin American and Latinx Studies, depending on course content in a given semester, including the student's final project. Students who would like to include these courses in their program of study should consult with the LALS Program Director in advance to determine whether or not the course will be accepted.

Code	Title	Hours
ECN 321	International Trade	3
FMK 402	Future Issues in Food Mktg	3
HIS 491	Philadelphia Area Internship	3
IBU 210	Intro International Business	3
POL 403	Capstone: Nations&Nationalism	3
POL 491	Philadelphia-Area Internship	3
SPA 470	Topics in Spanish	3
MCC 150	First Year Seminar	3

Managing Neurodiversity at Work Minor

Code	Title	Hours
ABA 100	Intro Autism Spectrum Disorder	3
MGT 220	Intro Human Resource Management	3
MGT 221	Diversity in the Workplace	3
MGT 398	Neurodiversity at Work Interns	3
Choose two electives:		6
PSY 209	Autism:Co-Occurring Conditions	
SPE 339	Low Incid Disabil w/Field	
ABA 201	Skill Assess & Instr ABA&ASD	
ABA 468	Resources& Advocacy for Autism	
ABA 469	Adult/Transition Autism	
Total Hours		18

Mathematics

The Department of Mathematics offers a BS degree in mathematics and a double major in mathematics and secondary education that includes

teaching certification. The objective of the bachelors degree program in mathematics is to prepare students for professional careers in a variety of industries and for graduate programs leading to the MS and PhD. Students also may opt for advanced degrees in education, business administration, law, or medicine.

Faculty

Well-versed in a wide range of mathematical concepts, from algebraic topology to statistics and data science, the faculty in Saint Joseph's Department of Mathematics are dedicated to sharing their knowledge and research experience with students. Classroom sizes are small and hands-on, providing students with the opportunity to work closely with mathematics faculty and prepare for successful careers after graduation.

Department of Mathematics Faculty & Staff (<https://www.sju.edu/departments/math/faculty-staff/>)

Programs

Undergraduate Major

- Mathematics (p. 152)

Undergraduate Minor

- Mathematics (p. 154)

Mathematics Major

Mathematics major provides a well-rounded introduction to fundamental principles of mathematical reasoning and logical arguments as well as knowledge of modeling techniques required for successful application of mathematics. The required courses of the mathematics major are a strong foundation of a variety of areas of mathematics. The elective courses enable a build up on theoretical foundations and exploration of the richness of applied mathematics.

The flexibility of the program enables our students to combine mathematics with other interests. Relatively large number of free electives make it manageable to minor in a variety of other disciplines or to pair mathematics with a major in another area (for example, Data Science, Computer Science, Education, Physics, Chemistry or Finance). Students gain practical experience through internships and expand their knowledge by independent research study.

Learning Goals and Outcomes

Goal 1: Students will gain a general knowledge of the main areas of mathematics.

Outcome 1.1: Students will apply the concepts of calculus and linear algebra as well as fundamental principles of mathematics reasoning, arguments, and proofs.

Outcome 1.2: Students will prove statements related to real analysis and abstract algebra.

Goal 2: Students will develop specific skills in mathematics.

Outcome 2.1: Students will perform computations, identify the appropriate method to solve a specific mathematical problem, and apply an appropriate proof technique to prove a specific mathematical statement.

Outcome 2.2: Students will use modeling techniques required for successful application of mathematics.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
	Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
	Writing-Intensive	3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Code	Title	Hours
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4
MAT 213	Calculus III	4
MAT 250	Fundamentals of Mathematics	3
MAT 226	Introduction to Linear Algebra	3
MAT 403	Abstract Algebra	3
MAT 409	Real Analysis	3
Any SIX additional "math elective" 3-credit courses, which include all MAT, DSC and ASC 3-credit courses above the level of 200.		18
PHY 105	University Physics I (will count for CCC: Natural Science)	3
PHY 105L	University Physics Lab I (will count for CCC: Natural Science)	1
Total Hours		46

Free Electives

Seven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Concentration Option

The Applied Mathematics concentration is an option for mathematics majors to focus on applied mathematics. It consists of one required course and two elective courses.

Code	Title	Hours
MAT 238	Differential Equations	3
Select two of the following:		6
MAT 311	Numerical Analysis	
MAT 313	Mathematical Optimization	
MAT 316	Operations Research	
MAT 410	Complex Analysis	
MAT 420	Convex Analysis & Optimization	
Total Hours		9

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
World History		3

CSC 115 or CSC 120 or CSC 133	Intro to Computer Science or Computer Science I or Python Programming for All	3
MAT 161	Calculus I	4
Free Elective		3
Hours		16
Spring		
Non-Native Language		3-4
MAT 162	Calculus II	4
MAT 226	Introduction to Linear Algebra	3
Diversity		3
Free Elective		3
Hours		16-17
Sophomore		
Fall		
INT 151	Inequality in American Society	1
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
MAT 250	Fundamentals of Mathematics	3
Free Electives		3
MAT 213	Calculus III	4
Hours		15
Spring		
Literature		3
MAT 403 or MAT 409	Abstract Algebra or Real Analysis	3
Major Elective		3
Free Electives		6
Hours		15
Junior		
Fall		
Theology		3
Philosophy Level One		3
Major Elective		3
Free Electives		6
Hours		15
Spring		
Philosophy Level Two		3
MAT 403 or MAT 409	Abstract Algebra or Real Analysis	3
Free Electives		6
Major Elective		3
Hours		15
Senior		
Fall		
Social Science		3
Fine & Performing Arts, Design, Creativity		3
Major Elective		3
Free Electives		6
Hours		15
Spring		
Religious Studies		3
MAT 403 or MAT 409	Abstract Algebra or Real Analysis	3
Major Elective		3
Free Electives		6
Hours		15
Total Hours		122-123

Math/Secondary Education

Students majoring in Mathematics who are interested in teaching grades 7-12 can dual major in Mathematics/Secondary Education (7-12). Upon

successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their Mathematics advisor, Mathematics/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 (<https://academiccatalog.sju.edu/search/?P=EDU%20491>) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i).

See the Mathematics major for specific requirements. (p. 153)

See the Secondary Education (7-12) major for specific requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

Mathematics Minor

By minoring in mathematics, you can develop your problem-solving skills and enrich your resume. As a mathematics minor, you will obtain a well-rounded introduction to fundamental principles of mathematical reasoning and logical arguments. You will also deepen your knowledge of modeling techniques required for successful application of mathematics to your field of interest.

The mathematics minor requirements are very flexible and quite manageable: the minor consists of two required courses (MAT 155 or MAT 161 and MAT 162) and four elective courses above MAT 162. You can choose the elective courses so that you have an introduction to various areas of modern mathematics, so that they focus on application of mathematics to your major and your other interests, or so that they combine these two objectives.

Learning Goals and Outcomes

Goal 1: Students will develop specific skills in mathematics.

Outcome 1.1: Students will perform computations, identify the appropriate method to solve a specific mathematical problem, and apply an appropriate proof technique to prove a specific mathematical statement.

Outcome 1.2: Students will use modeling techniques required for successful application of mathematics.

Requirements

Code	Title	Hours
MAT 155	Fundamentals of Calculus	3
or MAT 161	Calculus I	
MAT 162	Calculus II	4
Four (4) MAT courses 200-level or higher. DSC courses 200-level or higher may substitute for up to 2 of these.		12
AP credit may be accepted for Calculus 1 and Calculus II (refer to AP credit guide).		
Total Hours		19

Medieval and Renaissance Studies Minor

The Medieval and Renaissance Studies program includes courses offered by the departments of History; Art and Art History; Music, Theater and Film; English; Languages and Linguistics; Philosophy; and Theology and Religious Studies. Courses taken to satisfy requirements of this program may also serve to satisfy GEP or major requirements, including Integrative Learning Courses where appropriate. Participants choose a minimum of six courses from the approved curriculum, with no more than three from any one department. Substitutions may be approved upon request to the director. Students who successfully complete the program requirements earn a Minor in Medieval and Renaissance Studies. For more information, see the program website (<https://sites.sju.edu/medievalstudies/>).

Faculty Directors

- Burr (DLL)
- Grimes (DLL)

Advisory Board

- Bulthuis (PHL)
- Close (HIS)
- Easton (ART/ARH)
- Krahmer (TRS)
- Lewin (HIS)
- J. Powell (ENG)
- St. Amour (PHL)

Requirements

Code	Title	Hours
Select a minimum of six courses from the following list:		18
ARH 202	Medvl Art Ctcombs to Cthdrals	3
ARH 203	Renaissance Art & Architecture	3
ARH 204	Baroque Art and Architecture	3
ENG 301	Middle English Literature	3
ENG 302	Renaissance Non-dramatic Lit	3
ENG 303	Renaissance Drama	3
ENG 304	Global Shakespeares	3
ENG 401	Chaucer & the Medieval World	3
ENG 402	Shakespeare	3

ENG 403	Shakespeare and Race	3
ENG 404	Eng,Irish,Anglophone Authors	3
ENG 405	Early Tudor Gender Power & Lit	3
FRE 321	Love & Desire in Med Fr Lit	3
FRE 330	Medieval to Early Mod France	3
FRE 421	Love & Desire Med Fr Lit & Cul	3
FRE 422	Mkg Vces Hrd: FrWomWri MA &Ren	3
HIS 319	Reform/Rev in Europe 1500-1650	3
HIS 327	Early Modern Europe 1400-1800	3
HIS 329	Crime & Punishment in Europe	3
HIS 339	The Mongol Empire	3
HIS 348	Witches in Early Modern Europe	3
HON 316	Tragedy in Lit & Philosophy	3
IST 460	The Art of Dante's Inferno	3
ITA 306	The Roman Experience	3
ITA 315	Italy Through Art	3
ITA 380	Ita Journeys from Marco Polo	3
ITA 425	Italian Art and Artists	3
ITA 445	The Medici Court	3
MTF 157	Westrn Music Hist: MidAge-1750	3
PHL 360	Philosophy of God in Aquinas	3
PHL 410	Medieval Philosophy	3
PHL 409	Philosophy of St. Augustine	3
PHL 412	The Philosophy of Aquinas	3
REL 241	Islam	3
REL 343	Reason Science&Faith in Islam	3
THE 335	Gendr & Christian Spirituality	3
THE 349	Theology of Disability	3
THE 350	The Beauty of God	3

Music, Theatre and Film

Built on the praxis of analysis and creation, the Department of Music, Theatre & Film offers a wide range of courses in two major degree programs – the BA in Music (Music major or Music major with concentration in Music Therapy), and the BA in Theatre & Film (with a concentration in Theatre, Musical Theatre, or Film/TV). In addition, the Department offers stand-alone minors in Music, Theatre Studies, and Film/TV Studies, as well as being a partner department in the Music Industry minor. At the core of all degree programs are the shared values of historical insight, analytical rigor, technical proficiency, and creative expression.

Within each of its disciplines, the Department offers a breadth of courses that not only equip students with the tools to understand and evaluate an existing body of work, but also teach the necessary technical skills to bring their own work to fruition while fostering both creativity and engagement in the world around them. The curriculum aims to prepare students for careers in their respective fields or for further study at the graduate level, but perhaps more importantly, to give graduates a foundation of organizational, analytical, technical, and creative tools from which they might launch any future endeavor.

Faculty

Faculty and staff in the Department of Music, Theatre and Film hold accomplished roles as actors, musicians, directors, composers,

filmmakers and much more. Well established in their professions, they are dedicated to sharing their career experiences, knowledge and expertise with their students, offering important insights into the world of music, theatre and film.

Department of Music, Theatre & Film Faculty & Staff (<https://www.sju.edu/departments/mtf/faculty-staff/>)

Programs

Undergraduate Majors

- Music (p. 157)
- Theatre & Film (p. 159)

Undergraduate Minors

- Music (p. 159)
- Music Industry (p. 156)
- Film/TV (p. 156)
- Theatre Studies (p. 163)

Film and TV Minor

The Film and TV minor is a great option for students fascinated by cinema and television who have chosen to major in another discipline. The program values creative expression, analytical rigor, historical insight, and technical proficiency within a liberal arts format, providing tools that will help launch any future endeavor. Through required courses, students gain a foundation in digital filmmaking, screenwriting, and the cultural relevance and history of film and television, before moving on to upper level elective courses based on individual interest. To complete the film studies minor, students take six courses.

Learning Goals and Outcomes

Goal 1: Develop creativity and voice.

Outcome 1.1: Students will be able to create work that expresses their creativity and unique voices within the performing arts and film.

Goal 2: Interpret theatre and/or film in support of creative work.

Outcome 2.1: Students will be able to analyze important aspects of performing arts and film in written and oral work.

Goal 3: Study the intersections of performing arts and film with history and social practice.

Outcome 3.1: Students will be able to examine and analyze the relationships between theatre and/or film, history, and culture, orally and in writing.

Goal 4: Prepare students for entry into professional careers or graduate studies.

Outcome 4.1: Students will be able to demonstrate career preparation through experiential learning opportunities and individual projects that develop creative, technical, analytical, and/or problem-solving skills.

Requirements

Code	Title	Hours
MTF 191	Introduction to Film	3
MTF 282	Screenwriting	3
or MTF 283	Series Screenwriting	
MTF 284	Digital Filmmaking	3
MTF 285	Short Film Production	3
Two Film Electives from list:		6
MTF 181	Filmmaking Methods	
MTF 186	Acting for the Camera	
MTF 192	History of Narrative Film	
MTF 193	History of Television	
MTF 194	Black American Cinema	
MTF 195	Genre Film Studies	
MTF 281	Producing & Business of Film	
MTF 283	Series Screenwriting	
MTF 286	Documentary Film	
MTF 287	Commercial Production	
MTF 288	Genre Film Workshop	
MTF 291	American Film	
MTF 292	European Cinemas	
MTF 293	Five Films	
MTF 294	Non-Western World Cinemas	
MTF 295	Major Figures in Film	
MTF 381	Episodic Series Production	
MTF 382	Advanced Screenwriting	
MTF 384	Advanced Light, Camera, Design	
MTF 385	Sound Design	
MTF 386	Editing & Post-Production	
MTF 388	Documentary Workshop	
MTF 389	Professional Production Studio	
MTF 391	Film Theory & Criticism	
MTF 392	Special Topics in Film	
Total Hours		18

Music Industry Minor

The objective of the Minor in Music Industry is to meet a growing demand on the part of current and potential students for program of study in the music industry. The minor will allow students from both the College of Arts and Science and the Haub School of Business to gain and expand both theoretical and practical knowledge necessary for success in the music industry and it will be equally attractive to business students who need a greater understanding and appreciation of music to pursue careers in the music industry.

Requirements

Code	Title	Hours
MTF 151	Music Fundamentals ¹	3
MTF 251	Music Theory I	3
Choose one of the following:		3
MTF 142	History of Rock and Pop	
MTF 157	Western Music Hist: MidAge-1750	

MTF 158	Western Music Hist: 1750-Pres	
MTF 256	Intro to Music Technology	
MTF 257	American Music	
Required:		
MKT 341	Music Marketing	3
MKT 344	Business of Music and Entertai	3
Choose one course:		3
MKT 342	Music and Entertainment Law	
MKT 490	Internship in Marketing I	
or MTF 491	Internship	
MKT 493	Indep Study in Marketing	
or MTF 493	Indep Prj: Mus, Theat, Film I	
Total Hours		18

¹ If a student places out of MTF 151 with a score of 4 or 5 on the AP Music Theory Exam, they would enroll in MTF 251 Music Theory I and MTF 351 Music Theory II to meet this requirement.

Music Major

The music major at Saint Joseph's University provides a comprehensive curriculum that deepens musical understanding and awareness, fosters creative expression and encourages critical analysis and inquiry. It combines coursework in music theory, composition, history and performance.

Learning Goals and Outcomes

Goal 1: Perform, create, and compose music.

Objective 1.1: Students will perform and compose music that expresses their creativity and unique voices, showing an understanding of musical notation, technical skills, and musicianship.

Goal 2: Analyze music in support of interpretation and creative work.

Objective 2.1: Students will analyze important aspects of musical style, formal design, and melodic and harmonic structure, both in score and aurally.

Goal 3: Examine the intersections of music with history and social practice.

Objective 3.1: Students will study, analyze, and interrogate the relationships between music, history, and culture in speech and writing.

Goal 4: Prepare students for entry into professional careers or graduate studies.

Objective 4.1: Students will demonstrate career preparation through experiential learning opportunities and individual projects that develop creative, technical, analytical, and/or problem-solving skills.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Eleven courses plus four semesters of performance.

Code	Title	Hours
Music Theory Core		
MTF 151	Music Fundamentals ¹	3
MTF 251	Music Theory I	3
MTF 351	Music Theory II	3
Music History Core		
MTF 157	Westrn Music Hist: MidAge-1750	3
MTF 158	Western Music Hist: 1750-Pres	3
MTF 156 or MTF 257	Intro to World Music American Music	3
Music Theory Upper Level		
MTF 252 or MTF 357	Music Composition I Music Theory III	3
Music History Upper Level		
MTF 370	Special Topics	3
Music Capstone		
MTF 496	Senior Project	3
Performance		
Four semesters ²		
Music Electives		
Select two of the following:		6
MTF 142	History of Rock and Pop	
MTF 143	Music in Film	
MTF 144	Introduction to Music Therapy	
MTF 156	Intro to World Music (if not selected above)	
MTF 159	Contemporary Music	
MTF 162	History of Broadway Musical	
MTF 241	Basic Conducting	
MTF 252	Music Composition I (if not selected above)	
MTF 253	Choral Music	
MTF 254	Jazz in Performance	
MTF 256	Intro to Music Technology	
MTF 257	American Music (if not selected above)	
MTF 258	Major Composers	
MTF 268	Musical Theatre Performance	
MTF 352	Music Composition II	
MTF 353	Advanced Vocal Performance	
MTF 354	Advanced Piano Performance	
MTF 355	Adv Ensemble Performance	
MTF 357	Music Theory III (if not selected above)	
MTF 359	Adv Instrumental Performance	
MTF 370	Special Topics	

¹ If a student places out of Music Fundamentals, this requirement is met by taking Music Theory I, II, and III.

² A combination of four semesters of participation in a department-sponsored performance ensemble or private studio.
Ensembles include: Jazz Ensemble, University Singers, Concert Choir, Chamber Music
Private Studios include: Guitar, Piano, Strings, Brass, and Voice

Free Electives

Ten to twelve to courses, depending on how many required courses in variable core and choice of concentration. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Concentration Option
Music Therapy Concentration

Eleven courses plus ten credits of lessons.

Code	Title	Hours
Music Theory Core		
MTF 151	Music Fundamentals ¹	3
MTF 251	Music Theory I	3
MTF 351	Music Theory II	3
Music History Core		
MTF 157	Westrn Music Hist: MidAge-1750	3
MTF 158	Western Music Hist: 1750-Pres	3
MTF 156 or MTF 257	Intro to World Music American Music	3
Music Theory Upper Level		
MTF 252 or MTF 357	Music Composition I Music Theory III	3
Music History Upper Level		
MTF 370	Special Topics	3
Music Therapy Capstone		
MTF 495	Senior Project Development	3
MTF 496	Senior Project	3
Music Electives		
MTF 144	Introduction to Music Therapy	3
Performance		
Six semesters of voice lessons.		
Two semesters of piano lessons.		
Two semesters of guitar lessons.		

¹ If a student places out of Music Fundamentals, this requirement is met by taking Music Theory I, II, and III.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
MTF 151 or MTF 251	Music Fundamentals or Music Theory I	3
Theology		3
ENG 101	Craft of Language	3

INT 151	Inequality in American Society	1
Philosophy Level One		3
Non-Native Language		3-4
Hours		16-17
Spring		
MTF 251 or MTF 351	Music Theory I or Music Theory II	3
Literature		3
World History		3
Diversity		3
Philosophy Level Two		3
Performance #1		1
Hours		16
Sophomore		
Fall		
MTF 157	Westrn Music Hist: MidAge-1750	3
MTF Music Elective #1		3
Mathematics		3-4
Religious Studies		3
Free Elective		3
Performance #2		1
Hours		16-17
Spring		
MTF 158	Western Music Hist: 1750-Pres	3
MTF 351 or MTF 357	Music Theory II or Music Theory III	3
Fine & Performing Arts, Design & Creativity		3
Natural Science		3-4
Free Elective		3
Performance #3		1
Hours		16-17
Junior		
Fall		
MTF 357 or MTF 252	Music Theory III or Music Composition I	3
MTF 257 or MTF 156	American Music or Intro to World Music	3
Free Electives		9
Performance #4		1
Hours		16
Spring		
MTF 370	Special Topics	3
Social Science		3
MTF Music Elective #2		3
Free Electives		6
Hours		15
Senior		
Fall		
Major Elective		3
Free Electives		12
Hours		15
Spring		
MTF 496	Senior Project	3
Free Electives		12
Hours		15
Total Hours		125-128

Music Minor

Overview

The minor in Music will deepen your understanding of and appreciation for music. Saint Joseph's music faculty members are accomplished, award-winning professionals whose goal is to provide you with an excellent, personalized education.

The curriculum offers students majoring in another discipline the opportunity to explore their interest in music in a number of dynamic courses that cover music theory, composition, history and culture, and performance in a department-sponsored performance ensemble or private studio.

In addition to MTF 251 Music Theory I, students take five music courses to complete the minor, plus one semester of performance.

Learning Goals and Outcomes

Goal 1: Perform, create, and compose music.

Objective 1.1: Students will perform and compose music that expresses their creativity and unique voices, showing an understanding of musical notation, technical skills, and musicianship.

Goal 2: Analyze music in support of interpretation and creative work.

Objective 2.1: Students will analyze important aspects of musical style, formal design, and melodic and harmonic structure, both in score and aurally.

Goal 3: Examine the intersections of music with history and social practice.

Objective 3.1: Students will study, analyze, and interrogate the relationships between music, history, and culture in speech and writing.

Goal 4: Prepare students for entry into professional careers or graduate studies.

Objective 4.1: Students will demonstrate career preparation through experiential learning opportunities and individual projects that develop creative, technical, analytical, and/or problem-solving skills.

Requirements

The minor requires six courses plus one semester of performance.

Code	Title	Hours
MTF 251	Music Theory I	3
Select five additional Music courses from the offerings in Music Theory, Composition, History and Culture, and Advanced Performance.		15

Required: one semester participation in a department-sponsored performance ensemble or private studio.

Theatre & Film Major

The theatre and film major at Saint Joseph's University nurtures creative expression and technical proficiency while fostering intellectual curiosity

and cultural awareness. Students declare a concentration in film/TV, musical theatre or theatre.

Learning Goals and Outcomes

Goal 1: Develop creativity and voice.

Outcome 1.1: Students will be able to create work that expresses their creativity and unique voices within the performing arts and film.

Goal 2: Interpret theatre and/or film in support of creative work.

Outcome 2.1: Students will be able to analyze important aspects of performing arts and film in written and oral work.

Goal 3: Study the intersections of performing arts and film with history and social practice.

Outcome 3.1: Students will be able to examine and analyze the relationships between theatre and/or film, history, and culture, orally and in writing.

Goal 4: Prepare students for entry into professional careers or graduate studies.

Outcome 4.1: Students will be able to demonstrate career preparation through experiential learning opportunities and individual projects that develop creative, technical, analytical, and/or problem-solving skills.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		

A student’s Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student’s Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
3-4		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
3		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
3		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Major Requirements

Code	Title	Hours
Core Courses:		
MTF 161	Introduction to Theatre	3
or MTF 162	History of Broadway Musical	
or MTF 191	Introduction to Film	
MTF 263	Acting I ¹	3
MTF 284	Digital Filmmaking	3
MTF 496	Senior Project ²	3

Concentration Options

Code	Title	Hours
Theatre Concentration:		
MTF 163	Stagecraft	3
or MTF 267	Prod Design: Theatre & Film	

MTF 261	Theatre Performance Practicum	3
or MTF 262	Theatre Production Practicum	
MTF 264	Acting II	3
MTF 265	Directing for the Stage	3
MTF 266	Theatre History	3
MTF 363	Styles of Acting	3
Total Hours		18

Code	Title	Hours
Musical Theatre Concentration		
MTF 151	Music Fundamentals	3
MTF 251	Music Theory I	3
MTF 261	Theatre Performance Practicum	3
MTF 264	Acting II	3
or MTF 363	Styles of Acting	
MTF 268	Musical Theatre Performance	3
MTF 269	Musical Theatre Dance Styles	3
Total Hours		18

Code	Title	Hours
Film/TV Concentration		
MTF 192	History of Narrative Film	3
MTF 282	Screenwriting	3
or MTF 283	Series Screenwriting	
MTF 285	Short Film Production	3
MTF 381	Episodic Series Production	3
MTF 383	Directing for Film/TV	3
Choose one		3
MTF 181	Filmmaking Methods	
MTF 186	Acting for the Camera	
MTF 281	Producing & Business of Film	
MTF 283	Series Screenwriting	
MTF 287	Commercial Production	
MTF 288	Genre Film Workshop	
MTF 382	Advanced Screenwriting	
MTF 384	Advanced Light, Camera, Design	
MTF 385	Sound Design	
MTF 386	Editing & Post-Production	
MTF 388	Documentary Workshop	
MTF 389	Professional Production Studio	
MTF 193	History of Television	
MTF 194	Black American Cinema	
MTF 195	Genre Film Studies	
MTF 291	American Film	
MTF 292	European Cinemas	
MTF 293	Five Films	
MTF 294	Non-Western World Cinemas	
MTF 295	Major Figures in Film	
MTF 391	Film Theory & Criticism	
MTF 392	Special Topics in Film	
Total Hours		18

¹ MTF 263 Acting I may be replaced by MTF 163 Stagecraft, MTF 265 Directing for the Stage, or MTF 267 Prod Design: Theatre & Film for Film/TV concentration.

² If a student will be writing a Thesis for their Senior Project, they are required to take MTF 391 Film Theory and Criticism; if they will be writing a feature screenplay, they are required to take MTF 382 Advanced Screenwriting.

Free Electives

11-13 courses, depending on how many required courses in variable core and choice of major concentration. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence Theatre and Film with Musical Theatre Concentration

Course	Title	Hours
First Year		
Fall		
Theology		3
ENG 101	Craft of Language	3
Non-Native Language		3-4
Philosophy Level One		3
Intro MTF Course		3
INT 151	Inequality in American Society	1
Hours		16-17
Spring		
Literature		3
World History		3
Philosophy Level Two		3
Diversity		3
MTF 263	Acting I	3
Hours		15
Sophomore		
Fall		
Mathematics		3-4
Free Elective		3
Religious Studies		3
MTF 284	Digital Filmmaking	3
MTF 151	Music Fundamentals	3
Hours		15-16
Spring		
Fine & Performing Arts, Design & Creativity		3
Free Elective		3
Natural Science		3-4
MTF 261	Theatre Performance Practicum	3
MTF 251	Music Theory I	3
Hours		15-16
Junior		
Fall		
Electives or overlays		9
Free Elective		3
MTF 268	Musical Theatre Performance	3
Hours		15
Spring		
Social Science		3
Electives or overlays		6

Free Elective		3
MTF 269	Musical Theatre Dance Styles	3
Hours		15
Senior		
Fall		
Additional Acting Course		3
Free Electives		12
Hours		15
Spring		
MTF 496	Senior Project	3
Free Electives		12
Hours		15
Total Hours		121-124

Theatre and Film with Theatre Concentration

Course	Title	Hours
First Year		
Fall		
Theology		3
ENG 101	Craft of Language	3
Non-Native Language		3-4
Philosophy Level One		3
Intro MTF Course		3
INT 151	Inequality in American Society	1
Hours		16-17
Spring		
Literature		3
World History		3
Philosophy Level Two		3
Diversity		3
MTF 263	Acting I	3
Hours		15
Sophomore		
Fall		
Mathematics		3-4
Free Elective		3
Religious Studies		3
MTF 284	Digital Filmmaking	3
MTF 264	Acting II	3
Hours		15-16
Spring		
Fine & Performing Arts, Design & Creativity		3
Free Elective		3
Natural Science		3-4
Practicum		3
MTF 265	Directing for the Stage	3
Hours		15-16
Junior		
Fall		
Electives or overlays		9
Free Elective		3
MTF 266	Theatre History	3
Hours		15
Spring		
Social Science		3
Electives or overlays		6
Free Elective		3
MTF 267	Prod Design: Theatre & Film	3
Hours		15

Senior		
Fall		
MTF 363	Styles of Acting	3
Free Electives		12
Hours		15
Spring		
MTF 496	Senior Project	3
Free Electives		12
Hours		15
Total Hours		121-124

Theatre and Film with Film/TV Concentration

Course	Title	Hours
First Year		
Fall		
Theology		3
ENG 101	Craft of Language	3
Non-Native Language		3-4
Philosophy Level One		3
Intro MTF Course		3
INT 151	Inequality in American Society	1
Hours		16-17
Spring		
Literature		3
World History		3
Philosophy Level Two		3
Diversity		3
MTF 284	Digital Filmmaking	3
Hours		15
Sophomore		
Fall		
Mathematics		3-4
Free Elective		3
Religious Studies		3
MTF 192	History of Narrative Film	3
Screenwriting Course		3
Hours		15-16
Spring		
Fine & Performing Arts, Design & Creativity		3
Free Elective		3
Natural Science		3-4
Practicum		3
MTF 285	Short Film Production	3
Hours		15-16
Junior		
Fall		
Electives or overlays		9
Free Elective		3
MTF 263	Acting I	3
Hours		15
Spring		
Social Science		3
Electives or overlays		6
Free Elective		3
MTF 285	Short Film Production	3
Hours		15
Senior		
Fall		
Free Electives		12

MTF 381	Episodic Series Production	3
Hours		15
Spring		
MTF 496	Senior Project	3
Free Electives		12
Hours		15
Total Hours		121-124

Theatre Studies Minor Overview

The Theatre Studies minor offers students who have chosen to major in another discipline the opportunity to explore their interest in theatre. With its unique focus on analysis, creativity and organization, the minor develops skills that are valuable in any endeavor. Encompassing six courses in total, the curriculum provides a cultural and historical understanding of the art form and allows students to make discoveries about their individual interests and talents. Within the context of a liberal arts education, the minor engages students of all levels – from beginner to those with experience – in a broad range of coursework that embraces acting, musical theatre performance, directing and an introduction to stage and lighting design. Additionally, production and performance opportunities are available to all students during the academic year through the SJU Theatre Company.

Learning Goals and Outcomes

Goal 1: Develop creativity and voice.

Outcome 1.1: Students will be able to create work that expresses their creativity and unique voices within the performing arts and film.

Goal 2: Interpret theatre and/or film in support of creative work.

Outcome 2.1: Students will be able to analyze important aspects of performing arts and film in written and oral work.

Goal 3: Study the intersections of performing arts and film with history and social practice.

Outcome 3.1: Students will be able to examine and analyze the relationships between theatre and/or film, history, and culture, orally and in writing.

Goal 4: Prepare students for entry into professional careers or graduate studies.

Outcome 4.1: Students will be able to demonstrate career preparation through experiential learning opportunities and individual projects that develop creative, technical, analytical, and/or problem-solving skills.

Requirements

Code	Title	Hours
MTF 161	Introduction to Theatre	3
MTF 263	Acting I	3
MTF 265	Directing for the Stage	3
Select three (3) other MTF Theatre courses for electives.		9
Total Hours		18

Neuroscience

Neuroscience is a major and minor that focuses on the study of the brain and nervous system. The interdisciplinary nature of neuroscience requires familiarity with multiple disciplines, including biology, chemistry, computational science, physics, and psychology. As a result, courses and laboratory experiences emphasize behavioral, cellular, molecular, cognitive, computational, pharmacological, and biophysical approaches.

Faculty Co-Directors

Dr. Stephen Moelter (Psychology)

Dr. C. Nicole Sunnen (Biology)

Faculty Advisory Board

C. Nicole Sunnen, PhD, Co-Director Biology

Stephen Moelter, PhD, Co-Director Psychology

Adejare Adeboye, PhD Pharmacology and Toxicology

Elia Eschenazi, PhD Physics

Gregory Theilman, DPT, Physical Therapy

Joseph McCleery, PhD Psychology

Affiliated Faculty

Affiliated faculty have demonstrated a commitment to the program by teaching required or elective courses in the major or mentoring students in their laboratories.

- Adejare Adeboye, PhD Pharmacology and Toxicology
- Elia Eschenazi, PhD Physics
- Joseph McCleery, PhD, Psychology
- Kenneth Myers, PhD, Biology
- Stephen Moelter, PhD, Psychology
- Margie Roos, DPT, Physical Therapy
- Nikki Sunnen, PhD, Co-Director Biology
- Shanaz Tejani, PhD, Pharmacology and Toxicology
- Gregory Theilman, DPT, Physical Therapy
- Jennifer Tudor, PhD, Biology
- Jason Wallach, PhD, Pharmacology & Toxicology

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Neuroscience Major

The interdisciplinary nature of the neuroscience major requires familiarity with multiple disciplines. The curriculum begins with foundational

science and mathematics courses in biology, chemistry, physics, and calculus and an orientation course in neuroscience that serves as a common starting point.

In the second and third year, students begin to complete a series of core neuroscience courses that provide majors with a deep understanding of how the components of the nervous system work together to coordinate physiological and cognitive functions and how changes in regulation can impact thought and action. Neuroscience students add breadth to their major by exploring electives within multiple fields of study (e.g., biology, computer science, data science, pharmacology, physics, psychology), that extend disciplinary boundaries and provide opportunities to explore areas of interest. A series of introductory and advanced research core courses, labs, and elective experiences “cap” the program, enabling students to demonstrate expertise with techniques and topics.

Learning Goals and Outcomes

Goal 1: Knowledge Base: Students will demonstrate familiarity with the major concepts, theoretical perspectives, empirical findings, and historical trends in neuroscience from an integrated, interdisciplinary perspective.

Outcome 1.1: Students will identify, define, and/or explain the foundational content and core concepts in neuroscience, drawing from multiple and integrated disciplines.

Goal 2: Scientific Reasoning: Students will demonstrate the ability to use scientific reasoning to systematically explore ideas, issues, objects or works.

Outcome 2.1: Students will analyze and/or interpret data and scientific literature, form testable hypotheses, and/or design scientific experiments.

Outcome 2.2: Students will be able to apply their knowledge and skills to problems in neuroscience.

Goal 3: Communication: Students will demonstrate the ability to communicate scientific information in a variety of formats.

Outcome 3.1: Students will be able to articulate concepts related to the discipline visually, orally, and/or through written formats.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
	Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
	Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Social Science		
PSY 100	Introductory Psychology	
PSY 101	Intro Psychology Seminar	

Major Requirements

Code	Title	Hours
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
Mathematics (will count as CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Fundamental Requirements		23
NSC 190	Neuroscience Orientation	
CHM 125	General Chemistry II	
CHM 125L	General Chemistry Lab II	
PHY 102	General Physics II	
PHY 102L	General Physics Laboratory II	
BIO 201	Bio III: Organismic Biology	
BIO 201L	Bio III: Organismic Biol Lab	
NSC 205	Introduction to Neuroscience	
or BIO 412	Neurobiology	
NSC 206	Intro. to Neuroscience II	
NSC 491	Neuroscience Capstone	
Statistics Course (choose one):		
MAT 128	Applied Statistics	
MAT 148	Applied Statistics Plus	
MAT 322	Mathematical Statistics	
PSY 211	Stats for the Social Sciences	
12 Credits of Core Courses Required		12
Research/Experiential Requirement: Select 2 courses from Group A or 3 credits from Group B		
Group A: Research-Intensive Core Courses		
BIO 401 & 401L	Animal Behavior and Animal Behavior Lab	
BIO 430 & 430L	Neurological Disorders and Neurological Disorders Lab	
PHY/NSC 425	Biophysics of the Brain	
PSY 222	Neuropsychology	
Group B: Internship, Independent Research, or Independent Study		
NSC 394	Independent Study I	
NSC 395	Independent Study II	
NSC 492	Neuroscience Internship	
NSC 493	Neuroscience Internship II	
NSC 494	Undergraduate Research	
NSC 495	Undergraduate Research II	
Core Electives (variable depending on number of Research Intensive courses completed)		
NSC 270	Special Topics in Neuroscience	
NSC 370	Special Topics in Neuroscience	
NSC 470	Special Topics in Neuroscience	
BIO 401 & 401L	Animal Behavior and Animal Behavior Lab	
BIO 430 & 430L	Neurological Disorders and Neurological Disorders Lab	
LIN 325	Tour of the Brain	
PHT/NSC 340	Intro Neuropsychopharmacology	

PHT 407	Tox Subst Use Disorder (Appld)	
PHT 440	Drug Disc Neurodegenerative	
PHY/NSC 425	Biophysics of the Brain	
PSY 209	Autism:Co-Occurring Conditions	
PSY 222	Neuropsychology	
PSY 241	Brain Injury and Concussion	
Track Electives (select five courses, at least one from each area)		15
Clinical Health (select at least one)		
EPH 205	Mind & Muscle:Science of Succe	
EPH 271	Motor Learning	
EPH 301	Exercise Physiology	
EPH 340	Exercise Psychology	
EPH 380	Introduction to Kinesiology	
or HSC 348	Foundations of Kinesiology	
EPH 387	Biomechanics	
LIN 325	Tour of the Brain	
PSY 220	Sensation and Perception	
PSY 209	Autism:Co-Occurring Conditions	
PSY 220	Sensation and Perception	
PSY 221	Animal Learning and Memory	
PSY 222	Neuropsychology	
PSY 223	Health Psychology	
PSY 224	Drugs, the Brain, & Behavior	
PSY 225	Comparative Animal Behavior	
PSY 226	Psychology of Emotion	
PSY 227	Cognitive Psychology	
PSY 228	Science of Creativity	
PSY 232	Adv. Psychological Disorders	
PSY 260	Primate Psychology	
Molecular & Medicinal (select at least one)		
BIO 401 & 401L	Animal Behavior and Animal Behavior Lab	
BIO 402 & 402L	Advanced Cell Biology and Advanced Cell Biology Lab	
BIO 417 & 417L	Systemic Physiology and Systemic Physiology Lab	
or BIO 260	Anat&Physiol for AI Hlth I	
BIO 420 & 420L	Bioinformatics and Bioinformatics Lab	
BIO 424 & 424L	Biotechnology and Biotechnology Lab	
BIO 427 & 427L	Human Genetics and Human Genetics Lab	
or BIO 411	Molecular Genetics	
BIO 428 & 428L	Histopathology and Histopathology Lab	
BIO 430 & 430L	Neurological Disorders and Neurological Disorders Lab	
CHM 340 & 340L	Biochemistry and Biochemistry Lab	
or BIO 404	Biochemistry	
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	
PHT/NSC 340	Intro Neuropsychopharmacology	

PHT 407	Tox Subst Use Disorder (Appld)
PHT 440	Drug Disc Neurodegenerative
Computational & Theoretical (select at least one)	
CSC 115	Intro to Computer Science
or CSC 120	Computer Science I
or CSC 133	Python Programming for All
CSC 116	Comp'I Thinking & Data Sci
CSC 121	Computer Science II
CSC 132	Artificial Intellig for All
or CSC 362	Artificial Intelligence
CSC 201	Data Structures
DSC 223	Intro Math of Data Science
DSC 325	Essentials of Data Science
DSC 326	Advanced Data Science
DSC 424	Regression and Time Series
DSC 425	Machine Learning/Data Science
PHY 332	Intro. to Network Science
MAT 321	Probability
PHL 272	Human Intelligence
PHL 288	Minds & Souls
PHL 286	Philosophy of Mental Illness
PHL 287	Philo Artificial Intelligence
PHL 322	Philosophy of Science
PHL 361	Vision, Experience Faith
PHL 473	Philosophy of Mind
PHY 331	Nonlinear Dynamics and Chaos
PHY 332	Intro. to Network Science
PHY 419	Biophysics
PHY/NSC 425	Biophysics of the Brain
Total Hours	
57-58	

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
or BIO 150L	or Bio I: Cells Lab Phage	
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
ENG 101	Craft of Language	3
MAT 120	Precalculus	3
or MAT 155	or Fundamentals of Calculus	
or MAT 161	or Calculus I	
NSC 190	Neuroscience Orientation	1
Hours		15
Spring		
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
or BIO 151L	or Phage Lab	
CHM 125	General Chemistry II	3

CHM 125L	General Chemistry Lab II	1
ENG 101	Craft of Language (or World History)	3
MAT 155	Fundamentals of Calculus	3
or MAT 161	or Calculus I	
INT 151	Inequality in American Society	1
Hours		15
Sophomore		
Fall		
PHY 101	General Physics I	3
PHY 101L	General Physics Laboratory I	1
NSC 205	Introduction to Neuroscience	3
BIO 201	Bio III: Organismic Biology	4
BIO 201L	Bio III: Organismic Biol Lab	0
PSY 100	Introductory Psychology	3
or PSY 101	or Intro Psychology Seminar	
Free Elective		3
Hours		17
Spring		
PHY 102	General Physics II	3
PHY 102L	General Physics Laboratory II	1
NSC 206	Intro. to Neuroscience II	3
Statistics Course		3
Major Elective		3-4
Free Elective		3
Hours		16-17
Junior		
Fall		
Research/Experiential Requirement		3-4
Major Electives		6-8
Free Electives		6
Hours		15-18
Spring		
Research/Experiential Requirement		3-4
Major Electives		6-8
Free Electives		6
Hours		15-18
Senior		
Fall		
Major Electives		6-8
Free Electives		6
Hours		12-14
Spring		
NSC 491	Neuroscience Capstone	1
Major Electives		3-4
Free Electives		9
Hours		13-14
Total Hours		118-128

Neuroscience Minor

The interdisciplinary nature of neuroscience requires familiarity with components of biology and psychology among other disciplines. A minor in neuroscience will provide an understanding of how different components of the nervous system work together to coordinate physiological, physical, and cognitive functions. Students will gain an appreciation of this complex system and how changes in regulation can impact thoughts and actions.

Requirements

Students complete the Neuroscience minor with six courses: two required courses and four electives.

To ensure the interdisciplinary nature of the program, students wishing to complete the minor must select elective courses such that:

- no more than two of the four courses can be offered by the same department (including cross-listed courses)
- elective courses must be offered by at least one participating department other than a major department

With permission of the Neuroscience Program Director, students can count one semester of appropriate research toward the minor (as an elective).

Students may request to receive credit for courses not listed here. The determination of the appropriateness of courses for inclusion in the minor will be made only if the student's work in the class meets one or more of the following criteria:

- Coursework includes a substantive treatment of brain/behavior relationships.
- Coursework includes a substantive treatment of methodology, techniques, and approaches relevant to neuroscience.
- Coursework in other ways contributes to an understanding of the relationship between the nervous system and behavior or other issues typically addressed by neuroscientists.

Code	Title	Hours
Required Courses		6
NSC 205 or BIO 412	Introduction to Neuroscience Neurobiology	
NSC 206	Intro. to Neuroscience II	
Four elective courses from at least two different disciplines. No more than two of four total elective courses from any one discipline.		12
BIO 401 & 401L	Animal Behavior and Animal Behavior Lab	
BIO 402 & 402L	Advanced Cell Biology and Advanced Cell Biology Lab	
BIO 404 or CHM 340	Biochemistry Biochemistry	
BIO 411 & 411L or BIO 427	Molecular Genetics and Molecular Genetics Lab Human Genetics	
BIO 417 & 417L or BIO 260 or BIO 310	Systemic Physiology and Systemic Physiology Lab Anat&Physiol for AI Hlth I Anatomy and Physiology I	
BIO 420 & 420L	Bioinformatics and Bioinformatics Lab	
BIO 424 & 424L	Biotechnology and Biotechnology Lab	
BIO 428 & 428L	Histopathology and Histopathology Lab	
BIO 430 & 430L	Neurological Disorders and Neurological Disorders Lab	
CSC 115	Intro to Computer Science	

or CSC 120	Computer Science I
CSC 116	Comp'l Thinking & Data Sci
CSC 121	Computer Science II
CSC 132 or CSC 362	Artificial Intellig for All Artificial Intelligence
CSC 201	Data Structures
DSC 223	Intro Math of Data Science
DSC 325	Essentials of Data Science
DSC 326	Advanced Data Science
DSC 424	Regression and Time Series
DSC 425	Machine Learning/Data Science
EPH 205	Mind & Muscle:Science of Succe
EPH 271	Motor Learning
EPH 301	Exercise Physiology
EPH 340	Exercise Psychology
EPH 380 or HSC 348	Introduction to Kinesiology Foundations of Kinesiology
EPH 387	Biomechanics
LIN 325	Tour of the Brain
LIN/PSY 261	Psycholinguistics
MAT 128	Applied Statistics
MAT 148	Applied Statistics Plus
MAT 238	Differential Equations
MAT 304	Statistics for Research
MAT 321	Probability
MAT 322	Mathematical Statistics
NSC 170	Special Topics in Neuroscience
NSC 270	Special Topics in Neuroscience
NSC 394	Independent Study I
NSC 395	Independent Study II
NSC 370	Special Topics in Neuroscience
NSC 470	Special Topics in Neuroscience
NSC 492	Neuroscience Internship
NSC 493	Neuroscience Internship II
NSC 494	Undergraduate Research
NSC 495	Undergraduate Research II
PHL 272	Human Intelligence
PHL 286	Philosophy of Mental Illness
PHL 287	Philo Artificial Intelligence
PHL 288	Minds & Souls
PHL 322	Philosophy of Science
PHL 361	Vision, Experience Faith
PHL 473	Philosophy of Mind
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab
PHT/NSC 340	Intro Neuropsychopharmacology
PHT 407	Tox Subst Use Disorder (Appld)
PHT 440	Drug Disc Neurodegenerative
PHY 331	Nonlinear Dynamics and Chaos
PHY 332	Intro. to Network Science
PHY 419	Biophysics
PHY/NSC 425	Biophysics of the Brain

PSY 209	Autism:Co-Occurring Conditions
PSY 220	Sensation and Perception
PSY 221	Animal Learning and Memory
PSY 222	Neuropsychology
PSY 223	Health Psychology
PSY 224	Drugs, the Brain, & Behavior
PSY 225	Comparative Animal Behavior
PSY 226	Psychology of Emotion
PSY 227	Cognitive Psychology
PSY 228	Science of Creativity
PSY 232	Adv. Psychological Disorders
PSY 260	Primate Psychology

Total Hours

18

Philosophy

At its core, philosophy promotes inquiry aimed at understanding and truth. It raises questions concerning topics such as the nature of morality and justice, persons, God and religious belief, beauty, knowledge, science, reason, and reality. It seeks to answer such questions by critically examining arguments from a range of diverse perspectives informed by both historical and contemporary ideas. Inquiry also promotes agency. People familiar with the philosophical practice of giving and asking for reasons are able to recognize and evaluate evidence, to identify assumptions, to appreciate both the scope and limits of their knowledge, and to make better decisions. They are thereby better able to engage in the complex task of becoming people for and with others. The philosophy department encourages inquiry and promotes agency in a deliberately diverse and inclusive, student-centered moral and intellectual community.

Faculty

Members of the Philosophy Department are active researchers and committed teachers. Our areas of scholarly expertise inform our teaching, inviting students to participate in on-going inquiry into and critical reflection on important topics in the discipline. We specialize in a wide range of areas including but not limited to social and political philosophy, various periods in the history of philosophy, epistemology, metaphysics, feminist philosophy, the philosophy of religion. Our faculty have published in the most prestigious journals in their fields and some have monographs with Oxford University Press and other outstanding venues.

Department of Philosophy Faculty & Staff (<https://www.sju.edu/departments/philosophy/faculty-staff/>)

Programs

Undergraduate Major

- Philosophy (p. 168)

Undergraduate Minor

- Philosophy (p. 170)

Philosophy Major

Majoring in philosophy is a time-honored way of gaining a liberal arts education, i.e., an education fitting for a person who would be free. Philosophy majors at Saint Joseph's University will have an opportunity

to read some of the most profound and challenging works ever written. In the classroom they will partake in lively discussions of life-changing ideas. Majors will develop their capacity to think clearly and creatively, to argue logically and express their thoughts persuasively, to criticize rationally and converse openly, to uncover assumptions and recognize implications and to raise those important questions that are often overlooked.

As a deliberately pluralistic department possessing expertise across a broad range of philosophical traditions and methods, we are able to offer courses across all major historical periods (i.e., ancient, medieval, modern, contemporary) and areas of field specialization (e.g., epistemology, metaphysics, language, religion, ethics, and social and political philosophy). Majors are challenged to grapple with perennial philosophical problems (e.g., free will, skepticism, objectivity, the nature and existence of God) and are introduced to methods of inquiry that allow for the development and appropriation of philosophical modes of thinking, speaking, and writing. An active Undergraduate Philosophy Society provides a forum for gathering with other students also genuinely interested in philosophy, and provides an excellent opportunity for student-faculty dialogue outside the classroom.

Learning Goals and Outcomes

Goal 1: Students will understand arguments in philosophy

Outcome 1.1: Students will be able to assess and construct arguments in philosophy

Goal 2: Students will demonstrate knowledge of logic

Outcome 2.1: Students will be able to assess arguments by applying basic logical concepts, such as validity, soundness, strength, and cogency

Goal 3: Students will be able to assess arguments by applying basic logical concepts, such as validity, soundness, strength, and cogency

Outcome 3.1: Students will be able to critically evaluate some of the main ideas, problems, theories, or schools of thought from the main periods of Western philosophy

Goal 4: Students will learn the skills required for engaging in philosophy as a specialized academic discipline

Outcome 4.1: Students will write an advanced research paper or project that (1) analyzes a particular philosophical problem, area, or text; and (2) generates a specialized discussion of that problem, area, or text

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
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Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
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Religious Studies	3
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Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
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INT 151	Inequality in American Society	1
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Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
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Natural Science	4
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Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Major Requirements

8 courses:

1. Logic or Symbolic Logic
2. History course: Ancient/Pre-Modern
3. History course: Modern/Contemporary
4. PHL elective course
5. PHL elective course
6. PHL elective
7. PHL 495 Senior Seminar or Junior Seminar
8. PHL elective Course

Philosophy majors have the option of pursuing one of five tracks (p.):

1. History of Philosophy;
2. Social-Political/Philosophy of Law;
3. Mind, Language, Science;
4. Philosophy of Religion; and .
5. Arts and Humanities

Free Electives

14-18 courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Philosophy Level One		3
ENG 101	Craft of Language	3
Mathematics		3-4
Social Science		3
Non-Native Language		3-4
Hours		15-17
Spring		
Philosophy Level Two		3
World History		3
Theology		3
INT 151	Inequality in American Society	1
Free Electives		6
Hours		16
Sophomore		
Fall		
PHL Logic		3
PHL History Ancient/Pre-Modern		3
Diversity		3
Literature		3
Free Elective		3
Hours		15
Spring		
PHL History Modern/Contemporary		
Religious Studies		3
Natural Science		4
Writing Intensive Overlay		3
Free Elective		3
Hours		13

Junior		
Fall		
PHL Electives		6
Fine, Performing Arts, Design & Creativity		3
Mission-Specific Overlay		3
Free Elective		3
Hours		15
Spring		
PHL Electives		6
PHL 495	Philosophy Seminar	3
Free Electives		6
Hours		15
Senior		
Fall		
PHL Elective		3
Free Electives		12
Hours		15
Spring		
PHL elective		3
PHL 495	Philosophy Seminar	3
Free Electives		9
Hours		15
Total Hours		119-121

Philosophy Minor

Learning Goals and Outcomes

Goal 1: Students will develop the skills of identifying, analyzing, evaluating, and constructing philosophical arguments

Outcome 1.1: Students will be able to recognize arguments that appear in written texts by identifying philosophical conclusions and the premises that support them

Outcome 1.2: Students will be able to evaluate the premises of arguments

Outcome 1.3: Students will be able to construct arguments in order to express philosophical ideas both orally and in writing

Goal 2: Students will demonstrate knowledge of logic (at a level appropriate for undergraduate majors)

Outcome 2.1: Students will recognize basic deductive and inductive argument forms as well as different types of informal fallacies

Outcome 2.2: Students will be able to apply basic logical concepts, such as validity and soundness and strength and cogency, in their evaluation of arguments

Goal 3: Students will gain an appreciation for the history of philosophy, including major figures and texts

Outcome 3.1: Students will be able to explain (in writing, or through oral communication, or on examinations) some of the main ideas, problems, theories, methodologies, or schools of thought from the ancient or medieval periods of Western philosophy

Outcome 3.2: Students should be able to explain (in writing, or through oral communication, or on examinations) some of the ideas, problems, theories, methodologies, or schools of thought from the modern or contemporary periods of Western philosophy

Goal 4: Students will display, at a level appropriate for undergraduate majors, the skills required for engaging in philosophy as a specialized academic discipline

Outcome 4.1: Students will successfully complete an advanced, seminar-style class which features the construction and evaluation of arguments for specific philosophic positions and a focused examination of a particular philosophical problem(s), area, or text

Outcome 4.2: Students will complete a final paper or research project, typically in the context of completing an advanced, seminar-style class

Requirements

Students seeking to complete a minor in philosophy must take the two philosophy courses required in the CCC:

Code	Title	Hours
PHL (varied)	First Level Philosophy	3
PHL (varied)	Second Level Philosophy	3
Select four more philosophy courses		12
Total Hours		18

Physics

The Department of Physics of Saint Joseph's University offers students comprehensive and flexible curricula in Physics and Engineering Physics. These programs prepare the students in multiple choice careers in many different areas.

The Department of Physics at Saint Joseph's University has developed a research-oriented culture for both its faculty and students. Most students will engage in research, alongside faculty mentors, at some point during their four years. The ability to put into practice what is learned in the classroom is paramount to the growth of the scientist and the professional. In the research laboratory, the student will learn to design and perform experiments, to analyze data using computational methods, and draw appropriate conclusions. Students will also be exposed to the interfaces of physics where physics meets biology, chemistry and engineering; to that end, the student of physics will witness how the methods of physics are central to addressing key problems in the disciplines of engineering, chemistry and biology.

Undergraduates participate in research in three different ways. First, they may decide to take research for academic credit. Within the major, students take three physics electives and one or more of these may be used to perform scientific research under the guidance of our physics faculty. Second, students may opt to do research as a Summer Scholar. Saint Joseph's University is well known for its 10 week Summer Scholars Research Program. Historically, the Physics Department, through the generosity of its alumni, Dean and Provost, has been able to provide stipends for all physics students who have wanted to do summer research. Students selected to participate in the Summer Scholars Program not only receive a stipend but also are provided low-cost housing by the University. Lastly, students may opt to volunteer in a laboratory at SJU or elsewhere.

At its core, the mission of the Department of Physics at Saint Joseph's University is to educate students who are broadly trained in the discipline of physics, critical thinking and complex problem solving. They will have the ability to attack problems and enter professional areas, not only in the field of physics, but also in the areas of biology, chemistry, the applied

sciences and engineering. Graduates of the department will be able to succeed in a wide range of professional careers where the principles of physics and critical thinking skills associated with a degree in physics are used on a routine basis.

In the spirit of the mission of the university, we believe that our students, through the liberal arts training gleaned from the Cornerstone Core Curriculum (CCC), in particular the "ethical dimension in learning", and the concentration curriculum in physics, will become lifelong learners and will use their knowledge and education for the betterment of humanity.

Faculty

The full-time faculty and staff in the Department of Physics at Saint Joseph's University have engaged in significant research and teaching with real-work knowledge and experience in a wide range of physics topics, including soft condensed matter, fluid dynamics, granular materials, patterns in solidification, crystallization, flame fronts, fluid flow, pattern formation and much more.

Department of Physics Faculty & Staff (<https://www.sju.edu/departments/physics/faculty-staff/>)

Programs

Undergraduate Major

- Engineering Physics (p. 171)
- Physics (p. 174)

Undergraduate Minor

- Physics (p. 177)

Engineering Physics Major

The Department of Physics is offering a BS program in Engineering Physics. The major is intended for students who wish to acquire knowledge and powerful problem solving skills in engineering and physics.

Science and technology have evolved very rapidly in the past 10 years. The changing landscape requires more interdisciplinary skills and applications of the natural sciences, especially physics. Physics research has driven a large percentage of recent technological advancements, including many important applications to engineering. Those breakthroughs and deep connections have helped inspire the emergence of a new trend in physics: the field of Engineering Physics.

Engineering Physics prepares students to apply physics to modern engineering, science and technology. In coming years, industrial fields will increasingly employ professionals who are prepared in Engineering Physics. Our program in Engineering Physics provides the students with a fundamental knowledge of physics, together with problem-solving skills, and an understanding of engineering. The program is designed to address the needs of students seeking innovative careers in today's technological age. In addition, it allows students to keep their options open between physical sciences and engineering. Furthermore students will be well prepared and competitive for graduate school in engineering and physics.

Engineering Physics majors can work on frontier ideas in technology and science, in either industry or academia. Those areas might include aerospace, biophysics and biomedical engineering, medical physics, electrical engineering, nano and quantum engineering, renewable energy (photovoltaics, battery technology, fuel cells, ...), transportation, quantum information science, semiconductors, or materials development. Careers

could also include systems engineering, teaching, medicine, law (especially intellectual property or patent law), science writing, science policy, energy policy, government, or management in technical fields. Successful students from this major are expected to have many opportunities in a wide variety of career areas that are increasingly reliant on data scientists, including technology, finance, the pharmaceutical industry, government, and engineering.

The program of Engineering Physics at Saint Joseph's University offers students a comprehensive and flexible curriculum in the disciplines of physics and engineering. The program offers 3 concentrations (Quantum Engineering, Electrical Engineering and Biomedical Engineering) which will allow students to specialize in variety of areas and prepare for a range of careers. These concentrations are reported in the students' transcripts when they graduate.

The program offer foundational courses in Physics with a core grouping of three introductory physics courses (freshman and sophomore years) in the foundations of Newtonian mechanics and electricity and magnetism, geometrical optics, thermodynamics and fluids along with a one-semester program in nonclassical (modern) physics: this course, based on developments in physics that occurred in the first quarter of the twentieth century, introduce students to quantum theory and special relativity. Each of the introductory physics courses is accompanied by a laboratory, which not only complements the didactic material but also trains the student in the methodology of doing experimental physics.

During this time, students also master mathematics, the language of physics. Students take three semesters of calculus, Differential Equations and Introduction to Linear Algebra. Students take also a course in Mathematical Methods for Science and Engineering (which is typically required also in Engineering schools). In addition, students are required to take 2 courses that expose them to modern computational techniques. The upper-level foundational physics courses include the study of classical mechanics, statistical mechanics, electricity and magnetism and experimental methods. These physics and mathematics courses provide the foundation to explore a vast array of upper division courses in engineering physics.

All the engineering physics students are required to take a course in Engineering Modeling and Design. Students are required to take 3 engineering electives which are selected on the basis of the concentration. There are various choices, depending on student interest: The Quantum Engineering concentration is at the front line of modern technology development (quantum computers and quantum communication, quantum materials) with courses such as Quantum Materials for Scientists and Engineers, Quantum Information Science for Mathematicians, Scientists and Engineers, Electronics and Photonics. In the Biomedical Engineering concentration we also offer sub-concentrations in pharmaceutical engineering (drug delivery and other topics) and neuro engineering for students interested in the biophysics and bioengineering aspects of neuroscience.

The Department of Physics at Saint Joseph's University has developed a research-oriented culture for both its faculty and students. Most students will engage in research, alongside faculty mentors, at some point during their four years. The ability to put into practice what is learned in the classroom is paramount to the growth of scientists and professionals. In the research laboratory, students learn to design and perform experiments, to analyze data using computational methods, and draw appropriate conclusions. Students are also exposed to the interface between physics and engineering, including learning how to use physics in tackling engineering problems. All Engineering Physics students are

required to do a senior project which involves research and design in the particular area of engineering selected.

Undergraduates participate in research in three different ways. First, they may decide to take research for academic credit. Within the major, students take three physics electives and one or more of these may be used to perform scientific research under the guidance of our physics faculty. Second, students may opt to do research as a Summer Scholar. Saint Joseph's University is well known for its 10 week Summer Scholars Research Program. Historically, the Physics Department, through the generosity of its alumni, Dean and Provost, has been able to provide stipends for all physics students who have wanted to do summer research. Students selected to participate in the Summer Scholars Program not only receive a stipend but also are provided low-cost housing by the University. Lastly, students may opt to volunteer in a laboratory at SJU or elsewhere.

Learning Goals and Outcomes

Goals

The Program aims to produce graduates who will:

1. Be prepared for diverse career paths within Engineering, Science and Technology
2. Adapt to advanced interdisciplinary, technological and analytical environments in the work place
3. Contribute to profession and society

Learning Outcomes

After successful completion of the program, students will demonstrate the following competencies:

Application of Proficiency: students will be able to solve problems across diverse scientific and technological areas by utilizing a strong foundation in physics and engineering (Goal 1)

Technical Proficiency: students will be able to exhibit technical expertise in the engineering workplace or in the pursuit of an advanced engineering degree, demonstrating mastery of relevant concepts and methodologies (Goal 2).

Effective Communication: students will be able to communicate technical data and findings to non-specialist audiences in a professional manner and will be committed to teamwork and life-long learning throughout their careers (Goal 2).

Contribute to Profession and Society: students will be able to engage in the engineering and physics professions in alignment with the Jesuit tradition, to contribute to the advancement of society and upholding ethical standards in their professional endeavors (Goal 3).

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		

Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
Philosophy Level Two	3

Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3	
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement	3-4
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A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement	3
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If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement	3
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If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Recommended CCC Courses

Code	Title	Hours
Mission-Overlay		
	Second Semester of Non-Native Language	

Major Requirements

Code	Title	Hours
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4
MAT 213	Calculus III	4
MAT 226	Introduction to Linear Algebra	3
MAT 238	Differential Equations	3
MAT 311	Numerical Analysis	3
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
PHY 105	University Physics I (will count for CCC: Natural Science)	3
PHY 105L	University Physics Lab I (will count for CCC: Natural Science)	1
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
PHY 213	Physics III	3
PHY 213L	Intro. Physics III Laboratory	1
PHY 251	Modern Physics I	3
PHY 282	Modeling, Simulation & Design	4
PHY 301	Classical Mechanics	3
PHY 307	Electricity and Magnetism	3
PHY 305	Intro to Invention and Patents	1
PHY 312	Experimental Methods in Phy II	3
PHY 313	Comp Methods for Sci and Eng	3
PHY 390	Physics Seminar	0
PHY 409	Statistical Mechanics	3
PHY 482	Math Meth Physics & Engineer	3
PHY 488	Senior Design Project	3
Concentration		9
Students must complete 3 electives (9 credits) within their concentration. See Concentrations section.		
Total Hours		79

Free Electives

Students are required to take 2 free electives for a total of 6 credits. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Concentrations

Students must complete at least nine credits for their concentration. There are 3 concentrations: Biomedical Engineering, Electrical Engineering and Quantum Engineering.

Biomedical Engineering

Code	Title	Hours
Required:		
PHY 419	Biophysics	3
Students interested in the following areas select two classes.		6
Students interested in Drug Delivery and Development Engineering need to take the following courses. For prerequisites students can use the free electives.		
PHS 413	Drug Development II	
PHS 414	Advanced Pharmaceutical Analys (Prerequisites CHM210/CHM210L; CHM215/CHM215L)	
PHS 414L	Advanced Pharma Analysis Lab	
Students interested in Bio-Engineering need select a minimum of 2 of the following 4*** level courses). For prerequisites students can use the free electives.		
BIO 405	Biomechanics	
PHY 412	Medical Instrument & Imaging	
BIO 424	Biotechnology (Needs BIO101/L,BIO102/L and BIO201 as prerequisites)	
BIO 411	Molecular Genetics (Needs BIO101/L,BIO102/L and BIO201 as prerequisites)	
BIO 420	Bioinformatics (Needs BIO101/L,BIO102/L and BIO201 as prerequisites)	
Students interested in Neuro-Engineering select a minimum of 2 of the following courses		
PHY 425	Biophysics of the Brain	
PHY 331	Nonlinear Dynamics and Chaos	
PHY 332	Intro. to Network Science	

Electrical Engineering

Code	Title	Hours
Required:		
PHY 380	Engineering Circuit Analysis	3
PHY 380L	Engineer Circuit Analysis Lab	1
Choose two (2) of the following:		6
PHY 426	Electronics and Photonics	
PHY 440	Introduction to Nanoscience	
PHY 405	Solid State Physics	

Quantum Engineering

Code	Title	Hours
Required:		
PHY 321	Quantum Mechanics I	3
Choose two (2) of the following:		6
PHY 451	Quantum Mat Sci & Engineer	
PHY 327	Quantum Inform Science & Engr	
PHY 426	Electronics and Photonics	
PHY 440	Introduction to Nanoscience	

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PHY 390	Physics Seminar	0
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
MAT 161	Calculus I	4
Non-Native Language		3-4
World History		3
Hours		14-15
Spring		
PHY 390	Physics Seminar	0
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
MAT 162	Calculus II	4
Non-Native Language (CCC Mission- Global Citizenship Overlay)		3
ENG 101	Craft of Language	3
Diversity		3
Hours		17
Sophomore		
Fall		
PHY 213	Physics III	3
PHY 213L	Intro. Physics III Laboratory	1
MAT 238	Differential Equations	3
MAT 213	Calculus III	4
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
PHY 390	Physics Seminar	0
Hours		15
Spring		
PHY 251	Modern Physics I	3
MAT 226	Introduction to Linear Algebra	3
Philosophy Level One		3
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
INT 151	Inequality in American Society	1
PHY 390	Physics Seminar	0
Religious Studies		3
Hours		17
Junior		
Fall		
PHY 301	Classical Mechanics	3
PHY 482	Math Meth Physics & Engineer	3
PHY 312	Experimental Methods in Phy II	3
PHY 390	Physics Seminar	0
Theology		3
Philosophy Level Two		3
Hours		15
Spring		
PHY 307	Electricity and Magnetism	3
PHY 313	Comp Methods for Sci and Eng	3
PHY 305	Intro to Invention and Patents	1
MAT 311	Numerical Analysis	3
Engineering Physics Concentration (1 of 3)		3
Free Elective		3
Hours		16
Senior		
Fall		
PHY 282	Modeling, Simulation & Design	4
Fine & Performing Arts, Design & Creativity		3

Engineering Physics Concentration (2 of 3)		3
Engineering Physics Concentration (3 of 3)		3
PHY 390	Physics Seminar	0
Free Elective		3
Hours		16
Spring		
PHY 409	Statistical Mechanics	3
PHY 488	Senior Design Project	3
PHY 390	Physics Seminar	0
Literature		3
Social Science		3
Overlay or Free Elective		3
Hours		15
Total Hours		125-126

Physics Major

Physicists study the properties and behavior of matter and energy in a wide variety of contexts, ranging from the sub-microscopic particles from which all ordinary matter is made (particle physics) to the behavior of the Universe as a whole (cosmology). Physics primarily is the science that deals with exploring the Rules of Nature. The fundamental understanding of nature that comes from the study of physics is central to all of the natural sciences, applied sciences and technology; and, thus, profoundly affects the life of every human along with their environment.

The Department of Physics of Saint Joseph’s University offers students a comprehensive and flexible curriculum in the discipline of physics. The program offers several advisory tracks (**Materials Science and Nanotechnology, Astrophysics, Biophysics, Computational Physics and Engineering, Medical Physics, Physics Education**) which will allow students to specialize in variety of areas and prepare for a range of careers. The program begins with a core grouping of three introductory physics courses (freshman and sophomore years) in the foundations of classical Newtonian mechanics and Maxwellian electricity and magnetism, geometrical optics, thermodynamics and fluids along with a one-semester program in nonclassical (modern) physics: this course, based on developments in physics that occurred in the first quarter of the twentieth century, introduce students to quantum theory and special relativity. Each of the introductory physics courses is accompanied by a laboratory , which not only complements the didactic material but also trains the student in the methodology of doing experimental physics. During this time, students master the language of physics, i.e., mathematics. Students take three semesters of calculus, Differential Equations and Introduction to Linear Algebra. In addition, they are exposed to modern computational techniques in Numerical Analysis. These physics and mathematics courses provide the foundation to explore a vast array of upper division courses, including physics electives in particular areas of interest. The upper-level courses include the study of classical mechanics, statistical mechanics , electricity and magnetism, quantum mechanics, and experimental methods of physics. Elective topics include solid state physics, biophysics, nuclear and particle physics, computational physics, astrophysics, physics of fluids, quantum materials,network science, biophysics of the brain, chaos and complex systems and more.

The Department of Physics at Saint Joseph’s University has developed a research-oriented culture for both its faculty and students. Undergraduates participate in research in three different ways. First, they may decide to take research for academic credit. Within the major, students take three physics electives and one or more of these may be used to perform scientific research under the guidance of our physics

faculty. Second, students may opt to do research as a Summer Scholar. Saint Joseph's University is well known for its 10 week Summer Scholars Research Program. Historically, the Physics Department, through the generosity of its alumni, Dean and Provost, has been able to provide stipends for all physics students who have wanted to do summer research. Students selected to participate in the Summer Scholars Program not only receive a stipend but also are provided low-cost housing by the University. Lastly, students may opt to volunteer in a laboratory at SJU or elsewhere.

Learning Goals and Outcomes

Goal 1: The student will have a deep conceptual and working understanding of the laws of physical phenomena and pursue a mastery of the foundations of Physics.

Outcome 1.1: Students will be able to interpret and analyze a variety of physical phenomena by applying a fundamental and working knowledge of Newtonian Mechanics, Electricity and Magnetism, Optics, Quantum Mechanics, and Statistical Thermodynamics.

Outcome 1.2: The students will be able to solve problems in Newtonian Mechanics, Electricity and Magnetism, Optics, Quantum Mechanics and Statistical Thermodynamics

Goal 2: The student will be able to analyze phenomena quantitatively, be able to build scientific models, and use the scientific method to test those models theoretically and experimentally.

Outcome 2: Students will be able to develop models of physical phenomena by applying experimental, computational, theoretical, and critical reasoning skills.

Goal 3: Student will be able to conduct scientific research in physics and understand the central themes of physical thought as they apply to other areas of natural and applied sciences, technology, and engineering.

Outcome 3: Students will be able to describe, explain, and/or perform and present research activities by applying what they have learned in interdisciplinary activities and education, to various areas of sciences, technology and engineering.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3	
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours **47-49**

Recommended CCC Courses

Code	Title	Hours
Mission-Overlay		
	Second Semester of Non-Native Language	

Major Requirements

Code	Title	Hours
MAT 161	Calculus I (will count for CCC: Mathematics)	4
MAT 162	Calculus II	4

MAT 213	Calculus III	4
MAT 226	Introduction to Linear Algebra	3
MAT 238	Differential Equations	3
MAT 311	Numerical Analysis	3
PHY 105	University Physics I (will count for CCC: Natural Science)	3
PHY 105L	University Physics Lab I (will count for CCC: Natural Science)	1
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
PHY 213	Physics III	3
PHY 213L	Intro. Physics III Laboratory	1
PHY 251	Modern Physics I	3
PHY 301	Classical Mechanics	3
PHY 307	Electricity and Magnetism	3
PHY 308	Waves and Optics	3
PHY 312	Experimental Methods in Phy II	3
PHY 380	Engineering Circuit Analysis	3
PHY 380L	Engineer Circuit Analysis Lab	1
PHY 321	Quantum Mechanics I	3
PHY 409	Statistical Mechanics	3
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
PHY 313	Comp Methods for Sci and Eng	3
PHY 482	Math Meth Physics & Engineer	3
PHY 390	Physics Seminar	0
Two PHY 3-credit electives, which must be at the 300- level or higher		6
Total Hours		78

Free Electives

Three free electives are required. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PHY 105	University Physics I	3
PHY 105L	University Physics Lab I	1
MAT 161	Calculus I	4
Non-Native Language		3-4
ENG 101	Craft of Language	3
PHY 390	Physics Seminar	0
Hours		14-15
Spring		
PHY 106	University Physics II	3
PHY 106L	University Physics Lab II	1
MAT 162	Calculus II	4
Non-Native Language (Overlay Mission Specific)		3
World History		3
Diversity		3

PHY 390	Physics Seminar	0
Hours		17
Sophomore		
Fall		
PHY 213	Physics III	3
PHY 213L	Intro. Physics III Laboratory	1
MAT 238	Differential Equations	3
MAT 213	Calculus III	4
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
PHY 390	Physics Seminar	0
Hours		15
Spring		
PHY 251	Modern Physics I	3
MAT 226	Introduction to Linear Algebra	3
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
INT 151	Inequality in American Society	1
PHY 390	Physics Seminar	0
Philosophy Level One		3
Religious Studies		3
Hours		17
Junior		
Fall		
PHY 321 or PHY 301	Quantum Mechanics I or Classical Mechanics	3
PHY 313 or PHY 482	Comp Methods for Sci and Eng or Math Meth Physics & Engineer	3
PHY 312	Experimental Methods in Phy II	3
PHY 390	Physics Seminar	0
Theology		3
Philosophy Level Two		3
Overlay or Free Elective (Writing Intensive)		3
Hours		18
Spring		
PHY 409 or PHY 307	Statistical Mechanics or Electricity and Magnetism	3
PHY 308 or MAT 311	Waves and Optics or Numerical Analysis	3
Physics Elective #1 (300-level and above)		3
Fine & Performing Arts, Design, & Creativit		3
PHY 390	Physics Seminar	0
Free Elective		3
Hours		15
Senior		
Fall		
PHY 321 or PHY 301	Quantum Mechanics I or Classical Mechanics	3
PHY 313 or PHY 482	Comp Methods for Sci and Eng or Math Meth Physics & Engineer	3
Literature		3
PHY 380	Engineering Circuit Analysis	3
PHY 380L	Engineer Circuit Analysis Lab	1
Free Elective		3
PHY 390	Physics Seminar	0
Hours		16
Spring		
PHY 409 or PHY 307	Statistical Mechanics or Electricity and Magnetism	3
PHY 308 or MAT 311	Waves and Optics or Numerical Analysis	3
Physics Elective #2 (300-level and above)		3
Social Science		3

Free Elective		3
PHY 390	Physics Seminar	0
Hours		15
Total Hours		127-128

Physics/Secondary Education

Students majoring in Physics who are interested in teaching grades 7-12 can dual major in Physics/Secondary Education (7-12). Upon successful completion of the dual major, SJU degree requirements, and required certification exams, teacher candidates may apply to obtain an Instructional I Secondary Education (7-12) Teaching Certificate from the State of Pennsylvania. Students must also maintain an overall GPA of 3.0 or higher to obtain teacher certification upon graduation.

In addition to their Physics advisor, Physics/Secondary Education(7-12) dual majors will also be assigned an advisor from the Education Department who will guide them through their required Education courses. The Education advisor will also assist students seeking teacher certification in formally applying for the SJU Educator Preparation Program, usually in the spring semester of their sophomore year. Students must have an overall GPA of 3.0 or higher to enroll in EDU 491 (<https://academiccatalog.sju.edu/search/?P=EDU%20491>) Secondary Student Teaching in their senior year.

Pennsylvania's Secondary Education (referred to as "secondary" or "7-12") preparation program guidelines require a professional core of courses, early and varied field experiences, and student teaching. In addition to the subject-specific content requirements for secondary programs that are met by the student's major, candidates for the 7-12 teaching certificate in Pennsylvania must complete a prescribed sequence of coursework, which includes the specific requirements for Accommodations and Adaptations for Diverse Learners in Inclusive Settings and Meeting the Needs of English Language Learners under §49.13(4)(i).

Please see Secondary Education 7-12 for secondary major requirements. (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

Code	Title	Hours
MAT 162	Calculus II	4
MAT 238	Differential Equations	3
PHY 106 & 106L	University Physics II and University Physics Lab II	4
PHY 213 & 213L	Physics III and Intro. Physics III Laboratory	4
PHY 251	Modern Physics I	3
PHY 301	Classical Mechanics	3
PHY 307 or PHY 308	Electricity and Magnetism Waves and Optics	3
PHY 311	Experimental Methods of Phy I	3
PHY 312	Experimental Methods in Phy II	3
Three 300/400 Level Physics Electives		9
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
Total Hours		47

Physics Minor

Learning Goals and Outcomes

Goal 1: The student will develop the skills to be able to analyze phenomena quantitatively, be able to build specific models, and see how the scientific method is used to test those models.

Outcome 1.1: Be conversant with fundamental laboratory methods, the use of the electronic test equipment, and analysis of data including computational methods of processing and analyzing data.

Outcome 1.2: Translate problems in the natural sciences, especially those related to the physical world, into mathematical formulations utilizing calculus and other sophisticated mathematical tools

Goal 2: The student will gain an appreciation and understanding of the foundations of physics including classical mechanics, classical electricity and magnetism, thermodynamics and quantum theory.

Outcome 2.1: Solve problems using classical Newtonian mechanics.

Outcome 2.2: Solve problems in classical electricity and magnetism including wave phenomena and optics.

Outcome 2.3: Understand the development of quantum mechanics from the failure of classical mechanics under certain conditions and be able to solve paradigmatic problems using fundamental quantum theory.

Outcome 2.4: Understand the development of classical thermodynamics and in conjunction with quantum theory, appreciate the need for a statistical approach to thermodynamics.

Requirements

A student may elect to minor in Physics by taking the following:

Code	Title	Hours
PHY 105 & 105L	University Physics I and University Physics Lab I	4
PHY 106 & 106L	University Physics II and University Physics Lab II	4
PHY 251	Modern Physics I	3
PHY 213	Physics III	3
PHY 213L	Intro. Physics III Laboratory	1
Any two (2) PHY courses		6-9
Total Hours		21-24

Modifications are subject to the Chair's approval in consultation with the department. Interested students should contact the chair prior to the fall semester of their junior year.

Political Science

Political Scientists study power and how it operates at different levels – among individuals, within and between institutions and individuals, and between countries, international organizations, corporations, societal groups, and individuals in the international arena. Our department hopes students will connect the classroom with the wider issues in global, national, and local politics by attending our many events, trips, and study tours and participating in internships.

Faculty

The political science faculty are deeply committed to sharing their research and career knowledge working in U.S. politics, political science, international relations and various other experiences with their students. Many have been published in several well-regarded journals and have conducted research in gender politics, race/ethnic politics, intersectionality, elections, economic transformation, labor relations, comparative politics and much more.

Department of Political Science Faculty & Staff (<https://www.sju.edu/departments/politicalscience/faculty-staff/>)

Programs Undergraduate Major

- Political Science (p. 178)

Undergraduate Minor

- Political Science (p. 180)

Political Science Major

Political Scientists study power and how it operates at different levels – among individuals, within and between institutions and individuals, and between countries, international organizations, corporations, societal groups, and individuals in the international arena. Our department hopes students will connect the classroom with the wider issues in global, national, and local politics by attending our many events, trips, and study tours and participating in internships.

Learning Goals and Outcomes

Goal 1: Key Concepts/Theories: Students will understand core concepts and theories within political science

Outcome 1.1: Students will identify, define, and/or explain the content, core concepts, and theories that guide the subfields of political science

Goal 2: Write/Argue: Students will develop arguments based on theory and/or evidence

Outcome 2.1: Students will articulate verbally and/or in writing an argument which defines, explains, and/or analyzes the content, process, and/or outcomes relevant to the subfields of political science

Goal 3: Analyze: Students will evaluate arguments using theoretical principles or empirical evidence

Outcome 3.1: Students will apply a variety of tools, methods, or perspectives to critically analyze and/or evaluate issues relevant to the subfields of political science

Goal 4: World outside the classroom: Students will participate in experiential learning related to the political science discipline

Outcome 4.1: Students will demonstrate career preparation through experiential learning opportunities that are closely related to political science or a related field through the development of interpersonal, analytical, and/or problem-solving skills

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Major Requirements

Code	Title	Hours
POL 111	Intro to American Politics (will count for CCC: Social Science)	3

Statistics (will count for CCC: Mathematics) 3-4

MAT 118 Introduction to Statistics

MAT 148 Applied Statistics Plus

Two Additional Introductory Courses: 6

POL 113 Intro to Comparative Politics

POL 115 Intro to Global Politics

POL 117 Intro to Political Thought

Professional Development

POL 190 Strategies for Success 1

POL 290 Career Prep Seminar 1

Complementary Analytical Skills ⁶ 3

Students will choose to take any one course from the following categories:

Any GIS (Global Information Systems) course. Please note that except for GIS 101 and GIS 127, there are prerequisites.

World Language. A second Non-Native Language course will satisfy the Mission Specific (Global Citizenship) Overlay requirement.

Data Analytical Skills: Statistics for Research (MAT 304); Any computer science (CSC) course; Econometrics (ECN 410)

Any HIS course beyond the World History requirement (HIS 200-499)

Intro Economics Micro (ECN 101); Intro Economics Macro (ECN 102).

Lower and Upper Division Courses

Select any three POL courses numbered 100-499 9

Select seven POL courses numbered 300-499 ^{1, 2, 3} 21

Experiential Learning Course 3

Select one of the following:

INT 191 Washington Leadership Seminar

INT 192 Washington Internship

INT 193 Washington Center Elective

INT 411 Washington Internship I

INT 412 Washington Internship II

POL 413 International Internship I

POL 414 International Internship II

POL 490 Global Smarts Internship

ANS 490 CAS Internship I (Philadelphia Area Internship)

OR any Service Learning course (with SLR attribute)

OR completion of three Minternship courses (1 credit each)

POL 390, POL 391, or POL 392

OR Study Abroad (One Semester)

Capstone Course 3

Select one POL Capstone course from among 400-409 ^{4, 5}

Total Hours 53-54

¹ POL 270 may count, but only twice.

² POL majors who double-major in IR may not count more than three (3) upper division courses towards either degree requirement.

³ POL majors may only count 2 study abroad courses towards their degree requirements.

⁴ POL majors who double-major in IR must complete a second Senior Capstone Course to fulfill the IR major requirements. In addition, Capstone Courses do not count towards the Upper Division Course requirements for either major.

⁵ The Department strongly recommends that all students take the appropriate introductory course prior to enrolling in a Capstone Course.

Free Electives

At least eleven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
POL 111	Intro to American Politics	3
World History		3
Philosophy Level One		3
Non-Native Language		3-4
Free Elective #1		3
INT 151	Inequality in American Society	1
POL 190	Strategies for Success	1
Hours		17-18
Spring		
POL 113	Intro to Comparative Politics	3
or POL 115	or Intro to Global Politics	
or POL 117	or Intro to Political Thought	
ENG 101	Craft of Language	3
Theology		3
Complementary Analytical Skills		3
Free Elective #2		3
Hours		15
Sophomore		
Fall		
POL 113	Intro to Comparative Politics	3
or POL 115	or Intro to Global Politics	
or POL 117	or Intro to Political Thought	
POL Major Elective #1		3
Philosophy Level Two or Religious Studies		3
MAT 118	Introduction to Statistics	3
or MAT 148	or Applied Statistics Plus	
Free Elective #3		3
POL 290	Career Prep Seminar	1
Hours		16
Spring		
POL Major Elective #2		3
POL Major Elective #3		3

Diversity	3
Religious Studies or PHL Level Two	3
Free Elective #4 (or Mission Overlay)	3
Hours	15
Junior	
Fall	
POL Major Elective #4	3
POL Major Elective #5	3
Natural Science or Free Elective #5	3-4
Experiential Learning or Free Elective #6	3
Free Elective #7	3
Hours	15-16
Spring	
POL Major Elective #6	3
POL Major Elective #7	3
Free Elective #5 or Natural Science	3-4
Free Elective #6 or Experiential Learning	3
Free Elective #8	3
Hours	15-16
Senior	
Fall	
POL Capstone (WI Overlay) or POL Major Elective #8 (POL 100 -499)	3
POL Major Elective #9 (POL 100 -499)	3
Literature or Fine, Performing Arts, Design, or Creativity	3
Free Elective #9	3
Free Elective #10	3
Hours	15
Spring	
POL Major Elective #8 or POL Capstone (WI Overlay)	3
POL Major Elective #10	3
Fine, Performing Arts, Design, or Creativity or Literature	3
Free Elective #11	3
Optional Free Elective #12	
Hours	12
Total Hours	120-123

¹ Note that the number of free electives may vary depending on AP credits awarded, the natural science option completed (one lab course vs. two non-lab courses), and number of courses completed for the non-native language requirement

Political Science Minor

Learning Goals and Outcomes

Goal 1: Key Concepts/Theories: Students will understand core concepts and/or theories within political science

Outcome 1.1: Students will identify, define, and/or explain the content, core concepts, and theories that guide the subfields of political science.

Goal 2: Write/Argue: Students will develop arguments based on theory and/or evidence

Outcome 2.1: Students will articulate verbally and/or in writing an argument which defines, explains, and/or analyzes the content, process, and/or outcomes relevant to the subfields of political science.

Goal 3: Analyze: Students will evaluate arguments using theoretical principles or empirical evidence

Outcome 3.1: Students will apply a variety of tools, methods, or perspectives to critically analyze and/or evaluate issues relevant to the subfields of political science.

Goal 4: World outside the classroom: Students will participate in experiential learning related to the political science discipline

Outcome 4.1: Students will demonstrate career preparation through experiential learning opportunities that are closely related to political science or a related field through the development of interpersonal, analytical, and/or problem-solving skills.

Requirements

Minors in Political Science will compete six courses that satisfy the following requirements:

Code	Title	Hours
POL 111	Intro to American Politics	3
or POL 117	Intro to Political Thought	
Two (2) upper division POL courses (POL 270 through 300 level)		6
Any other three (3) POL courses ¹		9
Total Hours		18

- ¹
- Only **one** Experiential Learning course counts towards the minor.
 - Only **one** POL 270 counts towards the minor, unless otherwise approved in advance by the Chair.
 - Only **one** Study Abroad or other course that is not taken in residence counts towards the minor.
 - International Relations majors must take either POL 111 or POL 117 and two POL classes that do not count for the International Relations major, in addition to three other POL classes.

Psychology

Psychology is the scientific study of all forms of human and animal behavior. The Department of Psychology at Saint Joseph’s University offers students an exciting and challenging curriculum. The broad range of courses provides opportunities for understanding how psychological research is conducted, as well as how psychology is applied in clinical and business settings. The full spectrum of activities and concerns of psychologists are covered, with consideration given to ethical issues.

University students with a wide range of interests find Psychology personally appealing and professionally relevant. Students use the Psychology major as a gateway to a diverse range of employment opportunities, in the health and legal professions, human resources and management positions, education and school counseling, and other social, industrial and organizational situations. Students wishing to pursue careers in the mental health professions can take advantage of our Clinical Concentration. For those students interested in pursuing graduate study in Psychology, the Department offers training in the areas of behavioral neuroscience, clinical psychology and neuropsychology, behavioral pediatrics, social psychology, cognitive psychology, and developmental psychology.

Our graduates are currently college professors, researchers, school psychologists, clinical psychologists, counselors, developmental psychologists, personnel managers, educators, learning disability specialists, social workers, physicians, attorneys, and successful businessmen and women.

Departmental Mission

Few abilities are more central to a person's successful and productive functioning in modern society than the sophisticated, insightful appreciation of human behavior. The psychology curriculum provides a theoretical and scientific framework for students to understand and measure human behavior, in ways that benefit individuals and organizations.

The Department promotes excellence through the teacher/scholar model and provides an atmosphere for students to be intellectually curious, socially responsible, to reason well, and to become independent learners. This academic experience will change the way they conceive of their world and themselves and will promote a life-long commitment to social justice and learning.

The Department serves its academic discipline and the larger community through faculty scholarship and the preparation of future scholars, as well as providing students with the intellectual, interpersonal, and communication skills that promote success in a variety of career paths.

The Department of Psychology supports the University's mission by:

- Excelling in teaching, scholarship, and service.
- Making a vital contribution to the general education of the University's students.
- Modeling *cura personalis* through advising, mentoring, community and professional service, and assuming positions of leadership within and outside the University.
- Preparing courses that reflect the historic roots of the discipline as well as contemporary thought, and making explicit the connections between basic science and real world applications.
- Emphasizing professional ethics of psychology as a discipline.
- Conducting and disseminating high quality research, in partnership with students.
- Providing students with experientially based learning.
- Preparing students to contribute to the common good.

Faculty

Faculty members in the Department of Psychology serve the larger community by providing students with the intellectual, interpersonal and communication skills that promote success in a variety of career paths. Faculty publish on a wide range of topics including neuropsychology, sleep processes, sensory and perceptual processing, psychopharmacology, depression and anxiety disorders, autism, human visual memory, moral development in children, the neural and hormonal mechanisms of social behavior and much more.

Department of Psychology Faculty & Staff (<https://www.sju.edu/departments/psychology/faculty-staff/>)

Programs

Undergraduate Major

- Psychology (p. 182)

Undergraduate Minors

- Animal Studies (p. 51)
- Art Therapy
- Industrial/Organizational Psychology (<https://www.sju.edu/degree-programs/industrial-and-organizational-psychology-minor/>)
- Psychology (p. 185)

Industrial and Organizational Psychology Minor

The Industrial and Organizational Psychology minor is an interdisciplinary program between the Psychology department in the College of Arts & Science and the Management Department of the Haub School of Business. According to the US Department of Labor, Industrial/Organizational Psychology is the fastest-growing subfield of psychology, with a 26% growth rate projected from 2008 – 2018, and 53.4% between 2012 and 2022. Furthermore, Psychology is one of the primary sub-disciplines of Management and is a particular point of emphasis in Human Resource Management (e.g. recruitment, selection, motivation, and training) and Organizational Behavior (teams, negotiation, stress, satisfaction, and commitment). This minor is one of the few undergraduate minors in the country in this area; the interdisciplinary nature of it allows us to offer expertise in both Psychology and Management.

Requirements

Code	Title	Hours
Required:		
PSY 230	Social Psychology	3
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
or PSY 129	Industrial/Organizational Psyc	
Plus two additional courses among the following:		6
PSY 226	Psychology of Emotion	
PSY 227	Cognitive Psychology	
PSY 233	Adulthood and Aging	
PSY 234	Psychology of the Self	
PSY 390/391	Internship I (Internship I/II)	
Plus two additional courses among the following:		6
MGT 211	Perspectives on Leadership	
MGT 220	Intro Human Resource Managemen ¹	
MGT 221	Diversity in the Workplace	
MGT 222	Influence,Negotiation&Conflict	
MGT 311	Leading Teams	
MGT 321	International Talent Mgt	
MGT 322	Decision Making w/ Analytics ²	
MGT 425	Managing HR: Resrch/App	
Total Hours		18

¹ Except for Haub School of Business majors.

² Among the four elective courses, students would be required to take a research oriented course (MGT 322) unless they have taken a research oriented course in their major.

Psychology Major

Learning Goals and Outcomes

Goal 1: Knowledge Base in Psychology. Students will develop an understanding of the major concepts, theoretical perspectives, empirical findings, and / or historical trends in Psychology.

Outcome 1: Students will be able to identify, define, and/or explain foundational content, core concepts, and fundamental theories of psychology.

Goal 2: Scientific Inquiry and Critical Thinking. Students will develop scientific reasoning and problem solving skills. They will be able to apply basic research methodology in psychology.

Outcome 2: Students will be able to use the scientific method and statistical analysis to investigate behavior.

Goal 3: Ethical and Social Responsibility in a Diverse World. Students will develop an understanding of ethically and socially responsible behaviors in professional and personal settings in a landscape of increasing diversity.

Outcome 3: Students will be able to identify key concepts relevant to ethical and socially responsible behaviors in professional and personal settings in a landscape of increasing diversity.

Goal 4: Communication. Students will demonstrate competence in written and oral communication skills.

Outcome 4: Students will be able to articulate concepts related to the discipline verbally and/or in writing.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
3-4		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
3		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
3		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		
3		
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		
3		
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
PSY 212	Multicultural Psychology	
Social Science		
PSY 101	Intro Psychology Seminar	
Writing Intensive		
PSY 210	Research Methods	
Mission-Overlay		
PSY 236	Ethics in Psychology	

Major Requirements

Thirteen courses are required, including an experiential course. Eleven courses are required if students use an acceptable Psychology special elective to fulfill their experiential requirement, or if they use a study abroad course or a service-learning course to fulfill their experiential

requirement. The experiential course does not have to be a course offered by the Psychology Department.

Psychology Breadth Requirement

Code	Title	Hours
PSY 101	Intro Psychology Seminar	3
PSY 201	Biological Bases of Behavior	3
PSY 212	Multicultural Psychology	3
PSY 231	Developmental Psychology	3
PSY 123-139 or PSY 170 or PSY 220-269: Any Psychology Elective		
PSY 220-229 or PSY 260-269: Advanced Natural Science-Based Psychology Elective		
PSY 230-239 or PSY 250-259: Advanced Social Science-Based Psychology Elective		
PSY 220-269: Advanced Any Psychology Elective		
Select one from the following for Advanced Special Psychology Elective:		
PSY 205-209		
PSY 220-269		
PSY 390-392		

Psychology Research Sequence

Code	Title	Hours
PSY 210	Research Methods	3
PSY 211	Stats for the Social Sciences	4
One of the following Capstone Research Seminars:		
PSY 491	Research Seminar: Nat Sci I	
PSY 492	Research Seminar: Nat Sci II	
PSY 493	Research Seminar: Soc Sci I	
PSY 494	Research Seminar: Soc Sci II	

Experiential Requirement

Psychology majors must satisfy an experiential course requirement. This requirement can be satisfied in a number of ways, and with either a Psychology course or a course offered by another academic department. Students must complete one of the following:

Code	Title	Hours
PSY 390	Internship I	3
or PSY 391	Internship II	
PSY 374	Independent Study I	3
or PSY 375	Independent Study II	
PSY 392	Independent Research I	3
or PSY 393	Independent Research II	
Any Service Learning course		
Any Study Abroad/Tour program/course		

Independent Study

Code	Title	Hours
PSY 374	Independent Study I	3
or PSY 375	Independent Study II	

The content of the Independent Study is negotiated between student and faculty mentor. The content cannot be that of an existing course in the

curriculum unless that course will not be offered during the time that the student completes his or her program of study.

Independent Research

Code	Title	Hours
PSY 392	Independent Research I	3
or PSY 393	Independent Research II	

Students are responsible for designing and conducting an original research project under the direction of a faculty mentor.

Internship

Code	Title	Hours
PSY 390	Internship I	3
or PSY 391	Internship II	

Internship entails spending eight hours each week in a supervised field experience. Settings include clinical, clinical research, counseling, hospital, educational research, special education, correctional, and industrial facilities. Site locations of recent internships have included the following:

- AIIR Consulting
- Bryn Mawr Rehabilitation
- Child and Family Focus
- Children's Crisis Treatment Center
- Children's Hospital of Philadelphia (CHOP)
- Family Court of Philadelphia
- Kinney Center
- Mitzvah Circle
- Serenity Stables
- Social Enrichment Center
- Temple Psychiatric Hospital

Dr. Jodi Mindell (Post Hall 223, jmindell@sju.edu) oversees the internship course for the Psychology Department.

Free Electives

Psychology majors have seven to ten free electives. There are no restrictions on these elective courses other than ordinary prerequisites. Students may elect to take additional Psychology courses, or may use these electives to fulfill the requirements of a minor in another related discipline. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Clinical Psychology Concentration

The Department of Psychology offers a clinical concentration of courses in support of those Saint Joseph's Psychology majors who are interested in pursuing careers in clinical psychology, counseling psychology, and related mental health fields. Psychology majors are eligible to take an additional sequencing of courses to gain greater understanding of the field of clinical psychology. The goals of the clinical concentration are:

- To ensure that students take additional courses required by graduate programs in clinical psychology (e.g., Developmental Psychology and Abnormal Psychology).

- To help students better understand the field of clinical psychology and to make informed choices on fit with various types of graduate programs (e.g., social work vs. clinical psychology vs. health psychology) and the type of theoretical orientation the various types of programs provide (e.g., psychodynamic, cognitive-behavioral, socio-cultural).
- To encourage students to gain some exposure to the clinical psychology profession (e.g., to the tasks clinicians perform and/or to special populations with whom they work).

Completion of all **six** courses listed below is required to earn the designation of ‘Clinical Concentration’ on a student’s transcript. Specifically, PSY 232, PSY 300, and PSY 301 will count for the Clinical Concentration, but will not count as Psychology major requirements. PSY 231, PSY 236/237, and PSY 390 will count for both the Clinical Concentration and as Psychology major requirements.

Code	Title	Hours
PSY 231	Developmental Psychology	3
PSY 232	Adv. Psychological Disorders (prerequisite for PSY 300 and PSY 301)	3
PSY 236, or PSY 237	Clinical Concentration Elective	3
PSY 300	Clinical Psychology	3
PSY 301	Psychological Assessment	3
or PSY 302	Counseling Skills	
PSY 390	Internship I	3
or PSY 391	Internship II	

Requirements For Departmental Honors

Students may take any psychology course for Honors credit, provided they get permission from the instructor at the time they register for the course. A contract is negotiated between student and faculty member on what additional work is to be done for Honors credit.

To receive departmental honors, students must either:

(A) Write a College Honors thesis, with PSY 392 and PSY 393 as the appropriate courses. Students must identify a member of the psychology faculty willing to serve as mentors in advance of completing the Honors thesis/capstone approval form.

or

(B) Complete a College Honors Capstone Sequence by choosing one of two options:

- 1) Complete two research seminar courses (PSY 491- 494) upgraded to honors and complete an individual research project in each course.
- 2) Complete a two-semester sequence that includes one honors upgraded research seminar (PSY 491- 494) with an individual research project and one honors upgraded independent research course (PSY392 or PSY393). This sequence must be completed in consecutive semesters.

PLEASE NOTE: If a student wishes to upgrade a research seminar course to honors, they must notify the instructor of their plan to upgrade at the time when they register for the relevant course. If a student switches sections, they must notify the instructor of the section into which they have switched, as well as the instructor of the section they have left.

This must happen during registration. If the instructor is not notified early enough, the upgrade may not be possible.

Requirements for University Honors and University Scholar may be found on the Saint Joseph’s web pages for the Honors Program.

Requirements for Psi Chi, the International Honor Society in Psychology

Saint Joseph’s University maintains an active chapter of Psi Chi (ΨΧ), the International Honor Society in Psychology. The purpose of Psi Chi is to encourage, stimulate, and maintain excellence in scholarship, and to advance the science of Psychology. Membership in Psi Chi is open to all students who meet the following minimum qualifications:

- Registration for major or minor standing in Psychology.
- A rank in the upper 35% of their graduating class in general scholarship.
- Completion of the following courses:
 - Introductory Psychology (either PSY 100 or PSY 101)
 - Research Methods (PSY 210)
 - Statistics for the Social Sciences (PSY 211)
 - At least one other Psychology course
- A cumulative GPA not lower than 3.2 in all Psychology classes, as well as in overall cumulative grades.
- Two-thirds affirmative vote of those members present at a regular meeting of the chapter.
- High standards of personal behavior.
- Approval of the International Psi Chi office.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PSY 101	Intro Psychology Seminar	3
Non-Native Language		3-4
World History		3
ENG 101	Craft of Language	3
Theology		3
Hours		15-16
Spring		
PSY 231	Developmental Psychology	3
or PSY 201	or Biological Bases of Behavior	
PSY Breadth Elective 1		3
Literature		3
Mathematics		3
Philosophy Level One		3
INT 151	Inequality in American Society	1
Hours		16
Sophomore		
Fall		
PSY 290	Professional Prep Seminar	1
PSY 201	Biological Bases of Behavior	3
or PSY 231	or Developmental Psychology	
PSY Breadth Elective 2		3
Philosophy Level Two		3
Fine & Performing Arts, Design & Creativity		3
Free Elective		3
Hours		16

Spring		
PSY Breadth Elective 3		3
Literature		3
Religious Studies		3
Free Electives		6
Hours		15
Junior		
Fall		
PSY 210 or PSY 211	Research Methods or Stats for the Social Sciences	3
PSY 212	Multicultural Psychology	3
Free Electives		9
Hours		15
Spring		
PSY 211 or PSY 211	Stats for the Social Sciences or Stats for the Social Sciences	4
Experiential - Internship or Service-Learning		3
PSY Breadth Elective 4		3
Free Electives		6
Hours		16
Senior		
Fall		
PSY Research Seminar		3
Mission Specific (PSY 236 is optional)		3
Free Electives		9
Hours		15
Spring		
Natural Science		4
PSY Breadth Elective 5		3
Free Electives		9
Hours		16
Total Hours		124-125

Psychology Minor

Learning Goals and Outcomes

Goal 1: Knowledge Base in Psychology. Students will develop an understanding of the major concepts, theoretical perspectives, empirical findings, and historical trends in Psychology.

Objective 1.1: Students will demonstrate familiarity with the major concepts, theoretical perspectives, empirical findings, and historical trends in Psychology as a social science.

Objective 1.2: Students will demonstrate familiarity with the major concepts, theoretical perspectives, empirical findings, and historical trends in psychology as a natural science.

Goal 2: Scientific Inquiry and Critical Thinking. Students will develop scientific reasoning and problem solving skills. They will be able to understand and apply basic research methodology in psychology, including research design, data analysis, and interpretation.

Objective 2.1: Students will be able to understand and apply basic research design strategies.

Objective 2.2: Students will be able to understand and apply basic data analysis strategies.

Goal 3: Ethical and Social Responsibility in a Diverse World. Students will develop an understanding of ethically and socially responsible behaviors

in professional and personal settings in a landscape of increasing diversity.

Objective 3.1: Students will understand and apply ethical psychological principles.

Objective 3.2: Students will be able to understand diversity, appreciate ethical behavior, and reflect other values that are the underpinnings of Psychology as a discipline.

Goal 4: Communication. Students will demonstrate competence in written and oral communication skills.

Objective 4.1: Students will demonstrate competence in written communication.

Objective 4.2: Students will demonstrate competence in oral communication.

Requirements

Code	Title	Hours
PSY 100 or PSY 101	Introductory Psychology Intro Psychology Seminar	3
PSY 120	Lifespan Development ¹	3
PSY 201	Biological Bases of Behavior ¹	3
Select three additional courses from the following:		9
PSY 121-129 or 131 or 170		
PSY 212	Multicultural Psychology	
PSY 220-230		
PSY 233-269		
Total Hours		18

Psychology minors are strongly advised to complete PSY 100, PSY 120, PSY 201, and 100-level electives BEFORE taking 200-level psychology electives. PSY 210 may be substituted for PSY 120 (<https://academiccatalog.sju.edu/search/?P=PSY%20120>) or PSY 201 (<https://academiccatalog.sju.edu/search/?P=PSY%20201>).

The academic advisor for minors is the departmental Advising Coordinator, Dr. Josephine Shih

Sociology

Sociology is the study of social organization and group dynamics that influence human interaction. The major provides students with an understanding of the world beyond personal biases and assumptions, and considers the structural forces that shape our daily lives. Students who major in sociology are prepared for careers in law, business, marketing, public policy, politics, health, and a host of other possibilities. Students learn to conduct research, synthesize scholarly information, and present developed arguments in a variety of subjects.

Faculty

The Department of Sociology and Criminal Justice prides itself on excellence in teaching. Faculty members bring their research interests and expertise in sociology into the classroom.

Department of Sociology and Criminal Justice Faculty & Staff (<https://www.sju.edu/departments/sociology/faculty-staff/>)

Programs Undergraduate Major

- Sociology (p. 186)

Undergraduate Minors

- Sociology (p. 188)
- Health Equity & Social Justice (p. 186)

Health Equity & Social Justice Minor

Health equity involves identifying the root causes of the uneven distribution of health-related burdens and outcomes. Social justice is the view that everyone deserves equal rights and opportunities including access to and control over the basic material and non-material resources that sustain and promote health at a high level of satisfaction. In the U.S. and worldwide there are health inequities that are avoidable, unnecessary, and unjust. These inequities are the result of policies and practices that create an unequal distribution of money, power, and resources among communities based on but not limited to race, class, gender, sexual orientation, and place. In order to ensure that communities have the opportunity to attain and promote health at a high-level of satisfaction we must address the social determinants of health in order to achieve health equity. Future health care practitioners and researchers interested in this goal require training in the social and behavioral sciences in order to critically examine the causes and consequences of health inequities. Taken together, a selection of courses will teach students to identify and critically evaluate measures, causes, and consequences of health disparities, which will prepare a new generation of leaders to make significant changes in the delivery of health care to improve health equity for local and global populations.

Learning Goals and Outcomes

Goal 1: Health equity and social justice minors will describe health disparities that are based on but not limited to race, class, gender, sexual orientation, and place within the United States and around the world.

Outcome 1: Students can describe the broader social, economic, and political factors associated with health inequities both in the US and around the world.

Goal 2: Health equity and social justice minors will identify and critically evaluate measures, causes, and consequences of these health disparities.

Outcome 2: Students can critically assess research studies that describe the root causes of health disparities.

Goal 3: Health equity and social justice minors will describe evidence-based policies and practices that can reduce inequities in our national and global healthcare systems.

Outcome 3: Students can critically assess the limits and possibilities of policies and practices designed to reduce health inequities in the US and around the world.

Requirements

Code	Title	Hours
Part 1		
SOC 101	Intro to Sociology	3

or SOC 103	Intro to Anthropology	
Part 2 - At least one course from the following		3
SOC 285	Sociology of Medicine	
SOC 306	Medical Anthropology	
SOC 323	Health and Society	
Part 3 - Choose four courses from the following		12
If 2 or more from Part 2 are taken, then fewer courses are needed from Part 3.		
SOC 205	Ethnic & Minority Relations	
SOC 215	Gender, Race, and Justice	
SOC 216	Alcohol, Drugs & Society	
SOC 217	Mental Health & Society	
SOC 232	Sociology of Human Sexuality	
SOC 253	Race and Social Justice	
SOC 305	Social Epidemiology	
SOC 325	Women and Health	
SPA 335	Span Healthcare Professions I	
SPA 336	Span Healthcare Professions II	
SPA 337	Latinx Comm Culture & Health	
ENG 454	Narrative Medicine	
PHL 285	Philosophy of Medicine	
PHL 302	Philosophy of Race	
HSC 217	Ethics & Equity Mental Health	
HSC 354	Diversity Ldrship in Hlth Care	
HSC 368	Just Hlth Care Dev Nations	
Total Hours		18

Sociology Major Learning Goals and Outcomes

Goal 1: Sociology majors will gain foundational knowledge of the core concepts and theoretical perspectives that define the discipline of sociology.

Outcome 1: Students will be able to define, classify, and compare the core concepts and theoretical perspectives that explain society.

Goal 2: Sociology majors will analyze social problems with appropriate sociological research methods.

Outcome 2: Students will be able to design a research study and apply appropriate designs and analytic methods to answer research questions.

Goal 3: Sociology majors will effectively communicate about their discipline.

Outcome 3: Students will be able to interpret and explain course content and empirical findings in oral and written communications.

Goal 4: Sociology majors will examine the impacts of culture and social structure on individuals.

Outcome 4: Students will be able to explain and critically assess the significance of race, class, gender identity, sexual identity, and age in society.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
SOC 101	Intro to Sociology	
Social Science		
SOC 102	Social Problems	
Writing Intensive		
SOC 313	Data Analysis	

Major Requirements

Code	Title	Hours
SOC 101	Intro to Sociology	3
SOC 102	Social Problems	3
SOC 118	Statistics in Social Sciences	3
SOC 190	Strategies for Success	1
SOC 211	Classical Sociological Theory	3
SOC 290	Professional Prep Seminar	1
SOC 312	Research Methods	3
SOC 313	Data Analysis	3
SOC 470	Special Topics	3
SOC 495	Senior Thesis	3
One experiential learning class is required and can include: study abroad, internship, study tour, or service learning.		0-3
Major Electives: 18 credits worth of SOC courses numbered above 102		18
Students who are double-majoring in psychology do not need to take SOC 118 or SOC 312.		
Total Hours		44-47

Free Electives

Eight elective courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
World History		3
SOC 101	Intro to Sociology	3
SOC 190	Strategies for Success	1
Philosophy Level One		3
Theology or Literature		3

Non-Native Language		3-4
Hours		16-17
Spring		
ENG 101	Craft of Language	3
SOC 102	Social Problems	3
Philosophy Level Two		3
Literature or Theology		3
INT 151	Inequality in American Society	1
Free Elective		3
Hours		16
Sophomore		
Fall		
SOC 118	Statistics in Social Sciences	3
or MAT 118	or Introduction to Statistics	
Natural Science		3-4
Major Elective		3
Mission-Specific Overlay		3
Free Elective		3
Hours		15-16
Spring		
SOC 211	Classical Sociological Theory	3
Religious Studies		3
Experiential Learning		3
Major Elective		3
SOC 290	Professional Prep Seminar	1
Free Elective		3
Hours		16
Junior		
Fall		
SOC 312	Research Methods	3
Fine & Performing Arts, Design & Creativity		3
Mathematics		3-4
Major Elective		3
Free Elective		3
Hours		15-16
Spring		
SOC 313	Data Analysis	3
Major Elective		3
Free Electives		9
Hours		15
Senior		
Fall		
SOC 495	Senior Thesis	3
Major Elective		3
Free Electives		9
Hours		15
Spring		
SOC 470	Special Topics	3
Major Elective		3
Free Elective		6-9
Hours		12-15
Total Hours		120-126

Sociology Minor

Learning Goals and Outcomes

Goal 1: Sociology minors will gain foundational knowledge of the core concepts and theoretical perspectives that define the discipline of sociology.

Outcome 1: Students will be able to define, classify, and compare the core concepts and theoretical perspectives that explain society.

Goal 2: Sociology minors will analyze social problems with appropriate sociological research methods.

Outcome 2: Students will be able to design a research study and apply appropriate designs and analytic methods to answer research questions.

Goal 3: Sociology minors will effectively communicate about their discipline.

Outcome 3: Students will be able to interpret and explain course content and empirical findings in oral and written communications.

Goal 4: Sociology minors will understand the operation of culture and social structure.

Outcome 4: Students will be able to explain and critically assess the significance of race, class, gender identity, sexual identity, and age in society.

Requirements

Code	Title	Hours
SOC 101	Intro to Sociology	3
SOC 102	Social Problems	3
SOC 211	Classical Sociological Theory	3
SOC 312	Research Methods	3
or SOC 313	Data Analysis	
Two upper division courses that can include SOC 103, or SOC classes with the number 201 or above		6
Total Hours		18

For Criminal Justice majors, the minor in sociology requires SOC 211, SOC 312 or SOC 313, and four upper division SOC courses that do not also count towards the requirements for majors in criminal justice.

For Psychology majors, the minor in sociology requires SOC 211, and five upper division SOC courses. The research methods requirements in psychology will fulfill the SOC 312 or SOC 313 requirement for this minor.

Theology and Religious Studies

The Department of Theology and Religious Studies explores the human quest for the transcendent as expressed in the world’s diverse religious traditions. It makes an essential contribution to the mission of Saint Joseph’s University as a Catholic Jesuit institution to strive “to be an inclusive and diverse community that educates and cares for the whole person, encouraging and modeling a lifelong commitment to thinking critically, making ethical decisions, pursuing social justice, and finding God in all things.” We and our students engage in the critical study of the historical evolution of theological and religious traditions. We are committed to a rigorous presentation of the methods and content of both Christian Theology and Religious Studies as academic disciplines.

In pursuit of this mission, the department recognizes four primary goals:

- Instill in students a capacity for methodical analysis and understanding of the world’s diverse theological and religious traditions;

- Provide students with a scholarly, multifaceted understanding of the foundations of Christian faith, its development in different times and cultures, and its implications for life in society, especially within the Roman Catholic tradition;
- Engage students in exploring the richness of the spiritual expressions and experiences encountered through the study of religions other than Christianity;
- Foster in students and professional colleagues an appreciation for the diversity that exists within the contemporary study of theology and religion as reflected in the department's faculty and their research endeavors.

Student Organizations

The Department sponsors a chapter of Theta Alpha Kappa, the national honor society for theology and religious studies. Students also participate in the activities of Campus Ministry and the post-graduate volunteer service programs. Faculty members advise students and alumni on career opportunities, job placements, and on professional and graduate school programs.

Faculty

An active department in research and scholarship, faculty members within the Department of Theology and Religious Studies have been featured in several impressive publications and have received awards and grants for their innovative teaching methods. Many are directors and members of the Institute for Jewish-Catholic Relations (<https://www.sju.edu/college-arts-and-sciences/ijcr/>) at Saint Joseph's University and have developed research on everything from the implications of technology and media on spiritual and moral practices to economic justice, human rights and human development.

Department of Theology & Religious Studies Faculty & Staff (<https://www.sju.edu/departments/theology-religious-studies/faculty-staff/>)

Programs

Undergraduate Majors

- Religious Studies (p. 189)
- Theology (p. 191)

Undergraduate Minor

- Theology and Religious Studies (p. 191)

Religious Studies Major Overview

The Theology and Religious Studies Department offers two majors which are distinguished by virtue of both their primary content and their methodological approach. Students may choose one of these majors in conjunction with their other studies, or they may double major within the department and get a degree in both Theology and in Religious Studies.

Religious Studies focuses upon the study of one or more non-Christian religions. Methodologically, Religious Studies is devoted to the study of religion as a fundamental human phenomenon. Its scope is broad, encompassing in principle all forms of religious experience, belief and practice in whatever contexts they are found. Religious Studies is nonconfessional in the sense that it is not committed in advance to any religious (or indeed, non-religious) worldview or doctrine. Religious Studies as we understand it neither endorses a naïve objectivism in the

study of "facts" divorced from values nor elevates a single theological, philosophical or scientific principle or program to the level of an unassailable norm. Rather, Religious Studies is intentionally eclectic and open-ended, drawing upon the full range of methods available to the academic study of things human, from philosophy or literary theory, for example, to cognitive science and evolutionary psychology. It is united only by its subject matter, religion as a fundamental, albeit contested, dimension of human experience.

If you are more interested in focusing your studies on Christian Theology, please take a look at the Theology major. (<https://academiccatalog.sju.edu/arts-sciences/theology-religious-studies/theology-major/>)

Learning Goals and Objectives

Goal 1: Students will study at least two religious traditions beyond an introductory level, including their histories, beliefs, practices and contemporary expressions.

Outcome 1: Students will be able to identify and articulate the historical nature of religious texts and traditions, and the tensions that arise within religious communities as they undergo historical change.

Goal 2: Students will study the implications of religious belief for moral decision making and ethical action in the world.

Outcome 2: Students will be able to identify, define, and/or explain the content, core concepts, and theories that serve as the foundation for studying at least one non-Christian religious tradition.

Goal 3: Students will utilize methods of research and argumentations within the multidisciplinary context of the academic study of theology and religion.

Outcome 3: Students will be able to apply a variety of tools, methods, and perspectives to critically analyze and evaluate various components typical of most if not all religions.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151	Inequality in American Society 1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Mission-Overlay		
	Second semester of Non-Native Language	

Major Requirements

No one course may be counted more than once for the various requirements of the major. However, some courses might be eligible for more than one category. In those cases, students can choose which category the course would be applied to, in consultation with one's

advisor or the department chair. Students should consult with their advisors or the department chair to determine the best distribution of courses relative to their own interests and needs.

Code	Title	Hours
Encountering the Catholic Tradition ¹		
Will count for CCC: Theology		
THE 153	Encountering the New Testament	
THE 154	Catholic Theological Tradition	
THE 155	Catholic Social Tradition	
Institutional Identity Course		3
One additional THE course in any level in New Testament, History of Christianity, Systematic Theology, or Theological Ethics		
Methodology Course		3
REL 395	Approaches to Study of Religion	
REL 495	Theory & Method Study Religion	
Any one course in THE or REL at the 200 level or above		3
Non-Christian Religions		18
Six courses in non-Christian religions, with one covering South/East Asian religions and one covering Comparative religions.		
Research Requirement		3
In addition to completing the coursework, graduating seniors must demonstrate that they have completed at least one significant research paper in Theology or Religious Studies. This can be done in a variety of ways, including through courses, independent studies, Summer Scholars projects, or Honors Program projects. See your advisor for more information and to develop your plan.		
Total Hours		33

¹ While double-dipping may occur, duplicate credit for the same course will not be earned (e.g., taking THE 154 for the major and CCC Theology requirement will only earn 3 credits, not 6.) 120 total credits must be completed, in addition to all CCC and major requirements, in order to graduate. Complete enough free electives to reach or surpass 120 total credit hours.

Free Electives

Any 11-14 courses, depending upon how many overlays are taken as part of the courses for the major. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
REL 101	Comparative Religion	3
ENG 101	Craft of Language	3
Mathematics		3
Philosophy Level One		3
Non-Native Language		3-4
Hours		15-16
Spring		
THE 153 or THE 154 or THE 155	Encountering the New Testament or Catholic Theological Tradition or Catholic Social Tradition	3
Non-Christian Course (2 of 6)		3
Philosophy Level Two		3

World History	3
2nd Non-Native Language/Mission Overlay	3-4
Hours	15-16
Sophomore	
Fall	
Non-Christian Course (3 of 6)	3
Diversity	3
Fine, Performing Arts, Creativity	3
Social Science	3
INT 151	Inequality in American Society
Free Elective	3
Hours	16
Spring	
Institutional Identity course2	3
Non-Christian Course (4 of 6)	3
Writing Intensive	3
Literature	3
Free Elective	3
Hours	15
Junior	
Fall	
Non-Christian Course (5 of 6, South/East Asian Religion)	3
Methodology Course (REL 395 Approaches to the Study of Religion or REL/THE 495 Theories and Methods in the Study of Religion)3	3
Free Electives	9
Hours	15
Spring	
Natural Science	4
Non-Christian Course (6 of 6, Comparative)	3
THE or REL elective (200-level or higher)	3
Free Electives	6
Hours	16
Senior	
Fall	
Free Electives	15
Hours	15
Spring	
Free Electives	15
Hours	15
Total Hours	122-124

sources and methods appropriate to the discipline of Religious Studies.

Goal 2: Students will understand the implications of religious belief for moral decision making and ethical action in the world.

Outcome 2: Students will be able to articulate key ethical implications that arise from the study of theology and religion.

Goal 3: Students will appreciate the diversity of method, content, and history that exists within the contemporary academic disciplines of Theology and Religious Studies.

Outcome 3: Students will be able to articulate the nature and language of academic theological inquiry.

Requirements

A minor in Theology and Religious Studies can be fulfilled by taking any six courses taught within the department.

Code	Title	Hours
Required (one of the following):		3
THE 153	Encountering the New Testament	
THE 154	Catholic Theological Tradition	
THE 155	Catholic Social Tradition	
Five THE or REL courses		15
Total Hours		18

Theology Major

The Theology and Religious Studies Department offers two majors which are distinguished by virtue of both their primary content and their methodological approach. Students may choose one of these majors in conjunction with their other studies, or they may double major within the department and get a degree in both Theology and in Religious Studies.

Theology majors will focus primarily on Christianity. Theology, which literally means the "study of God," was described by Anselm of Canterbury as "faith seeking understanding." It entails methodical study of the faith traditions of a believing community. Christian Theology employs the methods of its sub-fields (e.g., systematic and historical theology, ethics, biblical studies) to explore the bible, Jesus Christ, the church, tradition history, doctrinal development, liturgy, personal and communal morality, and relations with other religions. It is not catechesis, which transmits knowledge about a religion to a believer without critically analyzing the tradition's beliefs. Theology requires a process of grappling with and critically examining particular expressions of faith in order to articulate them in contemporary contexts. In other words, theology seeks to address the "fears, hopes, griefs, and anxieties" (Second Vatican Council, Gaudium et Spes, no. 1) of church and world in the present moment. As a discipline, theology converses with the academy, the church, and society. The theology faculty and their students at Saint Joseph's University aim to assist each of these communities in appreciating the meaning and implications of the tenets and practices of Roman Catholic and other Christian traditions, as well as those of other religions.

If you are more interested in focusing your studies on religious traditions other than Christianity, please take a look at the Religious Studies major. (<https://academiccatalog.sju.edu/arts-sciences/theology-religious-studies/religious-studies-major/>)

Theology and Religious Studies Minor

A minor in Theology and Religious Studies can be fulfilled by taking any six courses taught within the department. Doing Theology and Religious Studies minor is relatively easy. A third of the minor will be completed by the required GEP or CCC courses; every student must take THE 153 OR 154 OR 155 and a Religious Difference course. Any student may take any two or all three courses, THE 153, 154, and 155; or any other combination of THE and REL classes. Any and all overlays taught within the department also count towards the minor.

Learning Goals and Outcomes

Goal 1: Students will study at least two religious traditions beyond an introductory level, including their histories, beliefs, practices and contemporary expressions.

Outcome 1: Students will be able to identify the foundations, historical development, and ethical ramifications of at least one religious tradition other than the Roman Catholic tradition, using

Learning Goals and Outcomes

Goal 1: Students will study at least two religious traditions beyond an introductory level, including their histories, beliefs, practices and contemporary expressions.

Outcome 1: Students will be able to identify, define, and/or explain the content, core concepts, and theories that serve as the foundation for select religious traditions.

Goal 2: Students will study the implications of religious belief for moral decision making and ethical action in the world.

Outcome 2: Students will be able to articulate the foundations, historical development, and ethical ramifications of the basic content of the Catholic faith using sources and methods appropriate to the discipline of Theology.

Goal 3: Students will utilize methods of research and argumentations within the multidisciplinary context of the academic study of theology and religion.

Outcome 3: Students will be able to utilize methods of research and argumentation within the multidisciplinary context of the academic study of theology and religion.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student’s Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student’s Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		

If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student’s overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student’s Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student’s overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student’s overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	
47-49	

Recommended CCC Courses

Code	Title	Hours
Mission-Overlay		
Second semester of Non-Native Language		

Major Requirements

Ten courses distributed as described below. At least eight must be at the 200-level or above.

No one course may be counted more than once for the various requirements of the major. However, some courses might be eligible for more than one category. In those cases, students can choose which category the course would be applied to, in consultation with one’s advisor or the department chair. Students should consult with their advisors or the department chair to determine the best distribution of courses relative to their own interests and needs.

Code	Title	Hours
Encountering the Catholic Tradition ¹		
Will count for CCC: Theology		
THE 153	Encountering the New Testament	3
THE 154	Catholic Theological Tradition	
THE 155	Catholic Social Tradition	
Bible Course		3
REL 211	Hebrew Bible	
REL 323	Psalms	

THE 221	Synoptic Gospels	
THE 222	Letters of Paul	
THE 337	Compassionate Care in Clin Set	
REL 324	Israelite Religion	
REL 322	Myth and History in the Bible	
Historical or Systematic Theology course		3
Methodology Course		
Theological Ethics		3
REL 395	Approaches to Study of Religion	
REL 495	Theory & Method Study Religion	
Non-Christian Religions		6
Two courses in non-Christian religions, which may not cover the same religious tradition.		
Major Electives		9
Complete three THE electives, one of which must be THE or REL at the 200-level or above. The other two may be any additional THE courses.		
Research Requirement		3
Graduating seniors must demonstrate that they have completed at least one significant research paper in theology or religious studies. This can be done in various ways, such as part of a standard course, an independent study, or an Honors thesis. Students should consult with their advisors to determine the route that would best fit with their course plans and interests.		
Total Hours		30

¹ While double-dipping may occur, duplicate credit for the same course will not be earned (e.g., taking THE 154 for the major and CCC Theology requirement will only earn 3 credits, not 6.) 120 total credits must be completed, in addition to all CCC and major requirements, in order to graduate. Complete enough free electives to reach or surpass 120 total credit hours.

Free Electives

Any 11-14 courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
THE 154 or THE 155	Catholic Theological Tradition or Catholic Social Tradition	3
ENG 101	Craft of Language	3
World History		3
Non-Native Language		3-4
Philosophy Level One		3
Hours		15-16
Spring		
REL 211	Hebrew Bible (or other REL 100 or 200 level course)	3
Philosophy Level Two		3
Mathematics		3-4
Social Science		3
2nd Non-Native Language/Mission Overlay		3-4
Hours		15-17

Sophomore		
Fall		
THE 153	Encountering the New Testament	3
INT 151	Inequality in American Society	1
Literature		3
Non-Christian Religions (200+ level)		3
Theological Ethics		3
Free Elective		3
Hours		16
Spring		
Fine, Performing Arts, Creativity		3
Historical/Systematic		3
Writing Intensive		3
Free Electives		6
Hours		15
Junior		
Fall		
REL or THE 395 or 495		3
Bible		3
Major Electives		6
Free Elective		3
Hours		15
Spring		
Natural Science		4
Non-Christian Religions (200+ level)		3
Major Elective		3
Diversity		3
Free Elective		3
Hours		16
Senior		
Fall		
THE 493	Ind Research in Theology	3
Free Electives		12
Hours		15
Spring		
THE 494	Ind Research in Theology	3
Free Electives		12
Hours		15
Total Hours		122-125

ERIVAN K. HAUB SCHOOL OF BUSINESS

Haub School of Business Leadership

Dean: Joseph A. DiAngelo, Jr., EdD

Associate Dean of Undergraduate Studies: Matthew Kelly

Associate Dean: Vana M. Zervanos, MEd, MBA, EdD

Associate Dean: Natalie Wood, PhD

Faculty Listing: Haub School of Business (<https://directory.sju.edu/haub-school-business/faculty/>)

Mission

The Haub School of Business is a component of the University which is administered by the Dean. The School of Business offers both graduate and undergraduate degrees. At the graduate level, Master of Business Administration (MBA) and Master of Science (MS) programs are offered. Undergraduate programs of the School lead to the degree of Bachelor of Science in Business Administration. The Haub School of Business serves the needs of both the traditional-aged and continuing education undergraduate normally enrolled in the evening. Associate degrees and certificate programs also are offered in the evening through the Haub Degree Completion Program.

Accounting

The accounting program is an intensive curriculum designed to develop a professional accountant. The coursework will prepare the student for an accounting career in industry, government or public accounting. The accounting major is designed to provide flexibility in the selection of arts and science courses from broad groupings to augment the professional development of the student. The Post-Baccalaureate certificate is designed for students with a non-accounting undergraduate degree that are interested in professional accounting certifications. The Master of Science in Professional Accountancy is designed to provide advanced skills for a rapidly changing accounting world.

Faculty

Well respected in the accounting industry, the faculty members in Saint Joseph's University's Accounting Department bring a wide range of applicable experience from previously held high-level positions at private and Big 4 accounting firms. Above all, they are deeply dedicated to helping students reach their academic and career objectives and go above and beyond to help them achieve success.

Department of Accounting Faculty & Staff (<https://www.sju.edu/departments/accounting/faculty-staff/>)

Programs

Undergraduate Major

- Accounting (p. 194)

Post-Baccalaureate Certificate

- Post-Baccalaureate Certificate in Accountancy (p. 196)

Graduate

- Professional Accountancy (p. 196)

Accounting Major

Learning Goals and Outcomes

Goal 1: Students will acquire strong functional knowledge of accounting, auditing and taxation. (Functional knowledge)

Outcome 1.1: Students will be able to demonstrate an understanding of the concepts and theories of generally accepted accounting principles (GAAP)

Outcome 1.2: Students will be able to demonstrate knowledge of financial statements, including the purpose, content and presentation methods and disclosure in reports

Outcome 1.3: Students will be able to demonstrate knowledge of generally accepted auditing standards (GAAS) and US income tax compliance procedures

Goal 2: Students will develop an awareness of, and an appreciation for, the professional responsibilities and ethical issues related to the field of accountancy. (Professional Responsibilities/Ignatian Tradition)

Outcome 2.1: Students will be able to demonstrate an ability to identify ethical issues in accounting, auditing and taxation matters

Outcome 2.2: Students will be able to demonstrate knowledge of the legal, ethical and regulatory environment of accounting, auditing and taxation

Outcome 2.3: Students will be able to demonstrate and ability to ethically employ information technology

Outcome 2.4: Students will be able to demonstrate and understanding of the importance of the accounting discipline in maintaining high standards of integrity in business and commercial activities and the need that fidelity in reporting has for orderly financial market operations.

Goal 3: Students will develop the competence to critical analyze accounting, auditing, and taxation issues. (Critical Thinking)

Outcome 3.1: Students will be able to demonstrate a superior ability to analyze financial statements from a user/investor perspective.

Outcome 3.2: Students will be able to demonstrate an ability to design, implement and evaluate accounting information systems for internal use in data gathering and control.

Goal 4: Students will be competent in communicating in the language of accounting, auditing, and taxation. (Communication)

Outcome 4.1: Students will exhibit competence in developing clear, effectively written documents which highlight accounting, auditing, or taxation activities.

Outcome 4.2: Students will be able to communicate clearly and effectively in composing and delivering oral presentations to a targeted audience.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
ACC 205	Fin Acc Info Sys I	3
ACC 206	Fin Acc Info Sys II	3
ACC 307	Fin Acc Info Sys III	3
ACC 315	Federal Income Taxation	3
ACC 317	Auditing & Assurance Services	3
ACC 423	Accounting Control Systems	3
One additional upper division accounting course		3
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		24-25

¹ In order for a student to declare a major in accounting or remain in the major, a grade of C (2.0) or better must be earned in both ACC 101, Concepts of Financial Accounting, and ACC 102, Managerial Accounting.

Free Electives

Five to nine courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ACC 101	Concepts of Financial Acct	3
DSS 100	Excel Competency	1
MGT 110 or MGT 120	Essent'ls of Organizational Beh or Essentials of Management	3
ECN 101	Introductory Economics Micro	3
Non-Native Language		3-4
World History		3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
Theology		3
ENG 101	Craft of Language	3
ECN 102	Introductory Economics Macro	3
MAT 120 or MAT 123 or MAT 155 or MAT 161	Precalculus or Differential Calculus or Fundamentals of Calculus or Calculus I	3
INT 151	Inequality in American Society	1
Hours		16
Sophomore		
Fall		
ACC 205	Fin Acc Info Sys I	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
Philosophy Level One		3
Free Elective		3
Hours		15
Spring		
ACC 206	Fin Acc Info Sys II	3
DSS 220	Business Analytics	3
Diversity		3
FIN 200 or FIN 225	Intro to Finance or Fund of Quantitative Finance	3
Philosophy Level Two		3
Hours		15
Junior		
Fall		
ACC 307	Fin Acc Info Sys III	3
MKT 201	Principles of Marketing	3
MGT 360	Legal Environment of Business	3
Free Electives		6
Hours		15
Spring		
ACC 315	Federal Income Taxation	3
ACC 317	Auditing & Assurance Services	3
Natural Science		4
Free Electives		6
Hours		16
Senior		
Fall		
Any upper-level ACC course		3
Religious Studies		3

Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
BUS 495	Business Strategy	3
ACC 423	Accounting Control Systems	3
Literature		3
Free Electives		3-6
Hours		12-15
Total Hours		120-124

CPA Information
CPA Information for Accounting

Students who intend to enter a career in professional public accounting practice should discuss program planning needed with their faculty advisor as early as possible in their academic studies in the Department. Additional detail about the Department's program and careers in accounting can be found on the University's web site at <https://www.sju.edu/departments/accounting> (<https://www.sju.edu/departments/accounting/>).

Click here for more information on the Masters of Science in Professional Accountancy. (p. 196)

Post-Baccalaureate Certificate in
Accountancy
Requirements

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
ACC 205	Fin Acc Info Sys I	3
ACC 206	Fin Acc Info Sys II	3
ACC 307	Fin Acc Info Sys III	3
ACC 315	Federal Income Taxation	3
ACC 317	Auditing & Assurance Services	3
ACC 423	Accounting Control Systems	3
DSS 100	Excel Competency	1
MGT 360	Legal Environment of Business	3
Electives		
Select three of the following: additional upper division (300 or 400 level) accounting courses, FIN 200, or MGT 362		9
Total Hours		37

Note: Students may transfer in no more than three of the above courses from previous undergraduate study.

Professional Accountancy MS

The Master of Science in Professional Accountancy program is designed to provide students with professional accountancy skills to compete in the rapidly changing accounting world. The program aligns with the SJU mission and meets the needs of students seeking the required 150 credit hours necessary to earn licensure as a Certified Public Accountant (CPA) in Pennsylvania and most other states. With technology enhanced coursework and in-depth case applications beyond the traditional undergraduate offerings, this program is also designed to allow students

to gain proficiency in other business disciplines. Our program is distinctive in that students can customize their course selection to match their professional goals.

Built upon our excellent working relationship with major accounting firms in the area, we have actively sought their input in designing the curriculum, in order to equip students with the skills and knowledge necessary to become ethically responsible leaders in the global accountancy profession. This program provides an academic program with a curriculum reflecting the realities of a fast changing global marketplace, recognizes the emergence of information technology as the most important driving force in revolutionizing business practices, and acknowledges the importance of professional ethics in all business activities and the value of life-long learning.

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>)

Learning Goals and Outcomes

Goal 1: Students will acquire strong functional knowledge of accounting and other business disciplines.

Outcome 1.1: Students will demonstrate competency in communicating effectively in the language of business.

Goal 2: Students will develop an understanding of the Ignatian values on ethical issues and Jesuit traditions related to the field of accountancy.

Outcome 2.1: Students will develop the ability to apply this knowledge to professional responsibilities.

Goal 3: Students will develop the competence to critically analyze information and data as the basis for solving problems and making decisions.

Requirements

Code	Title	Hours
Five Accounting classes from the list below:		15
ACC 601	Tax Planning	
ACC 610	Fin Statement Analy&Valuation	
ACC 615	Special Topics in Fed Taxation	
ACC 617	Audit Decision Analytics	
ACC 622	Forensic Accounting	
ACC 623	Accounting Control Systems	
ACC 670	Special Topics in Accounting	
15 credits of Elective in ACC, ODL, DSS, MGT, FIN, MKT, HRM		15
Total Hours		30

Business Administration Programs

Undergraduate Major

- Business Administration (p. 197)

Undergraduate Minor

- Business Minor for Non-Business Majors (p. 199)

Graduate

- Master of Business Administration (<https://academiccatalog.sju.edu/business/business-administration/mba/>)
- Doctor of Business Administration (p. 199)
- Executive Master of Business Administration (<https://academiccatalog.sju.edu/business/business-administration/executive-mba/>)

Business Administration Certificate of Proficiency Requirements

(No Bachelor's Degree is required)

This certificate requires a minimum of eight (8) undergraduate level courses from any Haub School of Business subject areas.

Note: Students must fulfill all course prerequisites for the courses they wish to register for. While these may be fulfilled by prior study at SJU or another institution, students will not receive transfer credit for any courses from previous undergraduate study.

Business Administration Major

The Business Administration Major is designed to offer students a broad perspective on business. The core curriculum of the major provides students insights into consumer and buyer behavior; tools to be an effective leader; and an understanding of various financial markets, interest rates, and monetary theory. Students have the flexibility to expand on this foundation of marketing, leadership, and finance to tailor the remainder of their curriculum based on their career aspirations and interests. You may only double major or minor in a college/school other than the Haub School of Business if you declare a Business Administration major.

Learning Goals and Outcomes

Outcome 1: Students will learn how consumer and business needs and wants are converted into satisfactions emphasizing the core processes of customer decision making.

Outcome 2: Students will learn theories, skills, and tools to understand effective leadership.

Outcome 3: Students will learn the role and working of various markets and interest rate theory, along with the foundations of monetary theory and policy.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
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Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
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Religious Studies	3
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Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
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INT 151	Inequality in American Society	1
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Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
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Natural Science	4
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Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
MKT 302	Consumer & Buyer Behavior	3
MGT 211	Perspectives on Leadership	3
FIN 201	Markets and Institutions	3
Three upper-division courses from two or more different departments, choosing among the subjects of: ACC, DSS, FIN, RMI, FMK, HAD, PMK, IBU, MGT, MKT ¹		9
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		21-22

¹ These courses must be in addition to any course that is part of the Business core and must be in at least two different departments, not majors (e.g., IBU and MGT classes are both in the Management Department). Due to the interdisciplinary nature of this degree, students majoring in Business Administration can NOT double major or minor within the Haub School of Business. A double major or minor in any other college/school would be permitted, with appropriate permissions from the program's department.

Free Electives

Six or seven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organizational Beh	3
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
Non-Native Language or Mathematics		3-4
World History		3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Theology or MGT 110/120		3
Mathematics or Non-Native Language		3-4
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
Philosophy Level One		3
Free Elective		3
Hours		15
Spring		
MGT 211	Perspectives on Leadership	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
FIN 201	Markets and Institutions	3
MKT 302	Consumer & Buyer Behavior	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective		3
Hours		15
Spring		
Major Elective		3
Diversity		3
Natural Science		4
Free Electives		6
Hours		16
Senior		
Fall		
Major Elective		3
Fine & Performing Arts, Design & Creativity		3
BUS 495	Business Strategy	3
Free Electives		6
Hours		15
Spring		
Major Elective		3
Literature		3

Free Electives	6-9
Hours	12-15
Total Hours	120-125

Business Minor for Non-Business Majors Requirements

Non Haub School of Business majors may opt to minor in Business Administration by taking the following seven courses:

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
FIN 200	Intro to Finance	3
MGT 110 or MGT 120 or MGT 121	Essent'ls of Organizational Beh Essentials of Management Organizations in Perspc Honors	3
MKT 201	Principles of Marketing	3
Total Hours		19

Note: Students who have completed a course in statistics may substitute any other business course for DSS 210 with the approval of the department chair. ACC 101 and ECN 101 are prerequisites for FIN 200.

Doctor of Business Administration

The Doctor of Business Administration (DBA) program is designed for professionals with extensive experience in senior leadership positions who are looking to learn the applied research tools needed to transform business practice and investigate real-world complex problems. It will enhance your personal and professional development by fueling your research curiosity.

The DBA is a three-year, cohorted part-time program. Our hybrid online and limited on-campus residency format allows you to pursue your degree while continuing to work full-time. With limited on-campus residencies and personalized mentorship, this three-year, part-time program uniquely combines the best of face-to-face and online learning.

As a DBA student, you will develop your individualized program of research around issues directly related to your interests and experience. Your research will culminate in a dissertation that contributes to the body of knowledge in your field.

The program is lockstep with a new cohort beginning each fall semester. The course work will be completed in two years, with students enrolling in two courses conducted during fourteen-week sessions per semester (fall, spring and summer) with a final year for focused dissertation work. If necessary, the dissertation research may be extended into a fourth year.

Admission requirements include:

- 10 years of management experience we at least 7 at a senior or executive level
- MBA or equivalent MS in a business related field from a regionally accredited institution with a GPA of 3.3. or higher

Requirements

Code	Title	Hours
BUS 800	Introduction to Research	3
BUS 801	Quantitative Res. Methods I	3
BUS 802	Quantitative Res. Methods II	3
BUS 803	Qualitative Res. Methods I	3
BUS 804	Qualitative Res. Methods II	3
BUS 805	Financial Markets and Policies	3
BUS 806	Seminar: Innovative Pedagogy	2
BUS 807	Business Projects Practicum	3
BUS 814	Research Writing	1
Applied Research: Select four (4) courses:		12
BUS 808	Applied Accounting Research	
BUS 809	Applied Data Analytic Research	
BUS 810	Applied Finance Research	
BUS 811	Applied Marketing Research	
BUS 812	Applied Strategy Research	
BUS 813	Organizational Behavior Res.	
Total Hours		36

Decision & System Sciences

Business Intelligence and Analytics (BIA) majors acquire general business skills plus knowledge and experience in the theory of decision making, process analysis, database management, decision support systems, data visualization, data mining, statistical analysis, business analytics, competitive intelligence, knowledge management, business intelligence, supply chain, operations management, and enterprise security. Technology employed in the DSS curriculum includes Microsoft Office, Oracle, SAP, Python, R, JMP, Minitab, Tableau, Qlik and Power BI.

The Business Intelligence and Analytics (BIA) minor is designed to enhance the skill set of both business and arts & sciences majors so that they are fundamentally better equipped to succeed in a data-intensive world. Organizations typically gather information in order to assess their operating environment to conduct marketing research or customer relationship management, and to perform competitor analysis. Organizations accumulate business intelligence in order to gain sustainable competitive advantage and regard such intelligence as a valuable core competence.

Most disciplines offered within a business school have a very clearly defined path. Students who study business intelligence and analytics at Saint Joseph's University take a different approach. The breadth of subjects explored within the BIA programs uniquely prepare students for careers in technology management and management consulting.

Job prospects and potential salary for our graduates and pay are excellent. Our programs were developed by industry for industry. BIA programs are designed for people who want to distinguish themselves from their peers by acquiring a set of essential skills that really make a difference in today's organizations.

The Artificial Intelligence for Business (AIB) major and minor are designed to provide an opportunity to all business majors. They will gain an understanding of the applied use of data mining, data visualization, and machine learning and artificial intelligence. The International Data Corporation (<https://www.idc.com/>) predicts that data will grow from 33 zettabytes to 175 zettabytes by 2025. A zettabyte is approximately the

size of a trillion gigabytes. This is a 61% compounded annual growth rate. Around half of this data will likely live in the cloud. The numbers are staggering and the implications are huge. AIB give analysts the ability to process and find meaning in these extremely large data sets. AIB are not only prized skills, but will likely become the most demanded skill for job applicants in the coming years.

The Supply Chain Management (SCM) major and minor present additional, separate and unique, programs of study for BIA majors and minors, as well as other majors in the business school. By adding a major in Supply Chain Management to the existing curriculum, students will obtain the specialized knowledge required for supply chain decisions and efficiencies in operations. This area of study has been around for many years, but with major disruptions and increased technical applications, is one of the most important frontiers in industry and will be important for many years to come.

Master of Science in Business Intelligence and Analytics program prepares students to be leaders in their organizations who can leverage organizational knowledge and find success in their data. This focus prepares 21st century professionals to drive organizational performance in all functional areas by using data to develop new opportunities, gain competitive advantage, identify effective strategies, and improve decision-making.

Master of Science in Medical Health Informatics program prepares students to implement and utilize information technology to support any healthcare organization. Our students are guided by a philosophy of inquiry, insight, and innovation. Students will be challenged to think boldly and to seek out and answer difficult questions using healthcare data. The learning environment will prepare students for the challenges of a professional career in a healthcare setting. The program will help students to develop the competencies and acquire the practical tools to succeed in today's digital healthcare environment.

Please note: Due to the nature of software applications used in our majors, we ask that students purchase windows based operating systems. The recommended configuration may be found here (<https://www.sju.edu/haub-school-business/resources/laptop/>).

Faculty

Well respected in the business intelligence and analytics industry, the faculty members in Saint Joseph's University's decision and system sciences department bring a wide range of applicable experience. The majority of our faculty members have been published in well-regarded technical publications and bring hands-on knowledge from previously held high-level positions with prestigious organizations and Fortune 500 companies.

Department of Decision and System Sciences Faculty & Staff (<https://www.sju.edu/departments/dss/faculty-staff/>)

Programs

Undergraduate Majors

- Artificial Intelligence for Business (p. 201)
- Business Intelligence & Analytics (p. 203)
- Supply Chain Management (p. 211)

Undergraduate Minors

- Artificial Intelligence for Business (p. 203)
- Business Intelligence & Analytics (p. 205)
- Supply Chain Management (p. 213)

Graduate

- Business Intelligence and Analytics (p. 206)
- Dual MHI/MS Health Informatics/Business Intelligence (p. 210)

Graduate Certificates

- Data Analytics (p. 207)
- Data Management (p. 207)
- Data Science (p. 207)

Artificial Intelligence for Business Major

The Artificial Intelligence for Business major is designed to provide an opportunity to all business majors. They will gain an understanding of the applied use of data mining, data visualization, and machine learning and artificial intelligence.

The International Data Corporation (<https://www.idc.com/>) predicts that data will grow from 33 zettabytes to 175 zettabytes by 2025. A zettabyte is approximately the size of a trillion gigabytes. This is a 61% compounded annual growth rate. Around half of this data will likely live in the cloud. The numbers are staggering and the implications are huge.

The program gives analysts the ability to process and find meaning in these extremely large data sets. These are not only prized skills, but will likely become the most demanded skill for job applicants in the coming years.

Further, the SAS Institute asserts that "...it's possible to quickly and automatically produce models that can analyze bigger, more complex data and deliver faster, more accurate results – even on a very large scale." This helps organizations to be increasingly capable in a highly competitive world, while minimizing unknown risks (https://www.sas.com/en_us/insights/analytics/machine-learning.html).

Learning Goals and Outcomes

Goal 1: Students will be able to demonstrate a conceptual and intuitive understanding of the common machine learning algorithms (inc. Supervised and Unsupervised Learning) and when each kind of technique may be appropriate.

Goal 2: Students will be able to define the structure and components of a Python program (using loops, decision statements, functions, and libraries). Additionally, they will be able to work with Python libraries for data processing, and data visualization.

Goal 3: Students will be able to design and implement various machine learning algorithms in a range of business applications.

Goal 4: Students will demonstrate the use of data mining models that can identify hidden patterns and rules.

Goal 5: Students will be able to communicate clearly and effectively in composing and delivering oral presentations to the target audience.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent’ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
DSS 325	Open Source Program Lang	3
DSS 415	Data Wrangling & Visualization	3
or DSS 416	Data Wrangling: Ethics Int.	
DSS 420	Introduction to Data Mining	3
DSS 451	Machine Learning for Bus I	3
DSS 455	Machine Learning for Bus II	3
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
DSS Elective (select one of the following):		3
DSS 330	Database Management	
DSS 425	Analytics Cup	
DSS 435	Advanced Business Analytics	
DSS 445	Statistical Programming Lang	
DSS 447	Resilient Supply Chains	
DSS 465	Supply Chain Analytics	
DSS 470	DSS Special Topics I	

DSS 471	DSS Special Topics II
DSS 493	Independent Study I
DSS 494	Independent Study II
Total Hours	21-22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent’ls of Organzational Beh	3
or MGT 120	or Essentials of Management	
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
Mathematics (MAT 123, 155 or 161)		3-4
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ECN 102	Introductory Economics Macro	3
or ECN 101	or Introductory Economics Micro	
ENG 101	Craft of Language (or World History)	3
Non-Native Language		3-4
Literature		3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
FIN 200	Intro to Finance	3
Theology		3
Hours		15
Spring		
DSS 220	Business Analytics	3
Diversity		3
Natural Science		4
Philosophy Level One		3
Free Elective/Writing Intensive <small>consider FMK 250, HAD 304</small>		3
Hours		16
Junior		
Fall		
DSS 325	Open Source Program Lang	3
DSS 415	Data Wrangling & Visualization	3
or DSS 416	or Data Wrangling: Ethics Int.	
MGT 360	Legal Environment of Business	3
Free Electives		6
Hours		15
Spring		
DSS 420	Introduction to Data Mining	3
Philosophy Level Two		3
Major Elective		3

Free Electives	6
Hours	15
Senior	
Fall	
DSS 451 Machine Learning for Bus I	3
BUS 495 Business Strategy	3
Fine & Performing Arts, Design & Creativity	3
Free Electives	6
Hours	15
Spring	
DSS 455 Machine Learning for Bus II	3
Religious Studies	3
Free Electives	9
Hours	15
Total Hours	123-125

Artificial Intelligence for Business Minor

The Artificial Intelligence minor is designed to provide an opportunity to all business majors. They will gain an understanding of the applied use of data mining, data visualization, and machine learning and artificial intelligence.

The International Data Corporation (<https://www.idc.com/>) predicts that data will grow from 33 zettabytes to 175 zettabytes by 2025. A zettabyte is approximately the size of a trillion gigabytes. This is a 61% compounded annual growth rate. Around half of this data will likely live in the cloud. The numbers are staggering and the implications are huge.

The program gives analysts the ability to process and find meaning in these extremely large data sets. These are not only prized skills, but will likely become the most demanded skill for job applicants in the coming years.

Further, the SAS Institute asserts that “...it’s possible to quickly and automatically produce models that can analyze bigger, more complex data and deliver faster, more accurate results – even on a very large scale.” This helps organizations to be increasingly capable in a highly competitive world, while minimizing unknown risks (https://www.sas.com/en_us/insights/analytics/machine-learning.html).

Learning Goals and Outcomes

Goal 1: Students will be able to demonstrate a conceptual and intuitive understanding of the common machine learning algorithms (inc. Supervised and Unsupervised Learning) and when each kind of technique may be appropriate.

Goal 2: Students will be able to define the structure and components of a Python program (using loops, decision statements, functions, and libraries). Additionally, they will be able to work with Python libraries for data processing, and data visualization.

Goal 3: Students will be able to design and implement various machine learning algorithms in a range of business applications.

Goal 4: Students will demonstrate the use of data mining models that can identify hidden patterns and rules.

Goal 5: Students will be able to communicate clearly and effectively in composing and delivering oral presentations to the target audience.

Requirements

Code	Title	Hours
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
DSS 325	Open Source Program Lang	3
DSS 420	Introduction to Data Mining	3
DSS 451	Machine Learning for Bus I	3
DSS 455	Machine Learning for Bus II	3
Total Hours		18

Business Intelligence & Analytics Major Overview

Business Intelligence and Analytics (BIA) majors acquire general business skills plus knowledge and experience in the theory of decision making, process analysis, database management, decision support systems, data visualization, data mining, statistical analysis, business analytics, competitive intelligence, knowledge management, business intelligence, supply chain, operations management, and enterprise security. Technology employed in the DSS curriculum changes to ensure that we stay on the leading edge, and includes Microsoft Office, Oracle, SAP, Python, R, JMP, Minitab, Tableau, Alteryx, and Power BI.

The area of Business Intelligence and Analytics is critical to helping students understand data. You’ll learn to use the information to guide organizations in making strategic business decisions. Advances in technology have helped organizations collect a vast amount of data ranging from customer preferences to trends in sales.

The Department of Decision and System Sciences is dedicated to equipping students with the relevant skills to succeed in a technology-driven, data-intensive world. The BIA Programs focus on technology-related activities that:

- enhance technology use,
- data transformation, and
- analytics-based decision making.

Graduates go on to work in any discipline where strong technology, analytics and business intelligence skills are needed. We strive to create ethical, socially aware, technology-savvy leaders and problem solvers who contribute to a wide array of professions and professional environments. We provide industry-focused programs that prepare students to transform data into actionable knowledge to drive decision-making. Students are discerning in their use of information and are critical thinkers and effective communicators of meaningful analysis.

Learning Goals and Outcomes

Outcome 1: Students will be able to prepare data of any size for data mining analytics.

Outcome 2: Students will demonstrate the use of data mining models that can identify hidden patterns and rules.

Outcome 3: Students will be able to identify and minimize biases in data collection, and correctly interpret BI&A results.

Outcome 4: Students will be able to communicate clearly and effectively in composing and delivering oral presentations to the target audience.

Outcome 5: Students will be able to weigh the ethics and the impact on society when confronted with a business decision making situation.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Six courses (note that students may take one elective from outside the DSS department, the second elective must be a DSS course)

Code	Title	Hours
Required Core		
DSS 315	BIA Concepts & Practices	3
DSS 330	Database Management	3
DSS 420	Introduction to Data Mining	3
DSS 435	Advanced Business Analytics	3
DSS Electives (Select two of the following):		6
DSS 325	Open Source Program Lang	
DSS 415	Data Wrangling & Visualization	
or DSS 416	Data Wrangling: Ethics Int.	
DSS 425	Analytics Cup	
DSS 430	Alternative Risk Financing	
DSS 440	Six Sigma Apps & Foundations	
DSS 445	Statistical Programming Lang	

DSS 451	Machine Learning for Bus I	
DSS 455	Machine Learning for Bus II	
DSS 465	Supply Chain Analytics	
DSS 470	DSS Special Topics I	
DSS 471	DSS Special Topics II	
DSS 493	Independent Study I	
DSS 494	Independent Study II	
ECN 365	Game Theory	
FMK 301	Food Marketing Research	
MHI 301	Health Info Management Systems	
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		21-22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh or Essentials of Management	3
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
Mathematics (MAT 123, 155 or 161)		3-4
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
Non-Native Language		3-4
ENG 101	Craft of Language (or World History)	3
Literature		3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
FIN 200	Intro to Finance	3
Theology		3
Hours		15
Spring		
DSS 220	Business Analytics	3
Diversity		3
Natural Science		4
Philosophy Level One		3

Free Elective/Writing Intensive <small>consider FMK 250, HAD 304</small>		3
Hours		16
Junior		
Fall		
DSS 315	BIA Concepts & Practices	3
DSS 330	Database Management	3
MGT 360	Legal Environment of Business	3
Free Electives		6
Hours		15
Spring		
DSS 435	Advanced Business Analytics	3
DSS 420	Introduction to Data Mining	3
Philosophy Level Two		3
Free Electives		6
Hours		15
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
Major Elective		3
Religious Studies		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Business Intelligence & Analytics Minor

The Business Intelligence and Analytics (BIA) minor is designed to enhance the skill set of both business and arts & sciences majors so that they are fundamentally better equipped to succeed in a data-intensive world. Organizations typically gather information in order to assess their operating environment to conduct marketing research or customer relationship management, and to perform competitor analysis. Organizations accumulate business intelligence in order to gain sustainable competitive advantage and regard such intelligence as a valuable core competence.

The area of Business Intelligence and Analytics is critical to helping students understand data. You'll learn to use the information to guide organizations in making strategic business decisions. Advances in technology have helped organizations collect a vast amount of data ranging from customer preferences to trends in sales.

The Department of Decision and System Sciences is dedicated to equipping students with the relevant skills to succeed in a technology-driven, data-intensive world. The BIA Programs focus on technology-related activities that:

- enhance technology use,
- data transformation, and
- analytics-based decision making.

Graduates go on to work in any discipline where strong technology, analytics and business intelligence skills are needed. We strive to create ethical, socially aware, technology-savvy leaders and problem solvers who contribute to a wide array of professions and professional

environments. We provide industry-focused programs that prepare students to transform data into actionable knowledge to drive decision-making. Students are discerning in their use of information and are critical thinkers and effective communicators of meaningful analysis.

Learning Goals and Outcomes

- Outcome 1:** Students will be able to prepare data of any size for data mining analytics.
- Outcome 2:** Students will demonstrate the use of data mining models that can identify hidden patterns and rules.
- Outcome 3:** Students will be able to identify and minimize biases in data collection, and correctly interpret BI&A results.
- Outcome 4:** Students will be able to communicate clearly and effectively in composing and delivering oral presentations to the target audience.
- Outcome 5:** Students will be able to weigh the ethics and the impact on society when confronted with a business decision making situation.

Requirements

Code	Title	Hours
Required Courses		
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
DSS 315	BIA Concepts & Practices	3
DSS 330	Database Management	3
DSS 420	Introduction to Data Mining	3
Select one of the following:		3
DSS 325	Open Source Program Lang	
DSS 415	Data Wrangling & Visualization	
or DSS 416	Data Wrangling: Ethics Int.	
DSS 425	Analytics Cup	
DSS 440	Six Sigma Apps & Foundations	
DSS 445	Statistical Programming Lang	
DSS 435	Advanced Business Analytics	
DSS 451	Machine Learning for Bus I	
DSS 455	Machine Learning for Bus II	
DSS 465	Supply Chain Analytics	
DSS 470	DSS Special Topics I	
DSS 471	DSS Special Topics II	
Total Hours		18

Business Intelligence & Analytics MS

In the contemporary enterprise, the understanding of information systems, processes, and organizational knowledge is critical to success. The successful twenty-first century decision-maker will use this information for competitive advantage and for enterprise growth. The objective of the Master of Science in Business Intelligence & Analytics Program (MSBIA) in the Haub School of Business at Saint Joseph's University is to provide the student with an enhanced foundation in both information technology and quantitative decision-making tools.

Learning Goals and Outcomes

- Goal 1:** Students will demonstrate understanding of the value of decision and systems technologies and be able to create business models for

forecasting and business analysis. This requires the understanding of organizational flows of information and control and the impacts that these flows have on operations.

- Goal 2:** Students will demonstrate critical thinking skills, that is, the process of conceptualizing, applying, analyzing, synthesizing, and/or evaluating information as the basis for solving problems and making decisions.
- Goal 3:** Students will demonstrate the ability to correspond effectively and persuasively in a business format. This includes communicating quantitative information using both a technical and non-technical terms, with individuals and within teams.
- Goal 4:** Students will be able to apply ethical decision making in the area of business intelligence and analytics and to understand the relationship between data, ethics, and the organizational framework.
- Goal 5:** Students will demonstrate the principles of a structured programming language and be able to describe, design, implement, and test programming code using current data analysis techniques and methodology to support business decision-making.

Requirements

The MS degree requires completion of 30 credits with a cumulative GPA of 3.0 or better in courses taken at SJU. Prerequisites or co-requisites are required for courses listed below and are met through the scheduled course sequence.

Code	Title	Hours
DSS 610	Business Analytics	3
Electives: 9 courses		27
DSS 605	Emerging Tech for Business	
DSS 615	Python Programming	
DSS 620	Con & Pract of DSS Modeling	
DSS 625	Fund of Database Mgmt Systems	
DSS 630	Database Mgmt Theory & Pract	
DSS 640	Managing Data Intelligence	
DSS 650	Process Simulation & Analysis	
DSS 660	Introduction to Data Mining	
DSS 665	R Statistical Language	
DSS 670	Data Visual & Perf Analyt	
DSS 676	Data Wrangling & Adv Visualtn	
DSS 680	Predictive Analytics	
DSS 690	Special Topics Course	
DSS 694	Special Topics	
DSS 710	Six Sigma Apps & Found	
DSS 720	Supply Chain Analytics	
DSS 730	Digital Analytics	
DSS 740	Analytics w/ Machine Learning	
DSS 750	Fundamentals of Cyber Security	
DSS 760	CPS Framework	
DSS 790	Adv Topics: Cyber Analytics	
Total Hours		30

SAS Certificate

The SAS Institute has endorsed the Master of Science in Business Intelligence & Analytics Program within the Haub School of Business and presents those who completed its program with a Business Intelligence Certificate, certified by SAS. This certificate will be issued to students who graduate from the MSBIA Program after January 2011 and successfully complete DSS 660 and DSS 680.

Data Analytics Graduate Certificate

Data analytics is one of today's fastest-growing and highest-paid professions as organizations increasingly rely on data to drive strategic business decisions. The Data Analytics certificate is a post-baccalaureate certificate designed to prepare you to apply data analytics techniques to large data sets to support data-driven decisions across application domains. The courses are designed for learners with a quantitative background who want to advance their skills. You'll learn statistical and scientific methods for data analysis through hands-on exercises and video instruction from faculty experts, preparing you to make sound, evidence-based decisions that drive business performance in any function.

To learn more and apply, please visit <https://www.sju.edu/degree-programs/data-analytics-certificate> (<https://www.sju.edu/degree-programs/data-analytics-certificate/>)

Learning Goals and Outcomes

Goal 1: Students will demonstrate critical thinking skills, that is, the process of conceptualizing, applying, analyzing, synthesizing, and/or evaluating information as the basis for solving problems and making decisions.

Goal 2: Students will demonstrate the ability to correspond effectively and persuasively in a business format. This includes communicating quantitative information using both a technical and non-technical terms, with individuals and within teams.

Requirements Statistics Proficiency

All students in the Data Analytics Certificate program must demonstrate proficiency in statistics prior to the start of DSS 610 through an online learning module (ALEKS). Students with strong statistical background may test out. Students must complete 100% of the module before the start of DSS 610. Further details can be obtained from the MSBIA Program Director or HSB Graduate Program Office.

Requirements

Code	Title	Hours
DSS 610	Business Analytics	3
DSS 660	Introduction to Data Mining	3
DSS 670	Data Visual & Perf Analyt	3
DSS 680	Predictive Analytics	3
Total Hours		12

Data Management Graduate Certificate

The Data Management certificate is a post-baccalaureate certificate that will enable you to develop an understanding of the data in your organization. The series of the course equips you with knowledge to define, agree and manage information concepts that impact business strategy. The stream emphasizes the data model as the foundation to achieve this understanding. In addition, the stream focuses on employing artificial intelligence for workflow management and applying AI solutions to business. Data model artifacts are used as part of the data governance toolkit to develop applications that adhere to a set of data standards.

To learn more and apply, visit <https://www.sju.edu/degree-programs/data-management-certificate> (<https://www.sju.edu/degree-programs/data-management-certificate/>)

Learning Goals and Outcomes

Goal 1: Students will demonstrate understanding of the value of decision and systems technologies and be able to create business models for forecasting and business analysis. This requires the understanding of organizational flows of information and control and the impacts that these flows have on operations.

Goal 2: Students will be able to apply ethical decision making in the area of business intelligence and analytics and to understand the relationship between data, ethics, and the organizational framework.

Requirements Statistics Proficiency

All students in the Data Management Certificate program must demonstrate proficiency in statistics prior to the start of DSS 610 through an online learning module (ALEKS). Students with strong statistical background may test out. Students must complete 100% of the module before the start of DSS 610. Further details can be obtained from the MSBIA Program Director or HSB Graduate Program Office.

Requirements

Code	Title	Hours
DSS 610	Business Analytics	3
DSS 630	Database Mgmt Theory & Pract	3
DSS 640	Managing Data Intelligence	3
DSS 694	Special Topics (Must be: "Current State of the Field" special topics course, Other special topics courses will not apply.)	3
Total Hours		12

Data Science Graduate Certificate

In today's world, managing a business or organization is more science than art. The Data Science certificate is a post-baccalaureate certificate that equips you with a data science skill set in demand by employers. Data science and machine learning employ a collection of models, methods, and algorithms to help you making well-informed, data-driven decisions. You will learn the theoretical background of these techniques and how to implement them using common programming languages.

Incorporating numerous case studies, the courses are designed to enhance your data interpretation skills.

To learn more and apply, please visit <https://www.sju.edu/degree-programs/data-science-certificate> (<https://www.sju.edu/degree-programs/data-science-certificate/>)

Learning Goals and Outcomes

Goal 1: Students will demonstrate critical thinking skills, that is, the process of conceptualizing, applying, analyzing, synthesizing, and/or evaluating information as the basis for solving problems and making decisions.

Goal 2: Students will demonstrate the principles of a structured programming language and be able to describe, design, implement, and test programming code using current data analysis techniques and methodology to support business decision-making.

Requirements

Statistics Proficiency

All students in the Data Science Certificate program must demonstrate proficiency in statistics prior to the start of DSS 610 through an online learning module (ALEKS). Students with strong statistical background may test out. Students must complete 100% of the module before the start of DSS 610. Further details can be obtained from the MSBIA Program Director or HSB Graduate Program Office.

Requirements

Code	Title	Hours
DSS 610	Business Analytics	3
DSS 615	Python Programming	3
DSS 660	Introduction to Data Mining	3
DSS 740	Analytics w/ Machine Learning	3
Total Hours		12

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
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Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3

PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5

Total Hours **140**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3

PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23
Summer		
Haub course/Professional Elective		3
Hours		3

Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Health Informatics/ Business Intelligence MHI/MS

In the contemporary enterprise, the understanding of information systems, processes, and organizational knowledge is critical to success. The successful twenty-first century decision-maker will use this information for competitive advantage and for enterprise growth. The objective of the Master of Science in Business Intelligence & Analytics Program (MSBIA) in the Haub School of Business at Saint Joseph's University is to provide the student with an enhanced foundation in both information technology and quantitative decision-making tools.

The Health Informatics program prepares students to implement and utilize information technology to support any healthcare organization. Our students are guided by a philosophy of inquiry, insight, and innovation. Students will be challenged to think boldly and to seek out and answer difficult questions using healthcare data. The learning environment will prepare students for the challenges of a professional career in a healthcare setting. The program will help students to develop the competencies and acquire the practical tools to succeed in today's digital healthcare environment.

The dual degree of MS in Business Intelligence and Analytics and the Master of Health Informatics (MHI) is an innovative 48 credit hour applied graduate degree program that addresses the intersection of data analytics, healthcare and information technology to develop and analyze efficient systems and processes. It allows graduate students to obtain the specialized knowledge required for advanced analytics used in business and healthcare. This area of study is one of the next frontiers in industry and will be important for many years to come with an estimated growth of 25% over the next decade. The demand for Health IT employment is expected to grow by 15% adding over 29,000 jobs between 2014 and 2024 and the rate of employment of medical records and health information technicians to increase by 21 percent from 2010 to 2020, faster than the average growth rate for all occupations (14 percent).

Learning Goals and Outcomes

Goal 1: Stakeholder Value/Functional: Students will demonstrate understanding of the value of decision and systems technologies and be able to create business models for forecasting and business analysis. This requires the understanding of organizational flows of information and control and the impacts that these flows have on operations.

Goal 2: Stakeholder Value/Functional: Describe the history, goals, methods (including data and information used and produced), and current challenges of the major health science fields. Identify the effects

of social, behavioral, legal, psychological, management, cognitive, and economic theories.

Goal 3: Problem Solving/Critical Thinking: Students will demonstrate critical thinking skills, that is, the process of conceptualizing, applying, analyzing, synthesizing, and/or evaluating information as the basis for solving problems and making decisions. Identify the applicable information science and technology concepts, methods, and tools, to solve health informatics problems.

Goal 4: Communication/Interpersonal Skills: Students will demonstrate the ability to correspond effectively and persuasively in a business format. This includes communicating quantitative information using both technical and non-technical terms, with individuals and within teams.

Goal 5: Ignatian Values: Students will be able to apply ethical decision making in the area of business intelligence and analytics and healthcare, and to understand the relationship between data, ethics, and the organizational framework.

Goal 6: Programming & Technical Skills: Students will be able to design and implement various health informatics methodologies correctly in a range of health care business applications. Students will also demonstrate the principles of a structured programming language and be able to describe, design, implement, and test programming code using current data analysis techniques and methodology to support business decision-making.

Requirements

Code	Title	Hours
DSS 610	Business Analytics	3
DSS 625	Fund of Database Mgmt Systems	3
HAD 559	Health Policy	3
MHI 550	Research Methods	3
MHI 560	Health Informatics	3
MHI 561	Digital and Connected Health	3
MHI 563	Data Analysis for Health Care	3
MHI 564	Privacy&Security: Health Care	3
or DSS 750	Fundamentals of Cyber Security	
MHI 565	Health Data Standards	3
MHI 700	Health Informatics Capstone	3
MHI Elective (Select one of the following)		3
HAD 552	Health Administration	
HAD 553	Health Care Organization	
HAD 557	Health Care Strat Plan & Mktg	
HAD 558	Mgt of Healthcare Org	
HAD 600	Ethics of Health Care	
MHI 670	Special Topics in MHI	
DSS Electives (Select five of the following)		15
DSS 605	Emerging Tech for Business	
DSS 615	Python Programming	
DSS 620	Con & Pract of DSS Modeling	
DSS 650	Process Simulation & Analysis	
DSS 655	Optimization Modeling	
DSS 660	Introduction to Data Mining	
DSS 665	R Statistical Language	

DSS 670	Data Visual & Perf Analyt
DSS 675	Decision Analysis/Game Theory
DSS 676	Data Wrangling & Adv Visualtn
DSS 680	Predictive Analytics
DSS 690	Special Topics Course
DSS 720	Supply Chain Analytics
DSS 730	Digital Analytics

Total Hours**48**

Supply Chain Management Major

The Supply Chain Management major allows students to obtain the specialized knowledge required for supply chain decisions and efficiencies in operations. Supply chain management has always been critical to the success of companies and will continue to be critical. In recent years, governments and industries have placed a stronger emphasis on the importance of supply chain planning and disaster recovery.

The major in supply chain management helps students develop marketable skills and gain a unique perspective that will distinguish them from other graduates in the job market. The program provides a strong understanding of the supply chain, which is beneficial when developing modeling and forecasting skills critical to every part of the business process. This degree program will also help you understand logistics, distribution, planning and procurement while developing the necessary problem-solving skills to succeed in your role. These skills are highly attractive in industries such as manufacturing, construction, online retail sales, consumer goods and government agencies.

Industry and government operations are in need of skilled critical thinkers ready to address the key challenges facing the future of businesses and the global community.

Learning Goals and Outcomes

Goal 1: Students will develop foundational knowledge upon which to build advanced supply chain concepts, and will be competent in understanding supply chain operations in manufacturing, service, government and education settings

Goal 2: Students will develop the skills to manage projects of all types. Students will be competent in thinking critically and analytically in all supply chain settings.

Goal 3: Students will understand supply chain purchasing and sourcing.

Goal 4: Students will be competent in functional skills necessary for transforming data into actionable decisions in supply chain management. Students will obtain specialized knowledge and analytics techniques required for supply chain decisions (ranging from simple decisions to highly complex decisions).

Goal 5: Students will be competent communicators in the supply chain business environment.

Goal 6: Students will prepare for certifications within the supply chain industry.

Goal 7: Students will be competent in applying the Ignatian Values.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
DSS 321	Project Management	3
DSS 335	Found of Supply Chain Mgmt	3
DSS 350	SCM Dynamics	3
DSS 435	Advanced Business Analytics	3
DSS Electives (Select two of the following):		6
DSS 360	CPIM Certification	
DSS 365	CSCP Certification	
DSS 415	Data Wrangling & Visualization	
or DSS 416	Data Wrangling: Ethics Int.	
DSS 425	Analytics Cup	
DSS 440	Six Sigma Apps & Foundations	
DSS 445	Statistical Programming Lang	
DSS 447	Resilient Supply Chains	
DSS 465	Supply Chain Analytics	
DSS 470	DSS Special Topics I	
DSS 493	Independent Study I	
DSS 494	Independent Study II	
FMK 401	Food Marketing Strategy	
PMK 341	Pharm Channels & Pricing	

Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		21-22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	or Essentials of Management	
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
Mathematics (MAT 123, 155 or 161)		3-4
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ECN 102	Introductory Economics Macro	3
or ECN 101	or Introductory Economics Micro	
ENG 101	Craft of Language (or World History)	3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		13-14
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
FIN 200	Intro to Finance	3
Free Elective/Writing Intensive		3
consider FMK 250, HAD 304		
Hours		15
Spring		
DSS 220	Business Analytics	3
Diversity		3
Natural Science		4
Philosophy Level One		3
Theology		3
Hours		16
Junior		
Fall		
DSS 321	Project Management	3
DSS 335	Found of Supply Chain Mgmt	3
MGT 360	Legal Environment of Business	3
Free Electives		6
Hours		15
Spring		
DSS 350	SCM Dynamics	3
DSS 435	Advanced Business Analytics	3
Philosophy Level Two		3

Free Electives	6
Hours	15
Senior	
Fall	
Major Elective	3
BUS 495 Business Strategy	3
Fine & Performing Arts, Design & Creativity	3
Free Electives	6
Hours	15
Spring	
Major Elective	3
Religious Studies	3
Free Electives	9
Hours	15
Total Hours	120-122

Supply Chain Management Minor

The Supply Chain Management minor allows students to obtain the specialized knowledge required for supply chain decisions and efficiencies in operations. Supply chain management has always been critical to the success of companies and will continue to be critical. In recent years, governments and industries have placed a stronger emphasis on the importance of supply chain planning and disaster recovery.

The minor in supply chain management helps students develop marketable skills and gain a unique perspective that will distinguish them from other graduates in the job market. The program provides a strong understanding of the supply chain, which is beneficial when developing modeling and forecasting skills critical to every part of the business process. This degree program will also help you understand logistics, distribution, planning and procurement while developing the necessary problem-solving skills to succeed in your role. These skills are highly attractive in industries such as manufacturing, construction, online retail sales, consumer goods and government agencies.

Industry and government operations are in need of skilled critical thinkers ready to address the key challenges facing the future of businesses and the global community.

Learning Goals and Outcomes

Goal 1: Students will develop foundational knowledge upon which to build advanced supply chain concepts, and will be competent in understanding supply chain operations in manufacturing, service, government and education settings

Goal 2: Students will develop the skills to manage projects of all types. Students will be competent in thinking critically and analytically in all supply chain settings.

Goal 3: Students will understand supply chain purchasing and sourcing.

Goal 4: Students will be competent in functional skills necessary for transforming data into actionable decisions in supply chain management. Students will obtain specialized knowledge and analytics techniques required for supply chain decisions (ranging from simple decisions to highly complex decisions).

Goal 5: Students will be competent communicators in the supply chain business environment.

Goal 6: Students will prepare for certifications within the supply chain industry.

Goal 7: Students will be competent in applying the Ignatian Values.

Requirements

Code	Title	Hours
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
DSS 335	Found of Supply Chain Mgmt	3
DSS 435	Advanced Business Analytics	3
DSS 465	Supply Chain Analytics	3
Choose one DSS elective:		3
DSS 321	Project Management	
DSS 350	SCM Dynamics	
DSS 360	CPIM Certification	
DSS 365	CSCP Certification	
DSS 415	Data Wrangling & Visualization	
or DSS 416	Data Wrangling: Ethics Int.	
DSS 440	Six Sigma Apps & Foundations	
DSS 447	Resilient Supply Chains	
Total Hours		18

Finance

The Department of Finance offers majors and minors in Finance, Risk Management & Insurance, and Actuarial Science and a minor in Real Estate Finance. Each curriculum is rooted in financial theory and practice, and is updated frequently to reflect the rapid changes in technology and world economic conditions. Students in these programs develop excellent critical-thinking and problem-solving skills, in preparation for careers as financial decision-makers.

The Finance major is a CFA[®] Institute University Affiliation Program, and is thus appropriate for students preparing for the CFA Program exams.

The required courses in the Finance major cover over 70 percent of the CFA Program Candidate Body of Knowledge, and emphasize the CFA Institute Code of Ethics and Standards of Practice.

Saint Joseph's University does not certify individuals to use the CFA[®] designation. The CFA program and its exams are administered by the CFA Institute. Students completing the Finance major are not guaranteed acceptance into—or successful completion of—any of the CFA Institute's programs.

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>)

Faculty

Finance department faculty bring real-world experience from high-level positions in finance, investment banking, risk management, actuarial consulting, financial reporting, mergers and acquisitions, enterprise management and more, offering critical insights for students to prepare for careers in finance.

Department of Finance Faculty & Staff (<https://www.sju.edu/departments/finance/faculty-staff/>)

Programs Undergraduate Majors

- Actuarial Science (p. 214)
- Finance (p. 219)
- Risk Management & Insurance (p. 224)

Undergraduate Minors

- Actuarial Science (p. 216)
- Finance (p. 222)
- Real Estate Finance (p. 223)
- Risk Management & Insurance (p. 226)

Graduate

- Finance (p. 222)

Graduate Certificates

- Applied Investment Analysis (p. 217)
- Corporate Financial Management (p. 217)
- Financial Application in Real Estate (p. 223)

Actuarial Science Major

The Actuarial Science major seeks to give students a strong analytical foundation with which to solve the problems encountered in the management of risk. The major provides students with the flexibility to choose between careers traditionally associated with the Society of Actuaries (SOA): health, life and annuities, corporate finance and enterprise risk management, quantitative finance and investment, retirement benefits and general insurance, or with the Casualty Actuarial Society (CAS): property and casualty, reinsurance, finance, risk management, and enterprise risk management.

The Actuarial Science major is recognized by the SOA as a UCAP-Introductory Curriculum. The major includes course coverage for the two preliminary exams: Exam P/1 (Probability), and Exam FM/2 (Financial Mathematics), and the following Validation by Educational Experience (VEE) topics: Economics, Accounting and Finance. In addition, SOA-bound students may use elective courses to obtain VEE credit in Mathematical Statistics. A grade of B- or better is required to receive VEE credit from the SOA or the CAS.

Actuarial credentials are granted solely by the SOA or the CAS once a candidate has passed the required professional exams and completed the courses and other requirements specified by these societies. For more information on actuarial credentials, please visit the Society of Actuaries (www.soa.org) or the Casualty Actuarial Society (www.casact.org).

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures/actuarial>.

Learning Goals and Outcomes

Goal 1: Students will master the quantitative and analytical skills required to obtain an entry-level position in the actuarial science profession.

Outcome 1.1: Students will be able to apply and use the fundamental tools of calculus to solve applied and theoretical mathematical problems.

Outcome 1.2: Students will be able to demonstrate mastery of the computational skills used in probability theory as well as the use of discrete and continuous probability distributions to model various applications in the natural sciences, finance, insurance and the social sciences.

Outcome 1.3: Students will be able to demonstrate understanding of concepts of financial mathematics and how these concepts are applied in the calculation of present and accumulated values of cash flows.

Goal 2: Students will have the knowledge to qualify for professional credentials awarded by the Society of Actuaries and the Casualty Actuarial Society and gain background relevant to the actuarial profession.

Outcome 2.1: Students will be able to demonstrate their knowledge of macro and micro economics, accounting, financial methods and statistics and obtain Validation by Educational Experience (VEE) credit from professional actuarial societies. Students will also learn material relevant to actuarial science not covered by VEE.

Outcome 2.2: Students will know the content covered in the first two professional actuarial examinations.

Goal 3: Students will develop strong communication and critical thinking skills.

Outcome 3.1: Students will be able to prepare written reports and deliver oral presentations that integrate the best practices of technical writing, business and statistical terminology and critical analysis.

Goal 4: Students will attain a high level of proficiency in research methodology and computer technology.

Outcome 4.1: Students will be able to conduct quantitative research, i.e. select appropriate statistical methodology, use computer software, and make inferences and predictions using data from applications in finance, economics and other disciplines.

Outcome 4.2: Students will be able to demonstrate proficiency in the use of computer software such as EXCEL, statistical software and databases. Students will also be able to do basic computer programming.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
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Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
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Religious Studies	3
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Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
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INT 151	Inequality in American Society	1
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Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
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Natural Science	4
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Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Note: Students majoring in Actuarial Science must take FIN 225 rather than FIN 200 within the Business Foundation. A grade of B- or better in FIN 225 is required to receive VEE credit from the SOA or CAS.

Major Requirements

Code	Title	Hours
RMI 200	Introduction to Insurance	3
FIN 201	Markets and Institutions	3
ASC 300	Intro to Actuarial Probability	3
ASC 301	Actuarial Probability	3
Actuarial Science Elective (Flexible): select one from any 300- or 400-level ASC, FIN, RMI, or MAT/DSC course.		3
400-level courses have one or more 300-level courses as prerequisites. Certain 300-level courses have 200-level courses as prerequisites.		
Advanced Actuarial Science Elective (Flexible): selective one from any 400-level ASC, FIN, or RMI course.		3
A maximum of two (2) FIN or RMI courses used to satisfy the Actuarial Science Major may be double-counted towards the FIN Major or the RMI Major.		
MAT 161	Calculus I (or higher. Will count for CCC: Mathematics)	4
Total Hours		22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Non-Native Language) or Essentials of Management	3
MAT 161	Calculus I	4
ECN 101	Introductory Economics Micro	3
ENG 101	Craft of Language (or World History)	3
Hours		17
Spring		
ACC 102	Managerial Accounting	3
MAT 162	Calculus II	4
ENG 101	Craft of Language (or World History)	3
FIN 225	Fund of Quantitative Finance	3
INT 151	Inequality in American Society	1
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Non-Native Language) or Essentials of Management	3
Hours		17
Sophomore		
Fall		
DSS 200	AI in Business	3
ASC 300	Intro to Actuarial Probability	3
RMI 200	Introduction to Insurance	3
Philosophy Level One		3
ECN 102	Introductory Economics Macro	3
Hours		15
Spring		
ASC 301	Actuarial Probability	3
FIN 201	Markets and Institutions	3
MKT 201	Principles of Marketing	3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
DSS 210	Business Statistics	3
MGT 360	Legal Environment of Business	3
Major Elective		3
Religious Studies		3
Free Elective		3
Hours		15
Spring		
DSS 220	Business Analytics	3
Diversity		3
CSC 115 or CSC 120 or DSS 325	Intro to Computer Science or Computer Science I or Open Source Program Lang	3
Theology		3
Free Elective		3
Hours		15
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15

Spring	
Literature	3
Natural Science	4
Free Electives	6
Hours	
Total Hours	
122	

Actuarial Science Minor Learning Goals and Outcomes

Goal 1: Students will master the quantitative and analytical skills required to obtain an entry level position in the actuarial science profession.

Outcome 1.1: Students will be able to apply and use the fundamentals tools of calculus to solve applied and theoretical mathematical problems.

Outcome 1.2: Students will be able to demonstrate mastery of the computational skills used in probability theory as well as the use of discrete and continuous probability distributions to model various applications in the natural sciences, finance, insurance and the social sciences.

Goal 2: Students will have the knowledge to qualify for professional credentials awarded by the Society of Actuaries and the Casualty Actuary Society.

Outcome 2.1: Students will be able to demonstrate their knowledge of macro and micro economics and obtain VEE (Validation by Educational Experience) credit from professional actuarial societies.

Outcome 2.2: Students will know the content covered in the first two professional actuarial science examinations.

Goal 3: Students will attain proficiency in research methodology and computer technology.

Outcome 3.1: Students will be able to conduct quantitative research using appropriate statistical methodology.

Outcome 3.2: Students will be able to demonstrate proficiency in the use of computer software such as EXCEL and statistical software.

Requirements

Code	Title	Hours
Required Courses		
ACC 101	Concepts of Financial Acct	3
FIN 225	Fund of Quantitative Finance	3
FIN 201	Markets and Institutions	3
ASC 300	Intro to Actuarial Probability	3
ASC 301	Actuarial Probability	3
Elective Course: Select one from any 300- or 400-level ASC, FIN, or RMI course.		3
A maximum of two (2) courses used to satisfy the Actuarial Science Minor may be double-counted towards another major/minor.		
Total Hours		18

Applied Investment Analysis Graduate Certificate

The Applied Investment Analysis Graduate Certificate provides students with both a theoretical and a practical understanding of the portfolio construction and stock selection processes. Topics covered include financial statement analysis, fundamental analysis, and stock valuation.

Learning Goals and Outcomes

Goal 1: Develop stakeholder value and functional understanding.

Outcome 1.1: Students will demonstrate understanding of financial concepts: the risk-return trade-off, the time value of money, cash flows vs. profits, efficient capital markets, and risk & diversification.

Goal 2: Develop problem solving and critical thinking skills.

Outcome 2.1: Students will analyze, synthesize, and evaluate information and data as the basis for solving problems and making decisions.

Goal 3: Develop interpersonal and communication skills.

Outcome 3.1: Students will demonstrate the ability to correspond effectively and persuasively in a business format, communicate effectively with individuals and within teams, and present to both individuals and groups clearly and convincingly.

Goal 4: Students will develop an understanding of—and the ability to apply—the following Ignatian values: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 5: Students will learn how to: measure risk and estimate expected returns; analyze and value fixed income, equity, and derivative securities; use derivative securities in risk management applications; and construct portfolios suitable for various investor characteristics and objectives.

Requirements

Code	Title	Hours
FIN 550	Shareholder Value Management (Must be completed before the upper-level courses) ¹	3
FIN 575	Fundamental Financial Analysis	3
FIN 610	Security Analysis & Investment	3
FIN 613	Applied Investment Management	3
Total Hours		12

¹ Students in an SJU 4+1 program who were waived out of FIN 550 based upon earning a grade of B or higher in FIN 300 must replace FIN 550 in this certificate with FIN 602. No other substitutions are allowed in this certificate.

Corporate Financial Management Graduate Certificate

The Corporate Financial Management Graduate Certificate prepares students for financial-decision-making roles within both large and small enterprises. Topics covered include capital budgeting, raising capital, dividend policy, and foreign currency translation.

Learning Goals and Outcomes

Goal 1: Develop stakeholder value and functional understanding.

Outcome 1.1: Students will demonstrate understanding of financial concepts: the risk-return trade-off, the time value of money, cash flows vs. profits, efficient capital markets, and risk & diversification.

Goal 2: Develop problem solving and critical thinking skills.

Outcome 2.1: Students will analyze, synthesize, and evaluate information and data as the basis for solving problems and making decisions.

Goal 3: Develop interpersonal and communication skills.

Outcome 3.1: Students will demonstrate the ability to correspond effectively and persuasively in a business format, communicate effectively with individuals and within teams, and present to both individuals and groups clearly and convincingly.

Goal 4: Students will develop an understanding of—and the ability to apply—the following Ignatian values: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 5: Students will learn how to: measure risk and estimate expected returns; analyze and value fixed income, equity, and derivative securities; use derivative securities in risk management applications; and construct portfolios suitable for various investor characteristics and objectives.

Requirements

Code	Title	Hours
FIN 550	Shareholder Value Management (Must be completed before the upper-level courses) ¹	3
FIN 600	Fin Institutions & Capital Mkt	3
FIN 608	Advanced Financial Management ²	3
FIN 609	International Finance	3
Total Hours		12

¹ Students in an SJU 4+1 program who were waived out of FIN 550 based upon earning a grade of B or higher in FIN 300 must replace FIN 550 in this certificate with either FIN 575 or FIN 612.

² FIN 600 or FIN 609 can be replaced in this certificate with FIN 575 or FIN 612 with the approval of the Finance Department Chair. In contrast, FIN 608 must be completed by all students earning this certificate. FIN 575 and FIN 612 cannot be double counted within this certificate.

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree complements the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
-

Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3

PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5

Total Hours **140**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3

PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3

PRX 575	Integrated Practice 2	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23
Summer		
Haub course/Professional Elective		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Finance Major

The Finance major introduces students to the financial decision-making process as it is applied within both large and small enterprises, and as it is practiced by investment professionals. The Finance major provides students with the flexibility to choose between careers in corporate financial management, treasury management, investor relations, securities analysis/sales, portfolio management, mutual fund research, and financial markets analysis.

The Finance major is a CFA[®] Institute University Affiliation Program, and is thus appropriate for students preparing for the CFA Program exams.

The required courses in the Finance major cover over 70 percent of the CFA Program Candidate Body of Knowledge and emphasize the CFA Institute Code of Ethics and Standards of Practice.

Saint Joseph's University does not certify individuals to use the CFA[®] designation. The CFA program and its exams are administered by the CFA Institute. Students completing the Finance major are not guaranteed acceptance into—or successful completion of—any of the CFA Institute's programs.

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>)

Learning Goals and Outcomes

Goal 1: Functional finance skills

Objective 1.1: Students will learn the concepts and tools necessary to value assets.

Goal 2: Critical Thinking skills

Objective 2.1: Students will learn the skills to examine and evaluate the validity of assumptions.

Goal 3: Communication Skills

Objective 3.1: Students will learn to make recommendations that are clearly and effectively supported by analysis in written reports.

Goal 4: Jesuit Traditions

Objective 4.1: Students will understand the role of Ignatian values in financial decision-making.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	
47-49	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Note: A grade of C or better in FIN 200 is required to progress as a Finance Major

Code	Title	Hours
Finance Core		
FIN 201	Markets and Institutions	3
FIN 300	Intermediate Finance	3
FIN 301	Investments	3
Calculus (will count for CCC: Mathematics)		3-4
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
MAT 162	Calculus II	
Finance Elective		
Select one from any 300- or 400-level FIN Course: ²		3
FIN 302	International Finance	

FIN 303	Small Business Finance
FIN 310	Sustainable Finance
FIN 370	Topics in Finance
FIN 400	Mergers & Acquisitions
FIN 401	Student Managed Funds
FIN 402	Portfolio Management
FIN 403	Derivative Securities
FIN 470	Advanced Topics in Finance
FIN 493	Independent Research I
FIN 494	Independent Research II

Flexible ElectiveSelect one from any 300- or 400-level FIN, RMI or REF course: ^{2,3} 3

FIN 302	International Finance
FIN 303	Small Business Finance
FIN 370	Topics in Finance
FIN 400	Mergers & Acquisitions
FIN 401	Student Managed Funds
FIN 402	Portfolio Management
FIN 403	Derivative Securities
FIN 470	Advanced Topics in Finance
FIN 493	Independent Research I
FIN 494	Independent Research II
REF 301	Commerc Real Estate Valuation
REF 303	Residential Loans& Investments
RMI 301	Corporate Risk Management
RMI 370	Topics in Risk Mgt & Insurance

Advanced Finance ElectiveSelect one from any 400-level FIN Course: ² 3

FIN 400	Mergers & Acquisitions
FIN 401	Student Managed Funds
FIN 402	Portfolio Management
FIN 403	Derivative Securities
FIN 410	Fixed Income Analysis
FIN 470	Advanced Topics in Finance

Total Hours 21-22² 400-level courses have one or more 300-level courses as prerequisites (see Course Descriptions for details).³ A 300-level RMI course also satisfies one course toward the RMI Major and can be double-counted. REF 301 also satisfies one course toward the REF Minor and can be double-counted.

Free Electives

Seven to nine courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3

MGT 110 or MGT 120	Essent'ls of Organzational Beh (or Theology) or Essentials of Management	3
Non-Native Language or Mathematics		3-4
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
ENG 101	Craft of Language (or World History)	3

Hours 16-17

Spring		
ACC 102	Managerial Accounting	3
Mathematics		3-4
MGT 110 or MGT 120	Essent'ls of Organzational Beh (or Theology) or Essentials of Management	3
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
ENG 101	Craft of Language (or World History)	3

Hours 16-17

Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
FIN 200 or FIN 225	Intro to Finance or Fund of Quantitative Finance	3
Philosophy Level One		3
Free Elective		3

Hours 15

Spring		
DSS 220	Business Analytics	3
FIN 201	Markets and Institutions	3
MKT 201	Principles of Marketing	3
Philosophy Level Two		3
Free Elective		3

Hours 15

Junior		
Fall		
FIN 300	Intermediate Finance	3
FIN 301	Investments	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective		3

Hours 15

Spring		
Major Elective		3
Diversity		3
Literature		3
Free Electives		6

Hours 15

Senior		
Fall		
Major Elective		3
Natural Science		4
Fine & Performing Arts, Design & Creativity		3
Free Electives		6

Hours 16

Spring		
Major Elective		3
BUS 495	Business Strategy	3
Free Electives		6-9

Hours 12-15**Total Hours** 120-125

Finance Minor

The objective of the Finance minor is to provide students with an introduction to the field of finance. The minor can serve as a complement to any other major, since all types of business, governmental, and personal decisions have a financial component.

Requirements

Code	Title	Hours
Required Courses:		
ACC 101	Concepts of Financial Acct	3
FIN 200	Intro to Finance	3
FIN 201	Markets and Institutions	3
FIN 300	Intermediate Finance	3
FIN 301	Investments	3
Finance Elective		3
This elective must be a 300- or 400-level FIN course. RMI or REF courses cannot be used to satisfy the requirements of the FIN minor unless approved by the Finance Department chair.		
Total Hours		18

The first two courses in the Finance minor are in the Business core: Concepts of Financial Accounting (ACC 101) and Introduction to Finance (FIN 200). These two courses can be double-counted toward a Business student's major, and do not have to be replaced with additional courses for the minor. Students are responsible for completing all prerequisites to the courses required for the minor. The FIN minor requires students to complete four FIN courses above the introductory level. These courses cannot be double counted in the student's major.

Finance MS

This innovative graduate program provides professionals with the tools, theory, and practical knowledge required to compete in the rapidly changing financial world. The program allows students to specialize in financial analysis, real estate finance, or financial planning.

The Financial Analysis track is a CFA® Institute University Affiliation Program, and is thus appropriate for students preparing for the CFA Program exams. The courses in this track cover over 70 percent of the CFA Program Candidate Body of Knowledge and emphasize the CFA Institute Code of Ethics and Standards of Practice. (Saint Joseph's University does not certify individuals to use the CFA® designation. The CFA program and its exams are administered by the CFA Institute.

Students completing the Financial Analysis track are not guaranteed acceptance into—or successful completion of—any of the CFA Institute's programs).

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>)

Learning Goals and Outcomes

Goal 1: Stakeholder Value/Functional

Outcome 1.1: Students will demonstrate understanding of financial concepts: the risk-return trade-off, the time value of money, cash flows vs. profits, efficient capital markets, and risk & diversification.

Goal 2: Problem Solving/Critical Thinking

Outcome 2.1: Students will analyze, synthesize, and evaluate information and data as the basis for solving problems and making decisions.

Goal 3: Interpersonal/Communication skills

Outcome 3.1: Students will demonstrate the ability to correspond effectively and persuasively in a business format, communicate effectively with individuals and within teams, and present to both individuals and groups clearly and convincingly.

Goal 4: Ignatian Values

Outcome 4.1: Students will develop an understanding of—and the ability to apply—the following Ignatian values: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 5: Practical Financial Knowledge

Outcome 5.1: Students will learn how to: measure risk and estimate expected returns; analyze and value fixed income, equity, and derivative securities; use derivative securities in risk management applications; and construct portfolios suitable for various investor characteristics and objectives.

Requirements

The Master of Science in Finance degree requires the completion of 30 credits with a cumulative GPA of 3.0 or better in courses taken at SJU. Courses carry three semester credits unless otherwise noted.

All prerequisites must be satisfied prior to enrolling in a given course; prerequisites are indicated in the section on Course Descriptions. Students may be admitted to Advanced Program courses before completion of all the foundation modules, but must complete the Foundation Program by the time that twelve credits have been earned in the Advanced Program. Students may transfer a maximum of six credits from outside Saint Joseph's University.

The Master of Science in Finance curriculum offers two career-enriching concentrations so you can align your learning with your professional goals:

Financial Analysis: Learn how to analyze market data, identify trends, and apply recommendations. This track is appropriate for students preparing for a career in investments, as well as individuals planning to work in corporate financial management. The Financial Analysis track is a CFA Institute University Affiliation Program, and is thus appropriate for students preparing for the CFA® Program exams.

Real Estate Finance: Get the tools to take your career to the next level through a program designed by experts and connected to a deep network of alumni leaders in the industry.

Foundation Modules - Business Competency Requirements

The Foundation Modules are designed to ensure that all students in the program have the common body of knowledge necessary for advanced study in Finance. The Economics and Accounting Modules may be

waived based on undergraduate coursework. The Foundation Modules are completely online, self-paced, and can be worked on at any time. A “live” session is not required.

The following Foundation Modules are required:

- Statistics - **Required for all students**
- Economics
- Accounting

Requirements

Code	Title	Hours
Core Requirements		
FIN 550	Shareholder Value Management	3
FIN 600	Fin Institutions & Capital Mkt	3
FIN 602	Portfolio Management	3
Concentration Options		18
Students must specialize in one concentration. Students may chose their electives from another concentration or from the list of electives.		
Financial Analysis ^{1, 2}		
FIN 575	Fundamental Financial Analysis	
FIN 608	Advanced Financial Management	
FIN 609	International Finance	
FIN 610	Security Analysis & Investment	
FIN 612	Derivative Markets	
FIN 613	Applied Investment Management	
Real Estate Finance		
REF 605	Comm. Real Estate Valuation	
REF 606	Real Estate Market Analysis	
REF 610	Real Estate Appraisal	
REF 615	Real Estate Investment Finance	
Elective		
Other Electives		3
FIN 601	Personal Financial Planning	3
FIN 607	Risk Management	
FIN 611	Mergers and Acquisitions	
FIN 770	Special Topics in Finance	
Total Hours		33

¹ The Financial Analysis concentration is a CFA® Institute University Affiliation Program, and is thus appropriate for students preparing for the CFA Program exams. The courses in this concentration cover over 70 percent of the CFA Program Candidate Body of Knowledge and emphasize the CFA Institute Code of Ethics and Standards of Practice. (Saint Joseph's University does not certify individuals to use the CFA® designation. The CFA program and its exams are administered by the CFA Institute. Students completing the Financial Analysis concentration are not guaranteed acceptance into—or successful completion of—any of the CFA Institute's programs).

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Financial Application in Real Estate Graduate Certificate

The Financial Application in Real Estate Graduate Certificate prepares students for financial-decision-making roles within the rapidly changing Real Estate industry. Students gain an understanding of the Real Estate development and management processes from both a regulatory and financial perspective. Students learn analytical techniques used to appraise, value, and finance both commercial and residential Real Estate properties.

Learning Goals and Outcomes

Goal 1: Develop shareholder value and functional understanding.

Outcome 1.1: Students will demonstrate understanding of financial concepts: the risk-return trade-off, the time value of money, cash flows vs. profits, efficient capital markets, and risk & diversification.

Goal 2: Develop problem solving and critical thinking skills.

Outcome 2.1: Students will analyze, synthesize, and evaluate information and data as the basis for solving problems and making decisions.

Goal 3: Develop interpersonal and communication skills.

Outcome 3.1: Students will demonstrate the ability to correspond effectively and persuasively in a business format, communicate effectively with individuals and within teams, and present to both individuals and groups clearly and convincingly.

Goal 4: Students will develop an understanding of—and the ability to apply—the following Ignatian values: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 5: Students will learn how to: measure risk and estimate expected returns; analyze and value fixed income, equity, and derivative securities; use derivative securities in risk management applications; and construct portfolios suitable for various investor characteristics and objectives.

Requirements

Code	Title	Hours
FIN 550	Shareholder Value Management (Must be completed before the upper-level courses)	3
REF 605	Comm. Real Estate Valuation	3
Two REF courses, 606 and above		6
Total Hours		12

¹ Students in an SJU 4+1 program who were waived out of FIN 550 based upon earning a grade of B or higher in FIN 300 must replace FIN 550 in this certificate with one additional REF 606 to REF 770 (3 credit hours) course.

Real Estate Minor

The purpose of a minor in Real Estate Finance is to introduce students to a range of real estate topics including commercial real estate valuation; real estate financing (mortgages, leasing, and the importance of financial leverage in real estate investing); sustainability; and real estate

development. Additionally, students will have the opportunity to improve their real estate-specific writing skills in order to succeed in this industry

Learning Goals and Outcomes

Goal 1: Functional finance skills

Outcome 1.1: Students will learn the concepts and tools necessary to value commercial and residential real estate assets.

Goal 2: Critical Thinking skills

Outcome 2.1: Students will learn the skills to develop, implement, examine, and evaluate the validity of assumptions underlying the valuation techniques for real estate assets.

Goal 3: Communication Skills

Outcome 3.1: Students minoring in Real Estate Finance will learn to make recommendations that are clearly and effectively supported by written analysis.

Requirements

Code	Title	Hours
ACC 101	Concepts of Financial Acct ¹	3
FIN 200	Intro to Finance ¹	3
REF 301	Commerc Real Estate Valuation ²	3
REF 303	Residential Loans& Investments	3
REF 400	Commercial Real Estate Dev	3
REF Elective ³		3
Total Hours		18

¹ The first two courses in the Real Estate Finance minor are in the Business Core: ACC 101 and FIN 200. These two courses can be double counted toward a Business student's minor and do not have to be replaced with additional courses for the minor. Students are responsible for completing all prerequisites to the courses required for the minor.

² REF 301 can be double counted as the flexible finance elective for students majoring in Finance.

³ The REF elective must be a 300- or 400-level REF course. FIN or RMI courses cannot be used to satisfy the requirements of the REF minor unless approved by the Finance Department Chair.

Risk Management & Insurance Major

The Risk Management & Insurance Major is designed to provide students with an understanding of the insurance industry and of the current academic and practitioner literature on financial risk management. In the Risk Management & Insurance major, students will explore the various functional areas of insurance company management, including investment and financing policies as well as pricing and underwriting activities. Students will also become familiar with the types of risks facing financial institutions, corporations, and individuals and learn how to measure and manage these risks. The Risk Management & Insurance major prepares students for careers in the financial services industry (insurance companies, banks, securities firms, and pension funds).

For additional information regarding professional certification requirements please visit <https://www.sju.edu/disclosures> (<https://www.sju.edu/disclosures/>)

Learning Goals and Outcomes

Goal 1: Risk Management Skills

Outcome 1.1: Students majoring in Risk Management & Insurance should be competent in assessing coverage in common insurance policies.

Goal 2: Critical Thinking Skills

Outcome 2.1: Students majoring in Risk Management & Insurance will learn to think critically and analytically in identifying, analyzing, and treating the risks of an organization.

Goal 3: Communication Skills

Outcome 3.1: Students majoring in Risk Management & Insurance will learn to make recommendations that are clearly and effectively supported by data analysis.

Outcome 3.2: Students majoring in Risk Management & Insurance will learn to communicate clearly and effectively in both written and oral form.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3

Philosophy Requirements

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One	3
Philosophy Level Two	3

Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3	
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
Risk Management & Insurance Core		
RMI 200	Introduction to Insurance	3

RMI 300	Property and Casualty	3
RMI 301	Corporate Risk Management ²	3

Risk Management & Insurance Elective

Select one from any 300- or 400-level RMI course or DSS 370: ³ 3

RMI 306	Intro to Probability in Insura
RMI 310	Insurance Company Operations
RMI 321	Insurance Law& Cyber Liability
RMI 330	Insurance Data & Analytics
RMI 340	Employee Benefits
RMI 370	Topics in Risk Mgt & Insurance
RMI 400	Underwriting
RMI 410	Enterprise Risk Management
RMI 470	Adv Topics: Risk Mgmt & Insura
RMI 493	Individual Research in RMI

Flexible Elective

Select one from any 300- or 400-level RMI, FIN, or REF course: ^{3, 4} 3

FIN 300	Intermediate Finance
FIN 301	Investments
FIN 302	International Finance
FIN 303	Small Business Finance
FIN 370	Topics in Finance
REF 301	Commerc Real Estate Valuation
REF 303	Residential Loans& Investments
RMI 307	Applied Prob & Stats in Insura
RMI 310	Insurance Company Operations
RMI 400	Underwriting
RMI 410	Enterprise Risk Management
RMI 493	Individual Research in RMI

Advanced RMI Elective

Select one from any 400-level RMI course: 3

RMI 400	Underwriting
RMI 406	Adv Insurance Financial Models
RMI 410	Enterprise Risk Management
RMI 415	Strategic Transformation RMI
RMI 420	Alternative Risk Financing
RMI 470	Adv Topics: Risk Mgmt & Insura
RMI 493	Individual Research in RMI

Calculus (will count for CCC: Mathematics) 3-4

MAT 123	Differential Calculus
MAT 155	Fundamentals of Calculus
MAT 161	Calculus I

Total Hours 21-22

² FIN 200 or FIN 225 and DSS 210 are prerequisites for RMI 301.

³ 400-level courses have one or more 300-level courses as prerequisites (see Course Descriptions for details).

⁴ A 300-level FIN course also satisfies one course toward the FIN Major and can be double-counted. Although a 300 or 400-level REF course can be taken as a Flexible Elective by a student majoring in RMI, REF courses cannot be double-counted in both the RMI major and the Real Estate minor. Thus, RMI majors completing the Real Estate minor cannot take a REF course to satisfy the Flexible Elective requirement.

Free Electives

Seven to nine courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organzational Beh (or Theology) or Essentials of Management	3
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
ENG 101	Craft of Language (or World History)	3
Non-Native Language or Mathematics		3
Hours		16
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110 or MGT 120	Essent'ls of Organzational Beh (or Theology) or Essentials of Management	3
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Non-Native Language or Mathematics		3-4
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
FIN 200 or FIN 225	Intro to Finance or Fund of Quantitative Finance	3
RMI 200	Introduction to Insurance	3
Philosophy Level One		3
Hours		15
Spring		
DSS 220	Business Analytics	3
RMI 301	Corporate Risk Management	3
MKT 201	Principles of Marketing	3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
RMI 300	Property and Casualty	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective		3
Major Elective		3
Hours		15
Spring		
Major Elective		3
Diversity		3
Literature		3
Free Electives		6
Hours		15
Senior		
Fall		
Fine & Performing Arts, Design & Creativity		3

Natural Science		4
Free Electives		9
Hours		16
Spring		
Major Elective		3
BUS 495	Business Strategy	3
Free Electives		6-9
Hours		12-15
Total Hours		120-124

Risk Management & Insurance Minor

The objective of the Risk Management & Insurance minor is to introduce students to significant aspects of both corporate risk management and the insurance industry.

Requirements

Code	Title	Hours
Five (5) required courses:		
ACC 101	Concepts of Financial Acct	3
FIN 200	Intro to Finance	3
RMI 200	Introduction to Insurance	3
RMI 300	Property and Casualty	3
RMI 301	Corporate Risk Management	3
One (1) RMI elective:		3
This elective must be a 300- or 400-level RMI course. FIN or REF courses cannot be used to satisfy the requirements of the RMI minor unless approved by the Finance Department Chair.		
Total Hours		18

The first two courses in the Risk Management & Insurance minor are in the Business core: Concepts of Financial Accounting (ACC 101) and Introduction to Finance (FIN 200). These two courses can be double-counted toward a Business student’s major, and do not have to be replaced with additional courses for the minor. Students are responsible for completing all prerequisites to the courses required for the minor.

The RMI minor requires students to complete four courses in Risk Management & Insurance. These courses cannot be double counted in the student’s major. The one exception to this is for students majoring in Actuarial Science.

Food, Pharma, Healthcare Overview

The Department of Food, Pharma and Healthcare at Saint Joseph’s University is a unique department dedicated to preparing students for successful careers in the food, pharmaceutical and healthcare industries.

Faculty

Our faculty are experts in the fields of food, pharma and healthcare. Most have worked full-time in a variety of industries such as food manufacturing and healthcare technology and bring their real-world experience to the classroom.

Department of Food, Pharmacy and Healthcare Faculty & Staff (<https://www.sju.edu/departments/food-pharma-healthcare/faculty-staff/>)

Programs

Undergraduate Majors

- Food Marketing (p. 229)
- Health Administration (p. 234)
- Pharmaceutical & Healthcare Business (p. 239)

Undergraduate Minors

- **Food and Beverage Business Development** (<https://academiccatalog.sju.edu/business/food-pharma-health/food-bev-bus-dev-minor/>)
- Food Marketing for Non-Business Majors (p. 233)
- Global Food, Health and Wellness (<https://academiccatalog.sju.edu/business/food-pharma-health/global-food-minor/>)
- Health Administration (p. 236)
- Pharmaceutical & Healthcare Business (p. 241)

Graduate Degrees

- Food Marketing MBA (p. 232)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Health Administration/Health Informatics Dual MHA/MHI (p. 237)
- Pharmaceutical & Healthcare Marketing MBA

Graduate Certificates

- Agribusiness (p. 227)
- Biotech and Life Sciences Management (p. 227)
- Food Marketing (p. 229)
- Health Informatics (p. 238)
- Healthcare Management (p. 239)
- Hospitality Management (p. 239)

Agribusiness Graduate Certificate

The Agribusiness Graduate Certificate is designed to develop and build specialized knowledge and enable current and future agribusiness professionals to become more competitive in the job market, more attractive for promotions and can lead to new opportunities in different segments of the industry. In addition, part of the demand will stem from farmers looking to upskill and understand the business and marketing side of the industry so as to be able to broaden the reach of their goods.

Requirements

Code	Title	Hours
Core Courses		
FMK 710	Introduction to Agribusiness	3
FMK 711	Ovrvw&Mgmt: Food&Beverage Ind	3
Choose two electives		6
FMK 713	Food & Beverage Mktg Strategy	
FMK 724	Revenue Growth Management	
FMK 725	Food & Beverage Consmr Insight	
FMK 726	Innovation & New Product Dev	
FMK 728	Qualitative Techniques	
FMK 729	Quantitative Techniques	

FMK 732	Consumer Advertising & Promo.	
FMK 762	Food & Beverage Policy	
FMK 785	ST: Food & Beverage Mktg	
Total Hours		12

Biotech and Life Sciences Management Graduate Certificate

The Biotech and Life Sciences Management Graduate Certificate is designed to teach the experienced healthcare industry professional how to identify new market opportunities in healthcare, assess the market potential of the opportunity and develop the marketing strategies with corresponding promotional materials to launch the new product/brand/service.

Requirements

Code	Title	Hours
PMK 795	Capstone	3
Choose three of the following:		9
PMK 625	Pharmaceutical R&D	
PMK 630	Healthcare Marketing Analytics	
PMK 651	Life Sciences Promotion	
PMK 665	Sales Management	
PMK 700	Managed Market Access	
PMK 720	Global Healthcare Markets	
PMK 770	Independent Study	
PMK 780	Future Issues	
HAD 559	Health Policy	
Total Hours		12

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our

graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
-

Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3

PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5

Total Hours 140

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20

Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23
Summer		
Haub course/Professional Elective		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5

PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Food Marketing Graduate Certificate

The Food Marketing Program is rooted in a 50-year tradition of academic excellence in Food Marketing and is designed for leaders and professionals with strong backgrounds in the food and beverage industries and associated fields. Our unique program provides advanced academic and developmental experiences in strategic marketing and related business disciplines. Students together with a network of industry peers earn their degree by attending either Friday/Saturday sessions on the SJU campus or weekly online sessions. Courses are led by world-class faculty and are often co-taught with industry experts. Course work encompasses both strategic and hands-on experiences. Students may take as few or as many classes as fit their schedule, and graduate at their own pace. Courses taken for the certificate may used for further study if students go on to take the food marketing mba or masters of science degree.

Learning Goals and Outcomes

Goal 1: Students will acquire knowledge of food and beverage marketing strategy including: developing strategic and tactical plans; marketing research and data analysis; segmentation and positioning; and the marketing mix: product decisions, pricing decisions, distribution decisions, and communications decisions.

Goal 2: Students will acquire knowledge of the food and beverage industry: the macro environment in which the industry operates; industry structure; industry functions; and operations. Students will acquire knowledge of the supply chain for both retail as well as the food service sectors of the food and beverage industry.

Goal 3: Students will acquire knowledge of food and beverage marketing strategy including: developing strategic and tactical plans; marketing research and data analysis; segmentation and positioning; and the marketing mix: product decisions, pricing decisions, distribution decisions, and communications decisions.

Requirements

Any four FMK courses at the 500 level or higher.

Food Marketing Major Overview

The food marketing major provides Haub School of Business (HSB) students with an in-depth study of major manufacturers, supply chains, marketing, sales and more. Graduates of food marketing move on to job placements with major companies including Kenvue, Hormel, M&M Mars, E & J Gallo, Hershey, Kellanova, Wegmans, Wawa, Giant, Shop Rite, Target, and Nestlé., as well as supply companies and advertising and consulting agencies. The opportunity to complete a minor in Food Marketing is also available to students who are majoring in another discipline.

A unique aspect of the Food Marketing Department is that many of the faculty have worked full time in the food industry and have practical, first-hand experience in the field in which they teach. Students learn about important issues from faculty who inform and influence the industry and public policy sectors about them. In addition, food marketing students have the advantage of strong ties to the food industry for job opportunities after they graduate and are able to take advantage of state-of-the-art facilities to get them there. They are able to take advantage of state-of-the-art facilities to get them there. For example, the major has access to a state of the art collaboration facility - the Campbell Collaboration Center in the library

Job opportunities are also available to students through the increasingly popular four year Coop, where students complete two full-time, paid work experiences over the course of their four years at SJU. Co-op students gain valuable industry experience that not only enhances their résumés but also gives them a competitive edge when seeking full-time employment after graduation.

Food marketing majors not only utilize the opportunities of their education at Saint Joseph's but are also granted opportunities to travel to major food trade shows. These shows include the National Frozen and Refrigerated Foods Show, National Grocers Association in Las Vegas, Private Label Manufacturers Association in Chicago, the International Fresh Produce Association, and many others. They can also choose to use their classroom skills in SJU's backyard by diving into service-learning opportunities in the city of Philadelphia.

Job opportunities are also available to students through the increasingly popular four coop program as well as internships. Students also have access to exclusive networking events with our sponsoring companies. Food Marketing has a 99% placement rate for graduates.

Learning Goals and Outcomes

Goal 1: Leadership - Students will gain an understanding of concepts, theories, and practices of effective leadership

Goal 2: Critical Thinking - Students will think critically and construct reasoned arguments to support their positions using skills appropriate to the context, such as deductive reasoning, scientific inquiry, quantitative reasoning, aesthetic judgment, or critical examination of form, style, content and meaning

Goal 3: Communication - Students will communicate effectively through written and oral modes of expression across academic, professional and social contexts using appropriate technology

Goal 4: Ethics, Social Justice, and Ignatian Values – Students will develop self-knowledge and agency as a leader committed to ethically engaging with stakeholders and championing economic, social, and climate justice (e.g., United Nations Sustainable Development Goals [SDGs])

Goal 5: Global/Diversity - Students will understand the Triple Bottom Line (i.e., People, Planet, and Profit) approach to sustainability and use it to inform decision-making

Goal 6: Discipline or Program Specific Competencies - Students will acquire knowledge of the food industry. Students will be able to develop strategy for the food marketing industry and its firms.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
FMK 202	Overview of the Globl Food Ind	3
FMK 302	Undrstndg Food Cust & Consumrs	3
FMK 301	Food Marketing Research	3
or FMK 722	Food & Beverage Mktg Research	
FMK 303	Food Marketing Communication	3
FMK 318	Retail Food Market Management	3
FMK 401	Food Marketing Strategy	3
or FMK 713	Food & Beverage Mktg Strategy	

Mathematics (will count as CCC: Mathematics) 3-4

MAT 120	Precalculus
MAT 123	Differential Calculus
MAT 130	Whole Truth about Whole Number
MAT 131	Linear Methods
MAT 132	Math of Games & Politics
MAT 134	Math of Uncertainty:Rules/Prob
MAT 135	Sounding Number: Music & Math
MAT 138	Symmetry
MAT 155	Fundamentals of Calculus
MAT 161	Calculus I

MAT 162	Calculus II
Total Hours 21-22	

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organzational Beh (or Philosophy Level One)	3
or MGT 120	or Essentials of Management	
ENG 101	Craft of Language	3
Non-Native Language or Mathematics		3-4
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
World History		3
MGT 110	Essent'ls of Organzational Beh (or Philosophy Level One)	3
or MGT 120	or Essentials of Management	
Non-Native Language or Mathematics		3-4
FMK 250	The Future of Food ^{Recommended WI}	3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
FMK 202	Overview of the Globl Food Ind	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
Hours		15
Spring		
FMK 302	Undrstndg Food Cust & Consumrs	3
DSS 220	Business Analytics	3
Free Elective		3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Hours		15
Junior		
Fall		
FMK 301	Food Marketing Research	3
Theology		3
FMK 303	Food Marketing Communication	3
Free Elective		3
Natural Science		4
Hours		16
Spring		
FMK 318	Retail Food Market Management	3
Religious Studies		3
Literature		3
MGT 360	Legal Environment of Business	3

Free Elective		3
Hours		15
Senior		
Fall		
FMK 401	Food Marketing Strategy	3
Free Electives		9
Diversity Course		3
Hours		15
Spring		
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Food Marketing MBA

The Food Marketing Program is rooted in a 50-year tradition of academic excellence in Food Marketing and is designed for leaders and professionals with strong backgrounds in the food and beverage industries and associated fields. Our unique program provides advanced academic and developmental experiences in strategic marketing and related business disciplines.

Learning Goals and Outcomes

Goal 1: Students will gain an understanding of concepts, theories, and practices of effective leadership.

Goal 2: To develop critical thinking skills, that is, the process of conceptualizing, applying, analyzing, synthesizing, and/or evaluating information.

Outcome 2.1: Utilize skills as basis for solving problems and making decisions.

Goal 3: Develop interpersonal and communication skills.

Outcome 3.1: Students will demonstrate the ability to correspond effectively and persuasively in a business format and present to both individuals and groups clearly and persuasively.

Goal 4: Students will develop an appreciation for and ability to apply Ignatian values - an insistence upon ethical decision making and a desire for social justice – to business decisions.

Goal 5: Develop global/diverse perspective. Students will understand the challenges businesses face in a global economy, and the cultural issues firms must address to succeed in this environment. A fuller understanding of and respect for diversity in the population and in organizations related to differences across cultures, ethnic groups, socio-economic groups, gender and sexual orientation.

Goal 6: Students will acquire knowledge of the food and beverage industry: the macro environment in which the industry operates; industry structure; industry functions; and operations. Students will acquire knowledge of the supply chain for both retail as well as the food service sectors of the food and beverage industry.

Goal 7: Students will acquire knowledge of food and beverage marketing strategy including: developing strategic and tactical plans; marketing research and data analysis; segmentation and positioning; and the

marketing mix: product decisions, pricing decisions, distribution decisions, and communications decisions.

Requirements

The Master of Business Administration degree in Food Marketing requires successful completion of 12 courses with a minimum GPA of 3.0. Students take four general business core courses (12 credits) and eight industry-focused courses (24 credits) for a total of 36 credits. Students may be required to take up to five business competency modules to prepare for the core courses.

Foundation Modules - Business Competency Requirements

The Foundation courses are designed to ensure that all students in the program have the common body of knowledge necessary for advanced study in business. They are non credit competency modules developed by the department to develop the skills needed. Some may be waived based on undergraduate coursework.

They will be completely online, self-paced and can be worked on at any time. A “live” session is not required.

The following Foundation modules are required:

- Statistics - Required for all students
- Business Intelligence & Analytics
- Management
- Economics
- Accounting
- Marketing

Degree Requirements

Code	Title	Hours
ACC 550	Creat & Meas Shareholder Value	3
DSS 610	Business Analytics	3
FIN 550	Shareholder Value Management	3
MGT 550	Leadership and Ethics	3
Food Marketing Specialization Courses:		
FMK 713	Food & Beverage Mktg Strategy	3
FMK 722	Food & Beverage Mktg Research	3
or FMK 728	Qualitative Techniques	
or FMK 729	Quantitative Techniques	
FMK 795	Capstone	3
Electives, choose 5 courses from any course offered by the FMK department including:		15
FMK 711	Ovrw&Mgmt: Food&Beverage Ind	
FMK 714	Food & Beverage Mktg Analytics	
FMK 724	Revenue Growth Management	
FMK 725	Food & Beverage Consmr Insight	
FMK 726	Innovation & New Product Dev	
FMK 728	Qualitative Techniques	

FMK 729	Quantitative Techniques
FMK 732	Consumer Advertising & Promo.
FMK 734	Trade Promotion & Optimization
FMK 742	Multicul&Int Food&Beverage Mkt
FMK 743	International Marketing
FMK 753	Food & Beverage Retail Mktg
FMK 762	Food & Beverage Policy
FMK 772	Foodservice Mktg Management
FMK 781	Indep Study: Food & Bev Mktg
FMK 783	Food & Beverage Mktg Digi Stra
FMK 784	Food & Beverage Indry Summit
FMK 785	ST: Food & Beverage Mktg
FMK 710	Introduction to Agribusiness
FMK 712	Overview Hospitality Industry
FMK 730	Cust Serv Excell Hospitality

Total Hours

36

Food Marketing Minor For Non-Business Majors

Code	Title	Hours
FMK 202	Overview of the Globl Food Ind	3
FMK 302	Undrstdng Food Cust & Consumrs	3
FMK 303	Food Marketing Communication	3
Choose three electives of any course offered by the FMK undergraduate program, with the exception of FMK 401 Strategy. Additionally, one of the electives could be replaced with a course outside of the department that has significant content related to food, instead of a food marketing course.		9
FMK 318	Retail Food Market Management	
FMK 250	The Future of Food	
FMK 301	Food Marketing Research	
FMK 370	Digital & Social Media	
FMK 310	Brand Strategy	
FMK 312	New Product Development	
FMK 313	Food Distribution & Logistics	
FMK 314	International Food Marketing	
FMK 315	Globalization and Food Policy	
FMK 316	Selling Skills & Decisn Making	
FMK 317	Sales Mgt for CPG & Foodserv	
FMK 320	Foodservice Marketing	
FMK 330	Interntnl Food Mktg Study Tour	
FMK 331	On Site Food Service	
FMK 332	Commercial Food Service	
FMK 333	Foodserv Manufactg & Distribtn	
FMK 402	Future Issues in Food Mktg	
FMK 403	Independent Study Food Mktg	

Total Hours

18

Food Marketing MS

The Food Marketing Program is rooted in a 50-year tradition of academic excellence in Food Marketing and is designed for leaders and professionals with strong backgrounds in the food and beverage

industries and associated fields. Our unique program provides advanced academic and developmental experiences in strategic marketing and related business disciplines. Students together with a network of industry peers earn their degree by attending either Friday/Saturday sessions on the SJU campus or weekly online sessions. Courses are led by world-class faculty and are often co-taught with industry experts. Course work encompasses both strategic and hands-on experiences. Students may take as few or as many classes as fit their schedule, and graduate at their own pace - in as little as two years or as long as six years, the maximum time limit.

Learning Goals and Outcomes

Goal 1: Students will acquire knowledge of food and beverage marketing strategy including: developing strategic and tactical plans; marketing research and data analysis; segmentation and positioning; and the marketing mix: product decisions, pricing decisions, distribution decisions, and communications decisions.

Goal 2: Students will acquire knowledge of the food and beverage industry: the macro environment in which the industry operates; industry structure; industry functions; and operations. Students will acquire knowledge of the supply chain for both retail as well as the food service sectors of the food and beverage industry.

Goal 3: Students will acquire knowledge of food and beverage marketing strategy including: developing strategic and tactical plans; marketing research and data analysis; segmentation and positioning; and the marketing mix: product decisions, pricing decisions, distribution decisions, and communications decisions.

Requirements

The Master of Science degree in Food Marketing requires successful completion within six years of ten food industry-focused courses (30 credits). Students can choose any ten of the Food Marketing Specialization courses listed in the Food Marketing MBA curriculum. Minimum GPA of 3.0 required for degree.

Code	Title	Hours
Choose 10 Food Marketing Specialization Courses from amongst the 30 below or any other course offered by FMK		
FMK 722	Food & Beverage Mktg Research	
FMK 713	Food & Beverage Mktg Strategy	
FMK 711	Ovrvw&Mgmt: Food&Beverage Ind	
FMK 714	Food & Beverage Mktg Analytics	
FMK 724	Revenue Growth Management	
FMK 725	Food & Beverage Consmr Insight	
FMK 726	Innovation & New Product Dev	
FMK 728	Qualitative Techniques	
FMK 732	Consumer Advertising & Promo.	
FMK 734	Trade Promotion & Optimization	
FMK 742	Multicul&Int Food&Beverage Mkt	
FMK 753	Food & Beverage Retail Mktg	
FMK 762	Food & Beverage Policy	
FMK 772	Foodservice Mktg Management	
FMK 781	Indep Study: Food & Bev Mktg	
FMK 783	Food & Beverage Mktg Digi Stra	
FMK 784	Food & Beverage Indry Summit	
FMK 785	ST: Food & Beverage Mktg	

FMK 795	Capstone	
FMK 710	Introduction to Agribusiness	
FMK 712	Overview Hospitality Industry	
FMK 770	Special Topics	
Total Hours		30

Health Administration Major

The health administration major is designed to provide an opportunity to all business majors to explore the possibility of a career in healthcare. The program will create generations of value driven healthcare leaders prepared to address America’s healthcare challenges. Students will gain an understanding of the complexities of the healthcare system in the United States and gain exposure to international healthcare system.

Learning Goals and Outcomes

Goal 1: Functional healthcare skills

Outcome 1.1: Students will learn the concepts and tools necessary to prepare for leadership roles within healthcare organizations.

Goal 2: Critical Thinking skills

Outcome 2.1: Students will learn the skills to make decisions regarding the delivery of healthcare

Goal 3: Communication Skills

Outcome 3.1: Students will learn to communicate with the stakeholders in healthcare including patients, providers, payers, and policy makers

Goal 4: Jesuit Traditions

Outcome 4.1: Students will understand the role of Ignatian values in making decisions which affect the health and lives of the communities they serve.

Goal 5: Diversity, Equity & Inclusion

Outcome 5.1: Students will engage respectfully, in a local and global context, with diverse human beliefs, abilities, experiences, identities, or cultures. Future healthcare administrators have an obligation to the communities they serve.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3

Philosophy Level Two	3
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Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student’s Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student’s Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity		3
INT 151	Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student’s overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student’s Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student’s overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student’s overlay requirements.

Overlay Requirements

Writing-Intensive	3
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If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay	3
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Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours	47-49
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Recommended CCC Courses

Code	Title	Hours
Writing Intensive		
HAD 304	Health Policy	
Mission-Overlay		

HAD 320	Healthcare Law and Ethics
HAD 200	Healthcare Law and Ethics

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
HAD 201	Intro to Healthcare Admin	3
HAD 301	Health Info Mgmt Systems	3
HAD 302	Financial Mgmt of Health Orgs	3
HAD 320	Healthcare Law and Ethics	3
or HSC 251	Healthcare Law and Ethics	
HAD 304	Health Policy	3
HAD Elective: Any other HAD course or related course with advisor approval		3
HAD 303	Healthcare Quality Improvement	
DSS 330	Database Management	
DSS 415	Data Wrangling & Visualization	
DSS 416	Data Wrangling: Ethics Int.	
MGT 211	Perspectives on Leadership	
PMK 211	Pharmaceutical Mkt Environment	
FMK 316	Selling Skills & Decisn Making	
PMK 331	Pharm Sales Management	
FMK 317	Sales Mgt for CPG & Foodserv	
ECN 390	The Economics of Healthcare	
Mathematics (will count as CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 130	Whole Truth about Whole Number	
MAT 131	Linear Methods	
MAT 132	Math of Games & Politics	
MAT 134	Math of Uncertainty:Rules/Prob	
MAT 135	Sounding Number: Music & Math	

MAT 138	Symmetry
MAT 155	Fundamentals of Calculus
MAT 161	Calculus I
MAT 162	Calculus II
Total Hours	21-22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
ENG 101	Craft of Language	3
MGT 110	Essent'ls of Organizational Beh (or Philosophy Level One)	3
Mathematics	All allowed except Statistics	3-4
Non-Native Language		3-4
Hours		16-18
Spring		
ACC 102	Managerial Accounting	3
Literature		3
World History		3
ECN 101	Introductory Economics Micro (or Mathematics)	3
INT 151	Inequality in American Society	1
MGT 110	Essent'ls of Organizational Beh (or Philosophy Level One)	3
Hours		16
Sophomore		
Fall		
HAD 201	Intro to Healthcare Admin	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
FIN 200	Intro to Finance	3
MKT 201	Principles of Marketing	3
Hours		15
Spring		
Theology		3
DSS 220	Business Analytics	3
Free Elective		3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
ECN 102	Introductory Economics Macro	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective		3
HAD 301	Health Info Mgmt Systems	3
Hours		15
Spring		
Free Electives		6
Natural Science		4
Fine & Performing Arts, Design & Creativity		3

HAD Free Elective	3
Hours	16
Senior	
Fall	
HAD 304 Health Policy	3
Diversity	3
Major Elective	3
Free Electives	6
Hours	15
Spring	
BUS 495 Business Strategy	3
Free Electives	6-9
HAD 302 Financial Mgmt of Health Orgs	3
Hours	12-15
Total Hours	120-125

Health Administration MHA

The Masters in Health Administration program at Saint Joseph's University prepares future healthcare administrators to envision and lead positive change, locally, nationally and internationally. Through a set of core competencies acquired through active-learning, experiential and interpersonal learning opportunities, the program provides the skills and knowledge to optimally prepare our students to be successful health managers, with a lifelong commitment to learning, respect for diversity, ethical decision-making, and social justice.

Learning Goals and Outcomes

Goal 1: Communication

Outcome 1.1: Using appropriate technology, students will communicate effectively through written and oral modes of expression across academic, professional, and social contexts. They will also be able to demonstrate the ability to lead in team situations by motivating, inspiring, and directing others to achieve goals.

Goal 2: Critical Thinking and Inquiry

Outcome 2.1: Students will think critically and construct reasoned arguments to support their positions using skills appropriate to the context, such as deductive reasoning, scientific inquiry, quantitative reasoning, aesthetic judgment, or critical examination of form, style, content, and meaning.

Goal 3: Ethics, Social Justice, and Ignatian Values

Outcome 3.1: Students will assess and respond to ethical and social justice issues informed by Ignatian values and be able to generate scholarship that embodies free, open inquiry, provokes imaginative thinking and a commitment to lifelong learning, along with insistence upon ethical decision-making and care and concern for others.

Goal 4: Diversity

Outcome 4.1: Students will respectfully engage with diverse human beliefs, abilities, experiences, identities, or cultures locally and globally.

Goal 5: Discipline or Program-Specific Competencies

Outcome 5.1: Students will acquire the essential knowledge and skills to succeed and make well-reasoned judgments personally, professionally, and in their chosen area(s) of study.

Goal 6: Leadership

Outcome 6.1: Students will demonstrate the ability to lead in team situations. They will motivate, inspire, challenge, encourage, and direct a team to achieve its goals. Students will also become role models for their peer groups.

Requirements

Code	Title	Hours
Core Courses		
HAD 552	Health Administration	3
HAD 553	Health Care Organization	3
HAD 554	Health Care Law	3
HAD 555	Acc for Health Care Organiztns	3
or ACC 550	Creat & Meas Shareholder Value	
HAD 556	Fin Manag of Health Care Org.	3
or FIN 550	Shareholder Value Management	
HAD 557	Health Care Strat Plan & Mktg	3
HAD 558	Mgt of Healthcare Org	3
HAD 600	Ethics of Health Care	3
MHI 550	Research Methods	3
or HSV 550	Health Services Research	
MHI 560	Health Informatics	3
HAD 700	Health Administration Capstone	3
Electives (select one)		3
HAD 559	Health Policy	
HAD 601	Fieldwork in Health Admin	
MHI 561	Digital and Connected Health	
MHI 562	Database for Health Care	
MHI 563	Data Analysis for Health Care	
MHI 564	Privacy&Security: Health Care	
MHI 565	Health Data Standards	
PMK 620	Supply Chain Mgt in Healthcare	
PMK 660	Coding Coverage Reimbursement	
DSS 670	Data Visual & Perf Analyt	
Total Hours		36

Health Administration Minor

The health administration minor prepares students with fundamental knowledge to support any healthcare organization. This course curriculum prepares students to enter an engaging and growing career field by further embracing active learning and competency-based education in the spirit of Curis Personalis.

Learning Goals and Outcomes

Goal 1: Functional healthcare skills -Students will learn the concepts and tools necessary to prepare for leadership roles within healthcare organizations.

Goal 2: Critical Thinking skills - Students will learn the skills to make decisions regarding the delivery of healthcare.

Goal 3: Communication Skills - Students will learn to communicate with the stakeholders in healthcare including patients, providers, payers, and policy makers.

Goal 4: Jesuit Traditions - Students will understand the role of Ignatian values in making decisions which affect the health and lives of the communities they serve.

Goal 5: Diversity, Equity & Inclusion - Students will engage respectfully, in a local and global context, with diverse human beliefs, abilities, experiences, identities, or cultures. Future healthcare administrators have an obligation to the communities they serve.

Requirements

Code	Title	Hours
HAD 201	Intro to Healthcare Admin	3
HAD 301	Health Info Mgmt Systems	3
HAD 302	Financial Mgmt of Health Orgs	3
HAD 303	Healthcare Quality Improvement	3
Select two electives from the following:		6
DSS 330	Database Management	
DSS 415	Data Wrangling & Visualization	
DSS 416	Data Wrangling: Ethics Int.	
DSS 321	Project Management	
HAD 320 or HSC 251	Healthcare Law and Ethics	
MGT 211	Perspectives on Leadership	
HAD 304	Health Policy	
PMK 211	Pharmaceutical Mkt Environment	
FMK 316	Selling Skills & Decisn Making	
PMK 331	Pharm Sales Management	
FMK 317	Sales Mgt for CPG & Foodserv	
ECN 390	The Economics of Healthcare	
Total Hours		18

Health Administration/Health Informatics MHA/MHI

The dual degree in Medical Health Informatics and Health Administration allows students to complete both degrees in a shorter time frame, by allowing double counting of some courses. It's a great option for anyone seeking advancement in the health fields.

The Masters in Health Administration program at Saint Joseph's University prepares future healthcare administrators to envision and lead positive change, locally, nationally and internationally. Through a set of core competencies acquired through active-learning, experiential and interpersonal learning opportunities, the program provides the skills and knowledge to optimally prepare our students to be successful health managers, with a lifelong commitment to learning, respect for diversity, ethical decision-making, and social justice.

The Health Informatics program prepares students to implement and utilize information technology to support any healthcare organization. Our students are guided by a philosophy of inquiry, insight, and innovation. Students will be challenged to think boldly and to seek out and answer difficult questions using healthcare data. The learning environment will prepare students for the challenges of a professional

career in a healthcare setting. The program will help students to develop the competencies and acquire the practical tools to succeed in today's digital healthcare environment.

The Masters in Health Informatics (MHI) is an innovative applied graduate degree program that addresses the intersection of healthcare and information technology to develop efficient systems and processes. Students are challenged to analyze health data across the continuum of healthcare delivery to improve patient care and advance individual and population health outcomes. The MHI is designed for physicians, nurses, therapists, and information technology and health information technology professionals. The degree is also well suited for individuals with no prior healthcare or information technology experience. The MHI program offers the ability for students to gain applied experience with clinical information technology systems. Students will gain over 50 hours of hands-on experience using clinical grade informatics technology in an educational setting.

Learning Goals and Outcomes

Goal 1: Describe the history, goals, methods (including data and information used and produced), and current challenges of the major health science fields. Identify theories or models that explain and modify patient or population behaviors related to health and health outcome.

Goal 2: Identify the effects of social, behavioral, legal, psychological, management, cognitive, and economic theories. Identify possible biomedical and health information science and technology methods and tools for solving a specific biomedical and health information problem. Draw on socio#technical knowledge regarding the social behavioral sciences and human factors engineering to apply to the design and implementation of information systems and technology. Identify the theories, models, and tools from social, business, human factors, behavioral, and information sciences and technologies for designing, implementing, and evaluating health informatics solutions.

Goal 3: Identify the applicable information science and technology concepts, methods, and tools, to solve health informatics problems.

Goal 4: Define and discuss ethical principles and the informatician's responsibility to the profession, their employers, and ultimately to the stakeholders of the informatics solutions they create and maintain.

Goal 5: Define and discuss the scope of practice and roles of different health professionals and stakeholders including patients, as well as the principles of team science and team dynamics to solve complex health and health information problems. Articulate the methods, concepts, tools, and characteristics of leading and leadership.

Requirements

Code	Title	Hours
HAD 553	Health Care Organization	3
HAD 554	Health Care Law	3
HAD 555	Acc for Health Care Organiztns	3
or ACC 550	Creat & Meas Shareholder Value	
HAD 556	Fin Manag of Health Care Org.	3
or FIN 550	Shareholder Value Management	
HAD 559	Health Policy	3
HAD 600	Ethics of Health Care	3
MHI 550	Research Methods	3
or HSV 550	Health Services Research	

MHI 560	Health Informatics	3
MHI 561	Digital and Connected Health	3
MHI 562	Database for Health Care	3
or DSS 625	Fund of Database Mgmt Systems	
or DSS 630	Database Mgmt Theory & Pract	
or CSC 621	Database Systems	
MHI 563	Data Analysis for Health Care	3
MHI 564	Privacy&Security: Health Care	3
MHI 565	Health Data Standards	3
MHI 700	Health Informatics Capstone	3
Electives (Select one course)		3
CSC 549	Computing Essentials	
CSC 611	Human Computer Interaction	
CSC 622	Advanced Database Concepts	
CSC 647	Internet of Things	
DSS 660	Introduction to Data Mining	
DSS 670	Data Visual & Perf Analyt	
DSS 680	Predictive Analytics	
HED 551	Map Hlth Res, Pln, Pol Dev&Mkt	
HAD 552	Health Administration	
HAD 557	Health Care Strat Plan & Mktg	
HAD 558	Mgt of Healthcare Org	
MHI 670	Special Topics in MHI	
Total Hours		45

Health Informatics Graduate Certificate

The Health Informatics Graduate Certificate is a 12-credit certificate designed to instill in students the skills needed to embark on or advance a career in health informatics. The certificate program provides hands-on skills taught by industry leaders using and implementing advanced health information technology (IT). The certificate is designed to expand student understanding of privacy and security requirements, the role of standards and data exchange, and fundamentals associated with oversight of health IT systems. The certificate program provides a good pathway for students to enroll in the MHI program with advanced standing.

Requirements

Code	Title	Hours
MHI 560	Health Informatics	3
Choose three of the following:		9
DSS 625	Fund of Database Mgmt Systems	
MHI 550	Research Methods	
MHI 561	Digital and Connected Health	
MHI 563	Data Analysis for Health Care	
MHI 564	Privacy&Security: Health Care	
MHI 565	Health Data Standards	
Total Hours		12

Health Informatics MHI

The Health Informatics program prepares students to implement and utilize information technology to support any healthcare organization. Our students are guided by a philosophy of inquiry, insight, and innovation. Students will be challenged to think boldly and to seek out and answer difficult questions using healthcare data. The learning environment will prepare students for the challenges of a professional career in a healthcare setting. The program will help students to develop the competencies and acquire the practical tools to succeed in today's digital healthcare environment.

The Master of Health Informatics (MHI) is an innovative 33 credit hour applied graduate degree program that addresses the intersection of healthcare and information technology to develop efficient systems and processes. Students are challenged to analyze health data across the continuum of healthcare delivery to improve patient care and advance individual and population health outcomes. The MSHI is designed for physicians, nurses, therapists, and information technology and health information technology professionals. The degree is also well suited for individuals with no prior healthcare or information technology experience. The MHI program offers the ability for students to gain applied experience with clinical information technology systems. Students will gain over 50 hours of hands-on experience using clinical grade informatics technology in an educational setting.

Learning Goals and Outcomes

Goal 1: Describe the history, goals, methods (including data and information used and produced), and current challenges of the major health science fields. Identify theories or models that explain and modify patient or population behaviors related to health and health outcome.

Goal 2: Identify the effects of social, behavioral, legal, psychological, management, cognitive, and economic theories. Identify possible biomedical and health information science and technology methods and tools for solving a specific biomedical and health information problem. Draw on socio#technical knowledge regarding the social behavioral sciences and human factors engineering to apply to the design and implementation of information systems and technology. Identify the theories, models, and tools from social, business, human factors, behavioral, and information sciences and technologies for designing, implementing, and evaluating health informatics solutions.

Goal 3: Identify the applicable information science and technology concepts, methods, and tools, to solve health informatics problems.

Goal 4: Define and discuss ethical principles and the informatician's responsibility to the profession, their employers, and ultimately to the stakeholders of the informatics solutions they create and maintain.

Goal 5: Define and discuss the scope of practice and roles of different health professionals and stakeholders including patients, as well as the principles of team science and team dynamics to solve complex health and health information problems. Articulate the methods, concepts, tools, and characteristics of leading and leadership.

Requirements

Code	Title	Hours
HAD 559	Health Policy	3
MHI 550	Research Methods	3
or HSV 550	Health Services Research	

MHI 560	Health Informatics	3
MHI 561	Digital and Connected Health	3
MHI 562	Database for Health Care	3
or DSS 625	Fund of Database Mgmt Systems	
MHI 563	Data Analysis for Health Care	3
MHI 564	Privacy&Security: Health Care	3
MHI 565	Health Data Standards	3
MHI 700	Health Informatics Capstone	3
Choose two of the following:		6
CSC 549	Computing Essentials	
CSC 667	Info Govern, Risk & Compliance	
DSS 630	Database Mgmt Theory & Pract	
DSS 660	Introduction to Data Mining	
DSS 670	Data Visual & Perf Analyt	
DSS 680	Predictive Analytics	
HAD 552	Health Administration	
HAD 557	Health Care Strat Plan & Mktg	
MHI 670	Special Topics in MHI	
CSC 611	Human Computer Interaction	
HAD 558	Mgt of Healthcare Org	
CSC 622	Advanced Database Concepts	
Total Hours		33

Healthcare Management Graduate Certificate

Requirements

Code	Title	Hours
PMK 600	Health Care Marketing	3
or MKT 550	Marketing Management	
Choose three of the following:		9
PMK 610	Business of Healthcare	
PMK 620	Supply Chain Mgt in Healthcare	
PMK 640	Pharmacoeconomics	
PMK 660	Coding Coverage Reimbursement	
PMK 670	Pricing in Healthcare Industry	
PMK 680	Healthcare Strategic Managemen	
HAD 552	Health Administration	
HAD 553	Health Care Organization	
HAD 554	Health Care Law	
HAD 555	Acc for Health Care Organiztns	
HAD 556	Fin Manag of Health Care Org.	
HAD 557	Health Care Strat Plan & Mktg	
HAD 558	Mgt of Healthcare Org	
HAD 559	Health Policy	
HAD 600	Ethics of Health Care	
Total Hours		12

Hospitality Management Graduate Certificate

Erivan K. Haub School of Business' unique four course (12 credits) Graduate Certificate in Hospitality Management is designed to develop and build specialized knowledge and enable current and future hospitality professionals to become more competitive in the job market, more attractive for promotions and can lead to new opportunities in different segments of the industry.

Requirements

Code	Title	Hours
FMK 711	Ovrw&Mgmt: Food&Beverage Ind	3
FMK 712	Overview Hospitality Industry	3
Choose two electives:		6
FMK 713	Food & Beverage Mktg Strategy	
FMK 725	Food & Beverage Consmr Insight	
FMK 730	Cust Serv Excell Hospitality	
FMK 732	Consumer Advertising & Promo.	
FMK 735	Event Planning & Execution	
FMK 785	ST: Food & Beverage Mktg	
Total Hours		12

Pharmaceutical & Healthcare Business Major

The pharmaceutical & healthcare business major at Saint Joseph's University will teach you how to oversee efficient clinical research and manage complex healthcare costs that are currently challenging the industry. You have the option to add co-op or engage in faculty mentored research.

Learning Goals and Outcomes

Goal 1: Leadership

Outcome 1.1: Students will demonstrate the ability to lead in team situations, that is, to motivate, inspire and direct a team to achieving its goals.

Goal 2: Knowledge of functional area

Outcome 2.1: Students will know core concepts within each business discipline of accounting, finance, management, marketing, and information technology.

Goal 3: Critical thinking and problem solving

Outcome 3.1: Students will be able to analyze business scenarios in an integrative way and make constructive and actionable recommendations for problem solving.

Goal 4: Interpersonal/communication skills

Outcome 4.1: Students will demonstrate competency in written and verbal communication aimed at facilitating, and reporting the results of, collaborative problem solving and decision making processes.

Goal 5: Ignatian Values

Outcome 5.1: Students will be able to generate scholarship that embodies free, open inquiry, and provokes imaginative thinking and reflection on values. An appreciation for and ability to apply the Ignatian values of: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 6: Global/Diversity

Outcome 6.1: Students will understand the challenges businesses face in a global economy, and the cultural issues firms must address to succeed in this environment. A fuller understanding of and respect for diversity in the population and in organizations related to differences across cultures, ethnic groups, socioeconomic groups, gender and sexual orientation.

Goal 7: Strategic Thinking

Outcome 7.1: Students will exhibit strategic approaches to the complex business related problems in the pharmaceutical industry and provide alternative strategies evaluating the pros and cons of those approaches.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Writing Intensive		
PMK 461	Pharm Mkt Strat & Plan I	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements:

Code	Title	Hours
PMK 211	Pharmaceutical Mkt Environment	3
PMK 221	Pharmaceutical Mkt Research	3
PMK 331	Pharm Sales Management	3
PMK 341	Pharm Channels & Pricing	3
PMK 351	Pharm Promotions Management	3
PMK 461	Pharm Mkt Strat & Plan I	3
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		21-22

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
ENG 101	Craft of Language	3
MGT 110	Essent'ls of Organizational Beh (or Philosophy Level One)	3
Non-Native Language		3-4
ECN 101	Introductory Economics Micro (or Mathematics)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
World History		3
Literature		3
ECN 101	Introductory Economics Micro (or Mathematics)	3
MGT 110	Essent'ls of Organizational Beh (or Philosophy Level One)	3
INT 151	Inequality in American Society	1
Hours		16
Sophomore		
Fall		
BIO 165	Exploring the Living World <small>Recommended Natural Science</small>	4
BIO 165L	Exp. Living World Lab	0
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
FIN 200	Intro to Finance	3
Theology		3
Hours		16
Spring		
PMK 211	Pharmaceutical Mkt Environment	3
DSS 220	Business Analytics	3
MKT 201	Principles of Marketing	3
Philosophy Level Two		3
ECN 102	Introductory Economics Macro	3
Hours		15

Junior		
Fall		
PMK 221	Pharmaceutical Mkt Research	3
PMK 331	Pharm Sales Management	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective		3
Hours		15
Spring		
PMK 341	Pharm Channels & Pricing	3
PMK 351	Pharm Promotions Management	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Senior		
Fall		
PMK 461	Pharm Mkt Strat & Plan I	3
Free Electives		9
Diversity		3
Hours		15
Spring		
BUS 495	Business Strategy	3
Free Electives		9-12
Hours		12-15
Total Hours		120-124

Pharmaceutical & Healthcare Business Minor

Code	Title	Hours
PMK 211	Pharmaceutical Mkt Environment	3
PMK 221	Pharmaceutical Mkt Research	3
PMK 331	Pharm Sales Management	3
PMK 341	Pharm Channels & Pricing	3
PMK 351	Pharm Promotions Management	3
PMK 461	Pharm Mkt Strat & Plan I	3
Total Hours		18

Pharmaceutical & Healthcare Marketing MBA

The Pharmaceutical & Healthcare Marketing MBA at Saint Joseph's University is designed to accelerate your career by enhancing your marketing knowledge through academic study and real-world experience in the healthcare industry. The Pharmaceutical & Healthcare Marketing MBA curriculum provides you with an understanding of a variety of relevant marketing topics, addressing the successful business of healthcare delivery from the perspectives of all industry stakeholders – from biopharma products to patients, payers and provider networks.

Learning Goals and Outcomes

Goal 1: Leadership

Outcome 1.1: Students will demonstrate the ability to lead in team situations, that is, to motivate, inspire and direct a team to achieving its goals.

Goal 2: Knowledge of functional area

Outcome 2.1: Students will know core concepts within each business discipline of accounting, finance, management, marketing, and information technology.

Goal 3: Critical thinking and problem solving

Outcome 3.1: Students will be able to analyze business scenarios in an integrative way and make constructive and actionable recommendations for problem solving.

Goal 4: Interpersonal/communication skills

Outcome 4.1: Students will demonstrate competency in written and verbal communication aimed at facilitating, and reporting the results of, collaborative problem solving and decision making processes.

Goal 5: Ignatian Values

Outcome 5.1: Students will be able to generate scholarship that embodies free, open inquiry, and provokes imaginative thinking and reflection on values. An appreciation for and ability to apply the Ignatian values of: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Goal 6: Global/Diversity

Outcome 6.1: Students will understand the challenges businesses face in a global economy, and the cultural issues firms must address to succeed in this environment. A fuller understanding of and respect for diversity in the population and in organizations related to differences across cultures, ethnic groups, socio-economic groups, gender and sexual orientation.

Goal 7: Strategic Thinking

Outcome 7.1: Students will exhibit strategic approaches to the complex business related problems in the pharmaceutical and healthcare industries and provide alternative strategies evaluating the pros and cons of those approaches.

Requirements

The Pharmaceutical & Healthcare Marketing MBA requires the completion of 12 courses (four core business courses and eight industry-focused courses). All courses are three credits each for a total of 36 credits. Students may be required to complete up to five business competency modules to prepare them for the core MBA courses. In addition to satisfying the requirements for the full MBA degree, students may earn up to two stackable certificates in Healthcare Management, and Biotech & Life Sciences Management by completing six industry-focused elective courses.

Foundation Modules - Business Competency Requirements

The Foundation courses are designed to ensure that all students in the program have the common body of knowledge necessary for advanced study in business. They are non credit competency modules developed by the department to develop the skills needed. Some may be waived based on undergraduate coursework.

They will be completely online, self-paced, and can be worked on anytime. A “live” session is not required.

The following Foundation modules are required:

- Statistics - Required for all students
- Business Intelligence & Analytics
- Management
- Economics
- Accounting
- Marketing

Code	Title	Hours
Core Courses		
ACC 550	Creat & Meas Shareholder Value	3
DSS 610	Business Analytics	3
FIN 550	Shareholder Value Management	3
MGT 550	Leadership and Ethics	3
PMK 600	Health Care Marketing	3
PMK 795	Capstone	3
Specialized Pharmaceutical & Healthcare Marketing Courses (select six of the following electives)		18
PMK 610	Business of Healthcare	
PMK 620	Supply Chain Mgt in Healthcare	
PMK 625	Pharmaceutical R&D	
PMK 630	Healthcare Marketing Analytics	
PMK 640	Pharmacoeconomics	
PMK 651	Life Sciences Promotion	
PMK 660	Coding Coverage Reimbursement	
PMK 665	Sales Management	
PMK 670	Pricing in Healthcare Industry	
PMK 680	Healthcare Strategic Managemen	
PMK 700	Managed Market Access	
PMK 720	Global Healthcare Markets	
PMK 770	Independent Study	
PMK 780	Future Issues	
Total Hours		36

Management

In concert with the Ignatian vision of intellectual excellence informed by conscience, our mission as the Department of Management is to develop leaders who have a broad, value-oriented perspective, and who are able to integrate many dimensions of organizations—behavioral, cultural, economic, environmental, ethical, historical, international, legal, and structural—in making balanced and responsible decisions that affect their organizations, their stakeholders, and themselves. We prepare students to continue in life as creative, highly skilled and intellectually curious learners who exhibit rigorous, moral, and stakeholder-based discernment in their actions and decision-making. Toward fulfilling our mission, the management faculty is committed to listen and advise you toward achieving your goals and objectives.

Faculty

The faculty and staff in the Department of Management stem from high-level backgrounds with Fortune 100 companies in consulting, law, auditing, business management, entrepreneurship and more. Faculty and staff are deeply dedicated to sharing their business knowledge and experience and preparing students for successful careers after graduation.

Department of Management Faculty & Staff (<https://www.sju.edu/departments/management/faculty-staff/>)

Programs

Undergraduate Majors

- Entrepreneurship (p. 245)
- Human Resources and People Management (p. 249)
- International Business (p. 251)
- Leadership, Ethics and Organizational Sustainability (p. 254)

Undergraduate Minors

- Entrepreneurship (p. 247)
- Human Resources and People Management (p. 251)
- International Business (p. 254)
- Leadership, Ethics and Organizational Sustainability (p. 256)

Graduate

- Human Resource Management (p. 248)
- Organization Development and Leadership (p. 257)

Graduate Certificates

- Diversity, Equity, and Inclusion (p. 243)
- Ethical Coaching in Sports (p. 248)
- Human Resource Management (p. 248)
- Leadership (p. 254)
- Neurodiversity in the Workplace (<https://academiccatalog.sju.edu/business/management/neurodiversity-workplace-cert/>)
- Organizational Development and Change (p. 257)

Diversity, Equity, and Inclusion Graduate Certificate

Code	Title	Hours
MGT 550	Leadership and Ethics ¹	3
or MGT 555	Equity in Organizations	
Electives		9
MGT 585	Support Neurodiv Workplace	
MGT 610	Social Identity Theories	
MGT 648	Conflict & Negotiation	
MGT 655	Org Culture Beyond Diversity	
MGT 675	Implementing Change	
MGT 690	Creative Problem Solving	
MGT 760	Inclusive Convers: DEI	
Total Hours		12

¹ MBA students who have taken MGT 550 should also take MGT 555, which will be applied toward the DEI Certificate.

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)

- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
-

Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5

PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Total Hours		140

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12

Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23
Summer		
Haub course/Professional Elective		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Entrepreneurship Major

It is estimated that there are over 31 million entrepreneurs in the United States. These entrepreneurs have created and run businesses that span between home-based businesses to international companies. All industries are represented as fertile ground for entrepreneurs to capitalize on opportunities. Entrepreneurs have been a driving force in our economy and will continue to be an integral component as we move forward.

The best way to predict your future is to create it. That's the thinking behind Saint Joseph's University's Entrepreneurship major. This program will help you learn the skills, theories and tools needed to launch your own business, to bring an entrepreneurial mindset to the corporate world, enhance a family business, or to develop a social venture to make a difference in the world. Several of our entrepreneurship students have developed or enhanced their own entrepreneurial ventures.

The curriculum is structured around a skills-based, multidisciplinary, hands on approach to entrepreneurship that offers students a chance to not only understand the field of entrepreneurship, but to do so in an

experiential learning environment. The major allows students flexibility based on their individual career goals.

The major is designed in a way that students gain experience with the key skills needed to successfully recognize opportunities, plan the venture, leverage networking, build an effective entrepreneurial team, and to integrate the important components of Accounting, Finance, Marketing, Management, and Business Law. We have developed specific learning objectives for the Entrepreneurship major and coordinated them throughout the curriculum to allow students to build on their entrepreneurial skillset as they progress through the curriculum.

Learning Goals and Outcomes

Goal 1. Communication in Entrepreneurship: Students will demonstrate the ability to effectively communicate both orally and in writing.

Goal 2. Critical Thinking and Entrepreneurship: Students will demonstrate the ability to problem solve and apply critical thinking in an entrepreneurial setting.

Goal 3. Jesuit Tradition/Ethics/Social Justice in Entrepreneurship: Students will demonstrate the role of ethics and social justice in entrepreneurship.

Goal 4. Program Specific:

Outcome 4.1: Recognizing Entrepreneurial Opportunities: Students will learn skills and demonstrate the ability to recognize entrepreneurial Opportunities.

Outcome 4.2: Business Planning in Entrepreneurship: Students will learn skills and tools to understand and engage in all facets of an action-based approach to business planning.

Outcome 4.3: Role of Networking/connections in Entrepreneurship: Students will learn the value of the importance of networking/connections to a successful entrepreneurial venture.

Outcome 4.4: Roles of Teams in Entrepreneurship: Students will understand the role of teams in entrepreneurial ventures and develop skills of working in teams.

Outcome 4.5: Multi-discipline Nature of Entrepreneurship: Students will develop skills and understanding of the multi-disciplinary nature of entrepreneurship.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3

Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151 Inequality in American Society	1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses:

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	
Mission-Overlay		
MGT 210	Business Stakeholders & Ethics	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
Required Courses		
MGT 230	Intro:Entrepreneur/New Venture	3
MGT 210	Business Stakeholders & Ethics (will count for CCC: Mission-Overlay)	3
MGT 362	Topics in Business Law	3
FIN 303	Small Business Finance	3
MKT 301	Integrated Mktg Communications	3
or FMK 303	Food Marketing Communication	
or PMK 351	Pharm Promotions Management	
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Select Two of the following electives:		6
MGT 211	Perspectives on Leadership	
MGT 220	Intro Human Resource Managemen	
MGT 221	Diversity in the Workplace	
MGT 222	Influence,Negotiation&Conflict	
MGT 231	Family Business	
MGT 330	Social Enterprise & Soc Change	
FMK 202	Overview of the Globl Food Ind	
FMK 302	Undrstndg Food Cust & Consumrs	
FMK 312	New Product Development	
IBU 210	Intro International Business	
MKT 202	Marketing Research	
MKT 302	Consumer & Buyer Behavior	
RMI 200	Introduction to Insurance	

RMI 301	Corporate Risk Management
Total Hours	24-25

Free Electives

Six or seven courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Theology) or Essentials of Management	3
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
Non-Native Language		3-4
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Theology) or Essentials of Management	3
Mathematics or Non-Native Language		3-4
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
MGT 230	Intro:Entrepreneur/New Venture	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201 or FIN 200	Principles of Marketing or Intro to Finance	3
Philosophy Level One		3
Hours		15
Spring		
MGT 210	Business Stakeholders & Ethics	3
MGT 360	Legal Environment of Business	3
DSS 220	Business Analytics	3
FIN 200 or MKT 201	Intro to Finance or Principles of Marketing	3
Philosophy Level Two		3
Hours		15
Junior		
Fall		
MGT 362	Topics in Business Law	3
Major Elective		3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
MKT 301 or FMK 303 or PMK 351	Integrated Mktg Communications or Food Marketing Communication or Pharm Promotions Management	3
FIN 303	Small Business Finance	3
Natural Science		4

Free Electives		6
Hours		16
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
MGT 221	Diversity in the Workplace	3
Literature		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Entrepreneurship Minor Requirements

Code	Title	Hours
Required Courses		
MGT 110 or MGT 120 or MGT 121	Essent'ls of Organizational Beh Essentials of Management Organizations in Perspc Honors	3
MKT 201	Principles of Marketing	3
MGT 230	Intro:Entrepreneur/New Venture	3
MGT 362	Topics in Business Law	3
MKT 301 or FMK 303 or PMK 351	Integrated Mktg Communications Food Marketing Communication Pharm Promotions Management	3
Select one of the following electives:		3
MGT 231	Family Business	
MGT 330	Social Enterprise & Soc Change	
MGT 210	Business Stakeholders & Ethics	
MGT 211	Perspectives on Leadership	
MGT 220	Intro Human Resource Managemen	
MGT 221	Diversity in the Workplace	
MGT 222	Influence,Negotiation&Conflict	
FMK 202	Overview of the Globl Food Ind	
FMK 302	Undrstndg Food Cust & Consumrs	
IBU 210	Intro International Business	
FIN 303	Small Business Finance	
MKT 202	Marketing Research	
MKT 302	Consumer & Buyer Behavior	
MKT 304	Principles of Selling	
RMI 200	Introduction to Insurance	
Total Hours		18

Note: Students are responsible for completing prerequisites to MGT 362 outside the minor.

Ethical Coaching in Sports Graduate Certificate

The Ethical Coaching in Sports Graduate Certificate is designed to help students—who are currently high school or college coaches or are pursuing this role—to grow as more ethical, people-centered coaches. Courses in this certificate are restricted only to students enrolled in the certificate.

Learning Goals and Outcomes

Goal 1: Learn about applied ethics in the domain of working with scholar-athletes and other stakeholders.

Goal 2: Grow in understanding about equity in organizations and their role as champions of diversity, equity, and inclusion.

Goal 3: Learn about managing scholar-athlete well-being.

Requirements

Code	Title	Hours
MGT 550	Leadership and Ethics	3
MGT 555	Equity in Organizations	3
MGT 595	Managing Well-Being	3
Select One:		3
MGT 565	Leading Change in Organ	
MGT 602	Organizational Culture	
MGT 650	Organizational Leadership	
Total Hours		12

Human Resource Management Graduate Certificate

The Human Resource Management Graduate Certificate gives students an essential understanding of the field of Human Resources (HR). While certainly beneficial for HR professionals, this certificate will also give anyone in—or seeking—a people management role essential knowledge of HR principles and practices.

Learning Goals and Outcomes

Goal 1: Students will gain an understanding of essential human resources knowledge and practices.

Goal 2: Students will learn how human resources contributes to the strategic effectiveness of organizations.

Requirements

Code	Title	Hours
MGT 550	Leadership and Ethics	3
or MGT 555	Equity in Organizations	
MGT 556	Human Resource Fundamentals	3
MGT 562	Employment and Labor Law	3
MGT 775	Strategic HR & Talent Mgt	3
Total Hours		12

Human Resource Management MS

The Master of Science in Human Resource Management is an online program that may be completed on a part-time basis only and is designed specifically for highly motivated individuals. Students complete the program fully online and each course is offered in a 7-week module. The intent of the program is to accept only those students who have a high probability of successfully completing the graduate program. Students in the program benefit from weekly, synchronous online class sessions with classmates and their instructor. Students can begin the program in the fall, spring or summer semester.

Learning Goals and Outcomes

Goal 1. Knowledge of Functional Business

Outcome 1.1: Students will have an understanding of functional knowledge.

Goal 2. Leadership

Outcome 2.1: Students will gain an understanding of leadership.

Goal 3. Comprehension of global multicultural environments

Outcome 3.1: Students will demonstrate comprehension of global and multicultural environments.

Goal 4. Problem Solving and Critical Thinking Skills

Outcome 4.1: Students will demonstrate critical thinking and problem solving skills.

Goal 5. Communication Skills

Outcome 5.1: Students will demonstrate competency in interpersonal and communication skills both verbal and written.

Goal 6. Knowledge of the Jesuit tradition of social justice and lifelong learning

Outcome 6.1: Students will demonstrate knowledge of Jesuit tradition of social justice and lifelong learning.

Requirements

The MS in HRM online curriculum consists of 30 credits (10 courses) that are designed to cover the common body of knowledge required in the field of human resources and human capital management. The depth and breadth of courses allow students to develop expertise that allows the leveraging of people assets within an organization.

The final core course in the program (MGT 775 Strategic HR and Talent Management) is the capstone of the MS in HRM curriculum, in which students integrate the theories and practices studied throughout the degree and apply their knowledge in the field.

Program Course Schedule

Each of the 10 program courses is offered in a seven-week online format.

Code	Title	Hours
MGT 556	Human Resource Fundamentals	3
MGT 550	Leadership and Ethics	3
MGT 561	HR & People Research, Meas&Met	3
MGT 562	Employment and Labor Law	3

MGT 563	Human Resource Technology	3
MGT 555	Equity in Organizations	3
Electives		9
Capstone		3
MGT 775	Strategic HR & Talent Mgt	
Total Hours		30

Electives

Students may take any three graduate MGT electives, although it is recommended students use their electives to apply toward a graduate certificate in Diversity, Equity, and Inclusion; Neurodiversity in the Workplace; Leadership; or Organization Development and Change (see Certificate pages for elective options).

Course Sequence

Core courses in the MS in HRM Program are designed to ensure that courses are integrated and build students' cumulative knowledge to achieve the overarching objective of the program - to create strategic HR leaders.

MGT 556 should be among the first courses taken in the program. MGT 775 is taken in the student's last, or second to last, semester. The remaining courses can be taken in any sequence throughout the program.

Synchronous Online Courses

The MS in HRM Program offers an online curriculum that requires students to participate in live, online course sessions once a week, per module. These online sessions are typically held in the evening, after 6pm.

Human Resources and People Management Major

The Human Resources and People Management (HRPM) degree prepares students for careers in the human resources (HR) management field by not only teaching students the functional knowledge, but by developing the skills necessary for implementation of strategic and legally defensible HR practices in contemporary business organizations. Human resources management involves the attraction, retention, development, and deployment of an organization's most important asset: its human capital. There has never been a more exciting time to join this growing field as organizations increasingly differentiate themselves through their people. Students in the HRPM program are well prepared to take HR roles as generalists, employee relations specialists, compensation specialists, human capital analysts, trainers, recruiting specialists, and other specialist and generalist roles in the human resources field. In addition, some of our alumni have chosen to follow a more general management track after graduation. Our curriculum is formally aligned with the guidelines published by the Society for Human Resource Management (SHRM), the world's largest Human Resources professional organization. SHRM provides education, research, advocacy, and certification. Our alignment with the SHRM Body of Knowledge was examined by SHRM prior to our certification as an aligned major, and demonstrates to future employers that they can rely on the fact that our students have been educated in all the areas considered essential for a human resources practitioner.

Learning Goals and Outcomes

Goal 1. Communication in HR

Outcome 1.1: Students will demonstrate the ability to communicate effectively in writing.

Goal 2. Critical Thinking and HR

Outcome 2.1: Students will demonstrate the ability to problem solve and apply critical thinking to people management issues.

Goal 3. Jesuit Tradition/Ethics/Social Justice in HR/People Management

Outcome 3.1: All HRPM Students will demonstrate appreciation/knowledge of the role of ethics and social justice.

Goal 4. Diversity

Outcome 4.1: All HR/People Management Students will demonstrate appreciation/knowledge of the importance of diversity & inclusion and respect of differences.

Program Specific

Goal 5. Motivation

Outcome 5.1: All HR/People Management students will learn and be able to apply theories of human motivation.

Goal 6. Performance

Outcome 6.1: All HR/People Management students will learn and be able to apply theories of performance management

Goal 7. Retention

Outcome 7.1: All HR/People Management students will learn and be able to apply theories of retention of talent.

Goal 8. Strategic HRM

Outcome 8.1: All HR/People Management students will be able to synthesize and analyze issues related to human resource strategy and planning.

Goal 9. HR analytics

Outcome 9.1: All HR/People Management students will learn and be able to apply the use of data analytics for human resource decision making.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3

Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151 Inequality in American Society	1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	
Mission-Overlay		
MGT 210	Business Stakeholders & Ethics	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
MGT 220	Intro Human Resource Managemen	3
MGT 221	Diversity in the Workplace (will count for CCC: Diversity)	3
MGT 210	Business Stakeholders & Ethics (will count for CCC: Mission-Overlay)	3
MGT 322	Decision Making w/ Analytics ¹	3
MGT 425	Managing HR: Resrch/Appl	3
Select two of the following:		6
ECN 330	Economics of Labor	
IBU 210	Intro International Business	
MGT 211	Perspectives on Leadership	
MGT 212	Organizational Sustainability	
MGT 222	Influence,Negotiation&Conflict	
MGT 230	Intro:Entrepreneur/New Venture	
MGT 310	Breaking News in Bus. Ethics	
MGT 320	Career Management	
MGT 321	International Talent Mgt	
MGT 330	Social Enterprise & Soc Change	
MGT 362	Topics in Business Law	
MGT 370/470	Special Topics I	
MGT 398	Neurodiversity at Work Interns	
MGT 471	Practicum in Management	
MGT 490/491	Internship I	
MGT 493/494	Research I	
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	

MAT 161	Calculus I
Total Hours	24-25

¹ If students have taken one of the following courses: DSS 315, FMK 301, MKT 202, PSY 211 or SOC 312 they may substitute any HRPM major elective for MGT 322.

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (of Theology) or Essentials of Management	3
Non-Native Language or Mathematics		3-4
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Theology) or Essentials of Management	3
Non-Native Language or Mathematics		3-4
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
MGT 220	Intro Human Resource Managemen	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
Philosophy Level One		3
Hours		15
Spring		
MGT 221	Diversity in the Workplace	3
MGT 210	Business Stakeholders & Ethics	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Hours		15
Junior		
Fall		
Major Elective		3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
MGT 322	Decision Making w/ Analytics	3
Natural Science		4

Free Electives		9
Hours		16
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
MGT 425	Managing HR: Resrch/Appl	3
Literature		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Human Resources and People Management Minor Requirements

Code	Title	Hours
MGT 110 or MGT 120 or MGT 121	Essent'ls of Organizational Beh Essentials of Management Organizations in Perspc Honors	3
MGT 360 or MGT 361	Legal Environment of Business Introduction to Law Honors	3
MGT 220	Intro Human Resource Managemen	3
MGT 221	Diversity in the Workplace	3
MGT 322	Decision Making w/ Analytics	3
MGT 425	Managing HR: Resrch/Appl	3
Total Hours		18

¹ If students have taken one of the following courses: DSS 315, FMK 301, MKT 202, PSY 211 or SOC 312 they may substitute any HRPM major elective for MGT 322.

International Business Major

The International Business Major offers courses in international management, marketing, and finance, as well as a capstone course in global strategic planning. The design of the international business (IB) program at SJU is interdisciplinary in nature. Students enroll in a variety of courses exploring the international dimensions of business, as well as other courses in the College of Arts and Sciences that enhance knowledge about other countries and cultures. In addition, students are encouraged to study abroad or participate in a study tour to gain direct exposure to an international experience. This versatile major can be paired with minors in foreign languages, international relations, economics or any other disciplines that will provide a well-rounded experience.

Learning Goals and Outcomes

Goal 1: Communication in International Business: Students will demonstrate competency in written and verbal communications

Goal 2: Critical Thinking in International Business: Students will demonstrate evidence of critical thinking and problem solving associated

with the opportunities and challenges of international firms operating in multiple countries

Goal 3: Jesuit Tradition in International Business: Students will gain an understanding and critical appreciation of ethical issues in international business

Goal 4: Diversity/Global: Students will demonstrate knowledge and awareness of global and multicultural environments

Goal 5: Program Specific for International Business:

Outcome 5.1: Students will acquire a functional level understanding of the international dimensions of business

Outcome 5.2: Students will understand the international dimensions of strategy formulation and implementation

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	
Mission-Overlay		
IBU 210	Intro International Business	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
Core Courses		
Take four required international business core courses		
IBU 210	Intro International Business	3
IBU 310	Essentials of Global Business (Junior status)	3
MGT 221	Diversity in the Workplace	3
IBU 495	Global Strategic Planning (Senior status)	3
International Business Electives		9
Take any three (3) of the following courses		
ACC 307	Fin Acc Info Sys III	
ACC 430	International Accounting	
DSS 335	Found of Supply Chain Mgmt	
DSS 465	Supply Chain Analytics	
FIN 302	International Finance	
FMK 202	Overview of the Globl Food Ind	
FMK 314	International Food Marketing	
IBU 270	International Bus Spec Topics	
or IBU 470	Spec Topics in Internat Busine	
IBU 370	Intern'l Topics & Study Tour	
IBU 490	International Bus Internship	
IBU 493/494	Internatnl Business Research I	
MGT 212	Organizational Sustainability	
MGT 321	International Talent Mgt	
MGT 363	International Business Law	
MKT 315	Mkt in a Multicultural World	
MKT 331	International Marketing	
MKT 401	Marketing Strategy	
PMK 341	Pharm Channels & Pricing	
An approved international course in one of the SJU Summer abroad programs		
A pre-approved course with an international focus while studying abroad		
An advanced international language course		
ITA 301	Italian Conversation	
FRE 301	French Conversation	
GRM 330	German Business I	
SPA 301	Spanish Conversation	
JPN 202	Intermediate Japanese II	
CHN 202	Intermediate Chinese II	
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		24-25

Free Electives

Six to eight courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organzational Beh (or Theology)	3
or MGT 120	or Essentials of Management	
Non-Native Language or Mathematics		3-4
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
World History		3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110	Essent'ls of Organzational Beh (Or Theology)	3
or MGT 120	or Essentials of Management	
Mathematics or Non-Native Language		3-4
ECN 102	Introductory Economics Macro	3
or ECN 101	or Introductory Economics Micro	
INT 151		1
Hours		16-17
Sophomore		
Fall		
IBU 210	Intro International Business	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
Philosophy Level One		3
Hours		15
Spring		
MGT 221	Diversity in the Workplace	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
Major Elective		3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
IBU 310	Essentials of Global Business	3
Natural Science		4
Free Electives		9
Hours		16
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
IBU 495	Global Strategic Planning	3
Major Elective		3
Literature		3

Free Electives	3-6
Hours	12-15
Total Hours	120-125

International Business Minor Requirements

Code	Title	Hours
Required Courses		
MGT 110 or MGT 120	Essent'ls of Organizational Beh Essentials of Management	3
IBU 210	Intro International Business	3
IBU 310	Essentials of Global Business (junior status)	3
IBU 495	Global Strategic Planning (senior status)	3
Two International Business Electives		6
ACC 307	Fin Acc Info Sys III	
ACC 430	International Accounting	
DSS 335	Found of Supply Chain Mgmt	
DSS 465	Supply Chain Analytics	
FIN 302	International Finance	
FMK 202	Overview of the Globl Food Ind	
FMK 314	International Food Marketing	
IBU 370	Intern'l Topics & Study Tour	
MGT 212	Organizational Sustainability	
MGT 221	Diversity in the Workplace	
MGT 321	International Talent Mgt	
MGT 363	International Business Law	
MKT 331	International Marketing	
MKT 401	Marketing Strategy	
PMK 341	Pharm Channels & Pricing	
IBU 490	International Bus Internship	
POL 352	Global Political Economy	
ECN 322	International Macroeconomics	
Advanced non-native language		
ITA 301	Italian Conversation	
FRE 301	French Conversation	
GRM 330	German Business I	
SPA 301	Spanish Conversation	
JPN 202	Intermediate Japanese II	
CHN 202	Intermediate Chinese II	
An approved international course in one of the SJU Summer Abroad programs		
A pre-approved course with an international focus while studying abroad		
Total Hours		18

¹ Only a maximum of two may double-count towards other requirements such as primary major or other minors

Leadership Graduate Certificate

The Leadership Graduate Certificate equips students with essential knowledge about personal and strategic leadership in organizational life.

Whether one has direct reports or not, this certificate will help students be more effective as thoughtful leaders inside and outside of work.

Learning Goals and Outcomes

Goal 1: Students will gain an understanding of leadership theories and skills essential in organizational life.

Goal 2: Students will learn ethical leadership frameworks to increase their effectiveness in serving multiple stakeholders.

Requirements

Code	Title	Hours
MGT 550 or MGT 650	Leadership and Ethics ¹ Organizational Leadership	3
Three Leadership Electives:		9
MGT 565	Leading Change in Organ	
MGT 645	Mindful & Ignatian Leadership	
MGT 651	Leading for Career Success	
MGT 654	Leading Global & Virtual Teams	
MGT 656	Nonprofit Leadership	
MGT 657	Leading Projects	
MGT 668	Leading for Sustainability	
MGT 680	Coaching Leader	
MGT 686	Global Leadership	
MGT 671	Strategic Leader Ethics&Values	
Total Hours		12

¹ Students taking MGT 550 for the Leadership Graduate Certificate may still take MGT 650 as a Leadership elective.

Leadership, Ethics and Organizational Sustainability Major

The Leadership, Ethics, and Organizational Sustainability (LEO) major develops thoughtful, ethically-grounded, and broad-minded leaders who enable businesses to serve the common good. The major includes several components, including leadership, social responsibility, ethics, justice, stakeholder management, and systems thinking; these aspects all focus on helping students learn how business and organizations can be forces for good in society. The LEO major helps students learn leadership for the greater good, which involves an awareness of and striving for success as defined by the the triple bottom line of people, planet, and profit. This triple bottom line encompasses the need for developing shared value that generates sustainable profit, provides for human well-being, and consciously stewards natural resources.

Learning Goals and Outcomes

Goal 1: Communication - Students will develop the self-assessment, perspective-taking, and emotional intelligence skills essential to communicate and lead effectively with stakeholders

Goal 2: Critical Thinking and Inquiry – Students will understand and be able to apply core theories of business ethics (e.g., utilitarianism and rights theory)

Goal 3: Ethics, Social Justice, and Ignatian Values – Students will Develop self-knowledge and agency as a leader committed to ethically

engaging with stakeholders and championing economic, social, and climate justice (e.g., United Nations Sustainable Development Goals [SDGs])

Goal 4: Global/Diversity - Students will understand the Triple Bottom Line (i.e., People, Planet, and Profit) approach to sustainability and use it to inform decision-making

Goal 5: Leadership - Students will understand and be able to apply core theories and skills of leadership (e.g., servant leadership and emotional intelligence)

Goal 6: Discipline or Program Specific Competencies - Students will Identify the actors and interdependencies in the systemic stakeholder web and balance the interests of multiple stakeholders in the context of leading for sustainable development

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
3		

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	
Mission-Overlay		
MGT 210	Business Stakeholders & Ethics	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
Required Courses		
MGT 210	Business Stakeholders & Ethics ¹	3
MGT 211	Perspectives on Leadership	3
MGT 212	Organizational Sustainability	3
MGT 221	Diversity in the Workplace	3
MGT 415	Applied Ldrshp & Sustain Capst	3
Major Electives		
Select two of the following:		6
MGT 220	Intro Human Resource Managemen	
MGT 222	Influence,Negotiation&Conflict	
MGT 230	Intro:Entrepreneur/New Venture	
MGT 310	Breaking News in Bus. Ethics	
MGT 311	Leading Teams	
MGT 321	International Talent Mgt	
MGT 322	Decision Making w/ Analytics	
MGT 330	Social Enterprise & Soc Change	
MGT 365	Employment and Labor Law	
IBU 210	Intro International Business	
FIN 310	Sustainable Finance	
or DSS 321	Project Management	
or MKT 304	Principles of Selling	
or MKT 313	Ethics in Marketing	
or HAD 201	Intro to Healthcare Admin	
Calculus (will count for CCC: Mathematics)		3-4
MAT 120	Precalculus	
MAT 123	Differential Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		24-25

¹ Students who have taken PHL 320 should not take MGT 210; another major elective will be taken instead

Free Electives

Six to eight courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (or Theology) or Essentials of Management	3
ECN 101 or ECN 102	Introductory Economics Micro or Introductory Economics Macro	3
Non-Native Language or Mathematics		3-4
World History		3
Hours		16-17

Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110 or MGT 120	Essent'ls of Organizational Beh (Or Theology) or Essentials of Management	3
Mathematics or Non-Native Language		3-4
ECN 102 or ECN 101	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
MGT 210	Business Stakeholders & Ethics	3
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
Philosophy Level One		3
Hours		15
Spring		
MGT 211	Perspectives on Leadership	3
MGT 221	Diversity in the Workplace	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Hours		15
Junior		
Fall		
Major Elective		3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
MGT 212	Organizational Sustainability	3
Natural Science		4
Free Electives		9
Hours		16
Senior		
Fall		
Major Elective		3
BUS 495	Business Strategy	3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Spring		
MGT 415	Applied Ldrshp & Sustain Capst	3
Literature		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Leadership, Ethics and Organizational Sustainability Minor Requirements

Code	Title	Hours
MGT 110	Essent'ls of Organizational Beh ¹	3
or MGT 120	Essentials of Management	
or MGT 121	Organizations in Perspc Honors	

MGT 360 or MGT 361	Legal Environment of Business ¹ Introduction to Law Honors	3
MGT 210	Business Stakeholders & Ethics	3
MGT 211	Perspectives on Leadership	3
MGT 212	Organizational Sustainability	3
MGT 415	Applied Ldrshp & Sustain Capst	3
Total Hours		18

¹ Courses in the Haub School of Business core

² Students who have taken PHL 320 should not take MGT 210.

Note: Students are responsible for completing prerequisites

Organization Development and Leadership MS

The mission of the Master of Science in Organization Development and Leadership is to educate adult students to create more effective and healthy human systems in an inclusive world community. Students learn to foster sustainable change in individuals, groups and organizational systems by applying theories, principles and research in the fields of organization development, adult learning, organizational psychology, and organizational dynamics.

Learning Goals and Outcomes

Goal 1: Students will learn how to apply theory and their ability to be an effective leader, facilitator, and agent of change who maximizes the potential of individuals, groups, and organizations.

Outcome 1.1: Informed by Ignatian values, students will attain a broad understanding of the practical concepts for effective leadership within a context of effectuating ethically based decisions that lead to socially just outcomes.

Outcome 1.2: Students will be able to effectively engage in values-based decision-making that enables and improves both organizational effectiveness and individual well-being.

1.2.1: Students will understand the values and aims of the field of organization development.

1.2.2: Students will be able to describe the process of organization development and the responsibilities of organization development practitioners.

1.2.3: Students will engage in values-based decision-making that enables and improves both organizational effectiveness and individual well-being.

Outcome 1.3: Students will be able to apply functional knowledge of organization development.

1.3.1: Students will demonstrate and apply their understanding of group dynamics to the planning and facilitation of inclusive and effective group processes.

1.3.2: Students will be able to select organization development concepts and methods appropriate for planned organizational change.

Goal 2: Students will be able to analyze organizational effectiveness and design and implement methods to remove barriers to making organizations more just and effective organizations.

Outcome 2.1: Students will be able to identify, analyze, and address structural barriers in organizations to the achievement of diversity, equity, and inclusion.

Outcome 2.2: Students will become competent in the application of critical thinking skills as they utilize analytic tools to conceptualize, synthesize, and evaluate relevant data to improve organizational effectiveness.

Outcome 2.3: Students will communicate effectively in writing in organizational contexts.

Requirements

Code	Title	Hours
MGT 650	Organizational Leadership	3
MGT 665	Facilitating Groups & Teams	3
MGT 700	Organization Development	3
MGT 561	HR & People Research, Meas&Met	3
MGT 555	Equity in Organizations	3
MGT 781 or MGT 780 & MGT 785	Applied ODL Project (Capstone) ¹ Research Design & Evaluation and Advanced Seminar	3
Electives ²		12
Total Hours		30

¹ MGT 780 is the thesis track capstone; to complete the thesis, students must take MGT 785 as one of their four electives

² Students may choose to apply electives toward a certificate: Diversity, Equity, and Inclusion (p. 243); Leadership (p. 254); or Human Resources Management (p. 248). See the certificate pages for requirements.

Organizational Development and Change Graduate Certificate

Code	Title	Hours
MGT 550 or MGT 700	Leadership and Ethics ¹ Organization Development	3
Choose 3 courses:		9
MGT 565	Leading Change in Organ	
MGT 602	Organizational Culture	
MGT 605	Consulting Skills	
MGT 615	Learning Design	
MGT 620	Psychological Assessments	
MGT 625	Executive Coaching	
MGT 635	Positive Psychology	
MGT 647	Appreciative Inquiry	
MGT 675	Implementing Change	
MGT 705	Facilitation Skills	
MGT 710	Intervention Skills	
Total Hours		12

¹ MBA students who have taken MGT 550 should also take MGT 700, which will be applied toward the Organization Development & Change Graduate Certificate.

Marketing

Today’s marketing powerhouses share one key advantage - they create superior customer values resulting in strong, lasting relationship. The Marketing Department is committed to providing students with a rigorous, comprehensive, and dynamic education in the theory and practice of marketing. We are dedicated to provide students with the knowledge, skills, and experience necessary to excel in their careers and make meaningful contributions to the greater good. With concentrations in General Marketing, Sports, and Entertainment Marketing, and Sales Management, students can hone their skills in specific disciplines while making vital industry connections.

SJU graduates leave Hawk Hill with a well-rounded knowledge base of ethics, strategy, global commerce, technology, analytics and more, making them multitalented and desired in their chosen fields. A Marketing degree from Saint Joseph’s University opens the door to successful careers in advertising, communications, sales, consumer products, retail, sports, entertainment, fashion, and health care to name a few. Many graduates return to Hawk Hill to recruit current students to carry on the tradition of SJU student achievements.

Want to get involved? The award-winning student chapter of the American Marketing Association is a great way to start. The AMA hosts many Marketing-related events on campus, including networking panels, industry guest speakers and service projects. Or try the campus radio station—Radio 1851—or its record label—1851 Records (founded by professor and former radio executive Dr. David Allan)—to get experience in Entertainment Marketing. The Sports Marketing Club puts students in touch with sports executives from all aspects of the business and also hosts many networking events and field trips. The Sales Club provides an effective training in sales management and offers the opportunities for students to hone their sales skills.

SJU Marketing students interact with a diverse faculty comprised of world-renowned scholars, industry experts and corporate executives, all of whom are dedicated to developing our students both in and out of the classroom. Our strong industry ties offer ample “real world” experience via guest speakers, field trips, case studies and internships.

Faculty

The faculty in the Department of Marketing are dedicated to bringing their decades of marketing knowledge to the classroom, offering a hands-on learning style that helps students learn from real-world experiences. Faculty have previously worked as marketers and consultants in advertising, consumer market research, marketing analytics, management consulting, music, entertainment, sports marketing and more.

Department of Marketing Faculty & Staff (<https://www.sju.edu/departments/marketing/faculty-staff/>)

Programs Undergraduate Majors

- Entertainment Marketing (p. 261)
- Marketing (p. 264)
- Sports Marketing (p. 268)

Undergraduate Minors

- Advertising and Promotions (p. 258)
- Entertainment Marketing (p. 263)
- Marketing (p. 266)
- Sports Marketing (p. 270)

Undergraduate Certificate

- Sales (<https://www.sju.edu/degree-programs/sales-certificate/>)

Graduate

- Marketing (p. 266)

Graduate Certificate

- Marketing (p. 263)

Advertising And Promotions Minor

The Advertising and Promotions minor is directed at students who have an interest in pursuing employment in the advertising industry. Haub School of Business students are eligible for this program with some limitations. Double minors or exceptions to this policy require the approval of the Marketing Department Chair.

Requirements Courses for Haub School of Business Students

Marketing/Entertainment/Sports Marketing majors who wish to complete the Advertising and Promotions minor cannot use Advertising and Promotions courses as their upper-level major electives. You must choose major electives outside of the courses fulfilling the Ad/PR minor requirements.

Code	Title	Hours
Courses for HSB Students:		
MKT 301	Integrated Mktg Communications	3
or PMK 351	Pharm Promotions Management	
or FMK 303	Food Marketing Communication	
MKT 321	Advertising	3
MKT 324	Public Relations and Publicity	3
Select two of the following:		6
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	
MKT 325	Fundamentals of Graphic Design	
MKT 327	Global Mktg Communications	

MKT 341	Music Marketing	
MKT 343	Entertainment Marketing	
MKT 350	Event Marketing	
MKT 490	Internship in Marketing I	
MKT 497	Sports Marketing Internship	
Total Hours		15

Courses for College of Arts & Science Students

Any Art & Science majors or minors who wish to complete the Advertising and Promotions minor cannot use Advertising and Promotions courses as their upper-level electives. You must choose major/minor electives outside of the courses fulfilling the Ad/PR minor requirements.

Code	Title	Hours
Courses for A&S Students		
MKT 201	Principles of Marketing	3
MKT 301	Integrated Mktg Communications	3
MKT 321	Advertising	3
MKT 324	Public Relations and Publicity	3
Select two of the following:		6
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	
MKT 325	Fundamentals of Graphic Design	
MKT 327	Global Mktg Communications	
MKT 341	Music Marketing	
MKT 343	Entertainment Marketing	
MKT 350	Event Marketing	
MKT 490	Internship in Marketing I	
Total Hours		18

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
-

Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3

PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5

Total Hours **140**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3

PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	or IPPE 4: Institutional Pharmacy	
PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23

Summer		
Haub course/Professional Elective		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Entertainment Marketing Major

The Saint Joseph's University Marketing Department offers a major for the student who wants to work behind-the-scenes in show business. With a degree in Entertainment Marketing, you can help to develop a blockbuster campaign to promote a studio's latest film, a concert event or theater production.

The Entertainment Marketing Major teaches students how traditional marketing practices are applied and often rewritten in the world of entertainment through specialized courses and interaction with industry entertainers and entertainment executives.

Learning Goals and Outcomes

Goal 1: Knowledge of Functional Marketing Skills

Outcome 1.1: Students will be able to develop and evaluate marketing plans intended to satisfy objectives for the entertainment industry.

Outcome 1.2: Students will gather, analyze, and assess customer and industry data.

Goal 2: Problem Solving and Critical Thinking Skills

Outcome 2.1: Students will engage in critical analyses and discussions of real problems in the entertainment industry.

Goal 3: Communication Skills

Outcome 3.1: Students will demonstrate clear and persuasive oral and written communication skills.

Goal 4: Knowledge of the Jesuit tradition of social justice and lifelong learning

Outcome 4.1: Students will understand the role of Ignatian values in entertainment marketing.

Goal 5: Diversity

Outcome 5.1: Students will engage with diversity, equity & inclusion issues in the entertainment industry.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organzational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

Code	Title	Hours
MKT 202	Marketing Research	3
MKT 302	Consumer & Buyer Behavior	3
MKT 344	Business of Music and Entertai	3
MKT 342	Music and Entertainment Law	3
MKT 343	Entertainment Marketing	3
MAT 120	Precalculus (or higher, except for MAT 128. Will count for CCC: Mathematics)	3
Select one (1) Entertainment Marketing elective:		3
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	

MKT 321	Advertising
MKT 324	Public Relations and Publicity
MKT 325	Fundamentals of Graphic Design
MKT 341	Music Marketing
MKT 350	Event Marketing
MKT 351	Business of Sports
MKT 353	Sports Marketing
MKT 354	The Business of Baseball
MKT 355	Sports, Selling, & Sales
MKT 363	Sports Analytics
MKT 364	Sports Marketing Communication
MKT 365	eSports
MKT 370	Spec Topics:Sports Marketing
MKT 470	Special Topics in Marketing
MKT 490	Internship in Marketing I
MKT 497	Sports Marketing Internship
Total Hours	21

Free Electives

Six courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organzational Beh (or Theology)	3
or MGT 120	or Essentials of Management	
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	
ENG 101	Craft of Language (or World History)	3
Non-Native Language or Mathematics		3-4
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language	3
MGT 110	Essent'ls of Organzational Beh (or Theology)	3
or MGT 120	or Essentials of Management	
Mathematics or Non-Native Language		3-4
ECN 102	Introductory Economics Macro	3
or ECN 101	or Introductory Economics Micro	
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3
Philosophy Level One		3
Free Elective		3
Hours		15
Spring		
MKT 302	Consumer & Buyer Behavior	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3

Philosophy Level Two	3
Free Elective	3
Hours	15
Junior	
Fall	
MKT 344 Business of Music and Entertai	3
MGT 360 Legal Environment of Business	3
Religious Studies	3
Diversity	3
Free Elective	3
Hours	15
Spring	
MKT 202 Marketing Research	3
MKT 342 Music and Entertainment Law	3
Natural Science	4
Free Electives	6
Hours	16
Senior	
Fall	
MKT 343 Entertainment Marketing	3
Fine & Performing Arts, Design & Creativity	3
Major Electives	3
Free Electives	6
Hours	15
Spring	
BUS 495 Business Strategy	3
Literature	3
Free Electives	6-9
Hours	12-15
Total Hours	120-125

Entertainment Marketing Minor

The Entertainment Marketing minor is directed at students interested in pursuing employment in the entertainment industry, encompassing various media and activities designed to entertain and engage audiences including events, music concerts, performing arts, etc. Haub School of Business students are eligible for this program with some limitations. Double minors or exceptions to this policy require approval of the Marketing Department Chair.

Requirements

Requirements for Haub School of Business Students

Marketing or Sports Marketing majors who wish to complete the Entertainment Marketing minor cannot use Entertainment Marketing courses as their upper-level major electives. You must choose major electives outside of the courses fulfilling Entertainment Marketing minor requirements.

Code	Title	Hours
MKT 344	Business of Music and Entertai	3
MKT 342	Music and Entertainment Law	3
MKT 343	Entertainment Marketing	3
Select Two of the Following:		6
MKT 202	Marketing Research	
MKT 301	Integrated Mktg Communications	
MKT 302	Consumer & Buyer Behavior	

Select One (1) Entertainment Marketing Elective:		3
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	
MKT 321	Advertising	
MKT 324	Public Relations and Publicity	
MKT 341	Music Marketing	
MKT 350	Event Marketing	
MKT 351	Business of Sports	
MKT 352	Sports Law	
MKT 353	Sports Marketing	
MKT 354	The Business of Baseball	
MKT 363	Sports Analytics	
MKT 355	Sports, Selling, & Sales	
MKT 365	eSports	
MKT 370	Spec Topics:Sports Marketing	
MKT 490	Internship in Marketing I	
Total Hours		18

Requirements for College of Arts & Sciences Students

Code	Title	Hours
MKT 201	Principles of Marketing	3
MKT 202	Marketing Research	3
MKT 302	Consumer & Buyer Behavior	3
MKT 344	Business of Music and Entertai	3
MKT 342	Music and Entertainment Law	3
MKT 343	Entertainment Marketing	3
Total Hours		18

Marketing Graduate Certificate

The Marketing Graduate Certificate can be completed as a standalone certificate or as part of the Marketing MS or stackable MBA. Whether you enroll in the Marketing Graduate Certificate on its own or stack it as part of the MBA or MS, you will receive a certificate credential that can be added to your resume.

Students who choose to stack their MBA with a Marketing Graduate Certificate will learn how to develop results-driven strategies using the latest marketing analytics and relationship-building techniques. The program is designed by experts and connected to a deep network of alumni leaders in the marketing industry to help students take their career to the next level.

Requirements

Code	Title	Hours
MKT 550	Marketing Management	3
Three Marking Electives:		9
MKT 602	Promotional Strategy	
MKT 605	Research in Marketing	

MKT 604	International Marketing
MKT 606	Consumer Behavior
MKT 608	Marketing and Social Media
MKT 609	Marketing Analytics
MKT 610	Digital Mkt & Web Analytics
MKT 612	Global Cultures and Consumers
MKT 621	Qualitative Marketing Research
MKT 622	Advertising & Consumer Insight
MKT 623	Predictive Analytics for Mkt
MKT 770	Marketing Special Topics

Total Hours 12

Marketing Major

The marketing major endows students with a solid foundation in the basic principles of marketing which can be applied to various industries, product and service categories, and non-profits.

With courses in consumer behavior and market research, students gain insight into understanding and satisfying customer wants and needs. Marketing communications courses teach students how to successfully engage the target audience using traditional and digital media. Upper level marketing courses challenge majors to address real-world scenarios. Along the way, students get ample practice designing actual marketing plans, promotional campaigns and research projects that make them desirable candidates for internships and full-time employment.

Learning Goals and Outcomes

Goal 1: Knowledge of Functional Business in Marketing

Outcome 1.1: Students will be able to develop and evaluate marketing plans intended to satisfy the objectives for-profit and not-for profit organizations.

Goal 2: Communication Skills

Outcome 2.1: Students will demonstrate clear and persuasive written and oral communication skills.

Goal 3: Problem Solving and Critical Thinking Skills

Outcome 3.1: Students will engage in critical analysis and discussions of real marketing strategies.

Goal 4: Knowledge of the Jesuit tradition of social justice and lifelong learning

Outcome 4.1: Students will understand the role of Ignatian values in marketing.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3

Philosophy Requirements

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.

Philosophy Level One 3

Philosophy Level Two 3

Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology 3

Religious Studies 3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity 3

INT 151 Inequality in American Society 1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics 3-4

Natural Science 4

Social Science Requirement 3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement 3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement 3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MGT 221	Diversity in the Workplace	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements:

Code	Title	Hours
Required of all Marketing majors to be taken in the following sequence:		
MKT 302	Consumer & Buyer Behavior	3
MKT 202	Marketing Research ¹	3
MKT 301	Integrated Mktg Communications	3
MKT 401	Marketing Strategy	3
MAT 120	Precalculus (and above, except MAT 118, MAT 128 or MAT 148. Will count for CCC: Mathematics)	3
Select two MKT electives from 300-400 level courses ²		6
Total Hours		21

¹ Students are strongly advised to take DSS 210 and DSS 220 prior to taking MKT 202.

² It is strongly suggested that one of these courses is MKT 490.

Specialized Marketing Focus

Students who wish to enhance their Marketing training in a specific area may use their upper-level MKT electives to take additional courses in these disciplines.

Code	Title	Hours
Advertising and Promotions Courses		
MKT 304	Principles of Selling	3
MKT 312	Selling and Sales Management	3
MKT 314	Social Media Marketing	3

MKT 316	Digital Marketing	3
MKT 317	Fashion Marketing	3
MKT 321	Advertising	3
MKT 324	Public Relations and Publicity	3
MKT 325	Fundamentals of Graphic Design	3
MKT 327	Global Mktg Communications	3
MKT 490	Internship in Marketing I	3

Entertainment Marketing Courses		
MKT 308	Marketing Analytics	3
MKT 341	Music Marketing	3
MKT 342	Music and Entertainment Law	3
MKT 343	Entertainment Marketing	3
MKT 344	Business of Music and Entertai	3
MKT 350	Event Marketing	3

Sports Marketing Courses		
MKT 351	Business of Sports	3
MKT 352	Sports Law	3
MKT 353	Sports Marketing	3
MKT 355	Sports, Selling, & Sales	3
MKT 363	Sports Analytics	3
MKT 365	eSports	3
MKT 370	Spec Topics:Sports Marketing	3
MKT 497	Sports Marketing Internship	3

Free Electives

Six courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organizational Beh (or Theology)	3
or MGT 120	or Essentials of Management	
ECN 101	Introductory Economics Micro	3
or ECN 101	or Introductory Economics Micro	
Non-Native Language or Mathematics		3-4
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language (or World History)	3
MGT 110	Essent'ls of Organizational Beh (or Theology)	3
or MGT 120	or Essentials of Management	
Mathematics or Non-Native Language		3-4
ECN 102	Introductory Economics Macro	3
or ECN 101	or Introductory Economics Micro	
INT 151	Inequality in American Society	1
Hours		16-17
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
MKT 201	Principles of Marketing	3

Philosophy Level One		3
Free Elective		3
Hours		15
Spring		
MKT 302	Consumer & Buyer Behavior	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Diversity		3
Hours		15
Junior		
Fall		
MKT 202	Marketing Research	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Elective or Overlay		3
Free Elective		3
Hours		15
Spring		
MKT 301	Integrated Mktg Communications	3
Literature		3
Natural Science		4
Free Electives		6
Hours		16
Senior		
Fall		
MKT 401	Marketing Strategy	3
Fine & Performing Arts, Design & Creativity		3
Major Elective		3
Free Electives		6
Hours		15
Spring		
BUS 495	Business Strategy	3
Major Elective		3
Free Electives		6-9
Hours		12-15
Total Hours		120-125

Marketing Minor

The marketing minor allows Haub School of Business students in other majors and College of Arts and Sciences students to expand their marketing skills. Double minors require approval of the Marketing Department Chair. Note that students should follow the suggested course sequence as well as adhere to individual course prerequisites as outlined in the catalog course descriptions.

Requirements

Code	Title	Hours
MKT 201	Principles of Marketing	3
MKT 302	Consumer & Buyer Behavior	3
MKT 202	Marketing Research ¹	3
MKT 301	Integrated Mktg Communications	3
MKT 401	Marketing Strategy	3
One MKT elective course at the 300 level or higher		3
MKT 304	Principles of Selling	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	

MKT 317	Fashion Marketing	
MKT 321	Advertising	
MKT 324	Public Relations and Publicity	
MKT 325	Fundamentals of Graphic Design	
MKT 327	Global Mktg Communications	
MKT 331	International Marketing	
MKT 341	Music Marketing	
MKT 343	Entertainment Marketing	
MKT 350	Event Marketing	
MKT 353	Sports Marketing	
MKT 490	Internship in Marketing I	
Total Hours		18

¹ Students are strongly advised to take DSS 210 and DSS 220 prior to taking MKT 202.

Marketing MS

The Master of Science in Marketing program at Saint Joseph's University provides students with the tools, theory, and practical knowledge necessary for career advancement. The core curriculum is designed to develop essential marketing competencies in consumer behavior, analytics, research and strategy, and our elective coursework allows you to customize your degree.

Learning Goals and Outcomes

- Goal 1: Functional: Students will know core concepts about marketing strategy.
- Goal 2: Problem Solving/Critical Thinking: Students will be able to analyze a variety of global marketing scenarios in an integrative way and make constructive and actionable recommendations for problem solving.
- Goal 3: Interpersonal/Communication Skills: Students will demonstrate competency in written and verbal communication aimed at facilitating, and reporting the results of, collaborative problem solving and decision-making processes.
- Goal 4: Ignatian Values: Students will be able to generate scholarship that embodies free, open inquiry, and provokes imaginative thinking and reflection on values. An appreciation for and ability to apply the Ignatian values of: a commitment to rigorous education and lifelong learning; an insistence upon ethical decision making; a desire for social justice; and a care and concern for others.

Requirements

All course prerequisites must be satisfied prior to enrolling in a given course; prerequisites are indicated in the section on Course Descriptions. Two concentrations are available: General Marketing and Data Analytics.

The Master of Science in Marketing program provides students with the tools, theory, and practical knowledge necessary for career advancement. The core curriculum is designed to develop essential marketing competencies, while a focus on analytics provides the skills need to optimize marketing campaigns and strategy.

Statistics Proficiency

All students in the Marketing, MS program who would like to take any DSS courses must demonstrate proficiency in statistics prior to the start of DSS 610 through an online learning module (ALEKS). Students with strong statistical background may test out. Students must complete 100% of the module before the start of DSS 610.

General Marketing Concentration Requirements

Code	Title	Hours
Required Courses:		
MKT 550	Marketing Management	3
MKT 604	International Marketing	3
MKT 605	Research in Marketing	3
MKT 606	Consumer Behavior	3
MKT 609	Marketing Analytics	3
MKT 790	Marketing Strategy	3
Select 5 Electives:		15
MKT 602	Promotional Strategy	
MKT 608	Marketing and Social Media	
MKT 610	Digital Mkt & Web Analytics	
MKT 612	Global Cultures and Consumers	
MKT 621	Qualitative Marketing Research	
MKT 622	Advertising & Consumer Insight	
MKT 623	Predictive Analytics for Mkt	
MKT 770	Marketing Special Topics	
DSS 610	Business Analytics	
DSS 670	Data Visual & Perf Analyt	
DSS 730	Digital Analytics	
Total Hours		33

Data Analytics Concentration Requirements

Code	Title	Hours
Required Courses:		
MKT 550	Marketing Management	3
MKT 605	Research in Marketing	3
MKT 606	Consumer Behavior	3
DSS 610	Business Analytics	3
DSS 660	Introduction to Data Mining (DSS 610 - pre-req)	3
DSS 670	Data Visual & Perf Analyt	3
Select 2 Marketing Electives:		6
MKT 602	Promotional Strategy	
MKT 604	International Marketing	
MKT 608	Marketing and Social Media	
MKT 609	Marketing Analytics	
MKT 610	Digital Mkt & Web Analytics	
MKT 612	Global Cultures and Consumers	
MKT 621	Qualitative Marketing Research	
MKT 622	Advertising & Consumer Insight	
MKT 623	Predictive Analytics for Mkt	
MKT 770	Marketing Special Topics	

Select 2 DSS Electives:		6
DSS 615	Python Programming	
DSS 650	Process Simulation & Analysis (DSS 610 - pre-req)	
DSS 665	R Statistical Language (DSS 660 - pre-req)	
DSS 680	Predictive Analytics (DSS 660 - pre-req)	
DSS 740	Analytics w/ Machine Learning (DSS 615 & DSS 660 - pre-reqs)	
Total Hours		30

Sales Certificate

The Undergraduate Sales Certificate will provide students with a strong foundation in sales theory and practice, as well as practical experience in sales techniques and strategies. Students are strongly recommended to join the SJU Sales Club (<https://www.sju.edu/departments/marketing/student-organizations/>) and participate in local/regional/national sales competitions. By completing the certificate, students should be well-prepared to pursue careers in sales and related fields and to make valuable contributions to the organizations.

Learning Goals and Outcomes

The SJU sales certificate program aims to equip students with the knowledge, skills, and abilities necessary to become successful sales professionals in a variety of industries. Upon completion of the program, students should be able to:

1. Understand the basic principles of sales, including the sales process, sales techniques, sales management, and sales strategies.
2. Develop effective communication skills, including active listening, verbal and written communication, and nonverbal communication.
3. Analyze customer needs and preferences, and tailor sales strategies to meet those needs.
4. Utilize technology and data to enhance sales processes and improve sales outcomes.
5. Build and maintain strong relationships with customers and clients, and manage customer expectations.
6. Work collaboratively with other members of a sales team, including marketing, customer service, and product development professionals.
7. Apply critical thinking and problem-solving skills to identify opportunities for sales growth and overcome obstacles to success.
8. Understand the importance of personal and professional development, and continue to build skills and knowledge throughout their careers.

Requirements

Code	Title	Hours
The sales certificate program requires the completion of nine credits with a cumulative GPA of 3.0 or higher in Saint Joseph's University courses. To receive the certificate, you will demonstrate what you learned to local and national businesses through working with and competing in sales competitions.		
1st Level Required Course		3
MKT 304	Principles of Selling	

2nd Level Required Course (Choose 1 of the following):		3
MKT 312	Selling and Sales Management	
FMK 316	Selling Skills & Decisn Making	
PMK 331	Pharm Sales Management	
Elective (Choose 1 of the following):		3
MGT 222	Influence, Negotiation & Conflict	
FMK 317	Sales Mgt for CPG & Foodserv	
MKT 355	Sports, Selling, & Sales	
MKT 490	Internship in Marketing I	
MGT 490	Internship I	
PMK 491	Pharmaceutical Internship	
MKT 493	Indep Study in Marketing	
MKT 497	Sports Marketing Internship	
Total Hours		9

Sports Marketing Major

There are few better places to study Sports Marketing than a sports city like Philadelphia, which boasts four major sports franchises, the City Six College basketball rivalry, as well as a number of smaller private teams like the Philadelphia Union.

The Marketing Department at Saint Joseph's University provides a rigorous education in the theory and practice of marketing while also providing opportunities to investigate more thoroughly the sports-related aspect of the field so that students can succeed and thrive in today's ever-changing and competitive sports.

Sports Marketing courses at SJU are taught by industry experts, with guest lectures by current industry professionals. In addition to comprehensive courses in Business of Sports, Sports Marketing and Sports Analytics, each Sports Marketing major is encouraged to have an internship, as internships are essential to breaking into this highly competitive industry. Internships help students to gain real-world experience and contacts before they graduate so they are best prepared to anticipate and meet the needs of this exciting and dynamic industry.

Learning Goals and Outcomes

Goal 1: Functional Sports Marketing Skills:

Outcome 1.1: Students will gain knowledge of specialized terminology, the structure and operations of the professional and amateur sports industry and the organizations that comprise the industry, from both an historical and contemporary perspective.

Outcome 1.2: Students will gain a keen understanding of the difference between *marketing of sports* (events and properties) and *marketing through sports* (building brands via alignment with a sports property) by conducting research which will enhance their knowledge of the critical role that fan affinity plays in the marketing of and through sports.

Goal 2: Critical Thinking and Problem Solving

Outcome 2.1: Students will be able to identify and critically analyze the application of select intellectual property laws, vital to monetizing sports business activities and protecting the significant revenue stream in the sports industry.

Goal 3: Ignatian Values

Outcome 3.1: Students will gain knowledge of and develop proficiencies for utilizing compelling and ethical techniques for selling sports as a product.

Goal 4: Communication Skills

Outcome 4.1: Students will demonstrate clear and persuasive oral and written communication skills.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		

Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
MKT 351	Business of Sports	

Business Foundation

Code	Title	Hours
ACC 101	Concepts of Financial Acct	3
ACC 102	Managerial Accounting	3
DSS 100	Excel Competency	1
DSS 200	AI in Business	3
DSS 210	Business Statistics	3
DSS 220	Business Analytics	3
ECN 102	Introductory Economics Macro	3
FIN 200	Intro to Finance ¹	3
or FIN 225	Fund of Quantitative Finance	
MGT 110	Essent'ls of Organizational Beh	3
or MGT 120	Essentials of Management	
MGT 360	Legal Environment of Business	3
MKT 201	Principles of Marketing	3
BUS 495	Business Strategy	3
Total Hours		34

¹ ECN 101 is a prerequisite for FIN 200 and may count towards the Cornerstone Core Curriculum Social Science requirement.

Major Requirements

All Sports Marketing majors should take Business of Sports (MKT 351) as their first Sports Marketing course. The second course you should take is Sports Marketing (MKT 353) which is a pre-req/co-req for other SPMKT courses. The major requires six courses as follows:

Code	Title	Hours
MKT 202	Marketing Research	3
MKT 351	Business of Sports	3
MKT 352	Sports Law	3
MKT 353	Sports Marketing	3
MKT 355	Sports, Selling, & Sales	3

MAT 120	Precalculus (or above, except MAT 118, MAT 128 or MAT 148. Will count for CCC: Mathematics)	3
Select (1) upper-level Sports Marketing elective: Students are strongly recommended to take an internship course (MKT 490 or MKT 497).		3
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	
MKT 321	Advertising	
MKT 324	Public Relations and Publicity	
MKT 325	Fundamentals of Graphic Design	
MKT 327	Global Mktg Communications	
MKT 331	International Marketing	
MKT 350	Event Marketing	
MKT 354	The Business of Baseball	
MKT 362	Digital Media in Sports	
MKT 363	Sports Analytics	
MKT 364	Sports Marketing Communication	
MKT 365	eSports	
MKT 370	Spec Topics:Sports Marketing	
MKT 490	Internship in Marketing I	
MKT 497	Sports Marketing Internship	
Total Hours		21

Free Electives

Six courses. Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
DSS 100	Excel Competency	1
ACC 101	Concepts of Financial Acct	3
MGT 110	Essent'ls of Organizational Beh (or Theology) or Essentials of Management	3
Non-Native Language or Mathematics		3-4
ECN 101	Introductory Economics Micro or Introductory Economics Macro	3
ENG 101	Craft of Language (or World History)	3
Hours		16-17
Spring		
ACC 102	Managerial Accounting	3
ENG 101	Craft of Language (or World History)	3
Mathematics or Non-Native Language		3-4
ECN 102	Introductory Economics Macro or Introductory Economics Micro	3
INT 151	Inequality in American Society	1
Hours		13-14
Sophomore		
Fall		
DSS 200	AI in Business	3
DSS 210	Business Statistics	3

MKT 201	Principles of Marketing	3
Philosophy Level One		3
Free Elective		3
Hours		15
Spring		
MKT 351	Business of Sports	3
DSS 220	Business Analytics	3
FIN 200	Intro to Finance	3
Philosophy Level Two		3
Free Elective		3
Hours		15
Junior		
Fall		
MKT 353	Sports Marketing	3
MGT 360	Legal Environment of Business	3
Religious Studies		3
Free Electives		6
Hours		15
Spring		
MKT 352	Sports Law	3
MKT 202	Marketing Research	3
Natural Science		4
Free Electives		6
Hours		16
Senior		
Fall		
MKT 355	Sports, Selling, & Sales	3
Fine & Performing Arts, Design & Creativity		3
Major Elective		3
Free Electives		6
Hours		15
Spring		
BUS 495	Business Strategy	3
Literature		3
Free Electives		6-9
Hours		12-15
Total Hours		117-122

Sports Marketing Minor

The Sports Marketing minor is directed at students who have an interest in pursuing employment in the sports industry. Haub School of Business students are eligible for this program with some limitations. Double minors or exceptions to this policy require the approval of the Marketing Department Chair.

Requirements
Requirements for Haub School of Business Majors

Marketing or Entertainment Marketing majors who wish to complete the Sports Marketing minor cannot use Sports Marketing courses as their upper-level electives. You must choose major electives outside of the courses completing the Sports Marketing minor requirements.

Code	Title	Hours
MKT 202	Marketing Research	3
MKT 351	Business of Sports	3
MKT 352	Sports Law	3
MKT 353	Sports Marketing	3

MKT 355	Sports, Selling, & Sales	3
Select (1) Sports Marketing Elective: Students are strongly recommended to take an internship course (MKT 490 or MKT 497).		3
MKT 304	Principles of Selling	
MKT 308	Marketing Analytics	
MKT 312	Selling and Sales Management	
MKT 314	Social Media Marketing	
MKT 316	Digital Marketing	
MKT 317	Fashion Marketing	
MKT 321	Advertising	
MKT 324	Public Relations and Publicity	
MKT 325	Fundamentals of Graphic Design	
MKT 343	Entertainment Marketing	
MKT 350	Event Marketing	
MKT 354	The Business of Baseball	
MKT 362	Digital Media in Sports	
MKT 363	Sports Analytics	
MKT 364	Sports Marketing Communication	
MKT 365	eSports	
MKT 370	Spec Topics:Sports Marketing	
MKT 490	Internship in Marketing I	
MKT 497	Sports Marketing Internship	
Students are also advised to take DSS 210 and DSS 220 prior to taking MKT 202.		
Total Hours		18

Requirements for College of Arts & Sciences Majors

Code	Title	Hours
MKT 201	Principles of Marketing	3
MKT 202	Marketing Research	3
MKT 351	Business of Sports	3
MKT 352	Sports Law	3
MKT 353	Sports Marketing	3
MKT 355	Sports, Selling, & Sales	3
Total Hours		18

SCHOOL OF EDUCATION AND HUMAN DEVELOPMENT

School of Education & Human Development

Dean: Joshua Power, EdD

Associate Dean: Aimee LaPointe Terosky, EdD

Assistant Dean: Carole Hoy, EdD

Faculty Listing: School of Education and Human Development (<https://directory.sju.edu/school-education-human-development/faculty/>)

Mission

Grounded in the Jesuit commitment of being “men and women with and for others” and the Ignatian tradition of the importance of a rigorous liberal arts core, the School of Education and Human Development (SEHD) aspires to prepare current and future students as exemplary education, leadership development, and counseling professionals who understand the implications of their field of studies and practices and who see themselves as transformative leaders in these fields by:

- Promoting long-lasting and ethically rooted local, national and international partnerships with education, health, and organizations committed to improving the social conditions of the communities and people they serve.
- Providing educational experiences and programs for our undergraduate, graduate, and doctoral candidates that promote a sense of professionalism rooted in a deep commitment to collaboration, interdisciplinarity, social advocacy, critical thinking and community engagement, both within and beyond Saint Joseph's University.
- Fostering a professional identity that draws in the liberal arts tradition of rigor, discernment and the education of the whole person to help candidates see themselves as reflective practitioners who engage in research and critical inquiry to improve their practices and the communities in which they work.
- Engaging in critical issues that affect our surrounding communities, whether locally, nationally or internationally, and advocating for policy changes that promote social equality.

Education

Educator Preparation Program Mission

Saint Joseph's University Education Departments are comprised of Teacher Education, Special Education, and Educational Leadership and Counseling, and are dedicated to preparing exemplary teachers, educational leaders, and educational researchers. The Departments seek to promote a vibrant intellectual community, recognized for preparing reflective teacher educators and leaders committed to social justice and democratic principles; acknowledged for quality undergraduate and graduate teaching, research, and scholarly contributions that enhance educational theory and practice in teacher education, educational leadership, special education, and related disciplines; known for leadership and other educational opportunities; and established as contributing outstanding professional service and outreach.

The Educator Preparation Program at Saint Joseph's University is approved by the Pennsylvania Department of Education to offer certification or endorsement in 20 areas across undergraduate and graduate levels. The programs are coordinated by and administered through the Dean of the School of Education and Human Development, the Educator Preparation Committee, and the Departments of Teacher Education, Special Education, and Educational Leadership and Counseling. The chair of each department coordinates the undergraduate program and each graduate program has a designated faculty program director.

Experiences and Certification

Clinical Experiences

An important component of educator preparation is developmental and sequential field experience, beginning with observation and culminating in student teaching. During clinical experiences candidates develop a sense of professional identity as educators, develop an understanding of the professional culture of schools, adopt professional practices, and conduct themselves in accordance with the policies and procedures of the school and district in which their placements occur. The Director of Clinical Experiences works with academic departments to place students in schools where SEHD has clinical partnerships for field experiences, pre-student teaching, and student teaching. Students are required to complete clearances before any placements can occur.

Clearances

The Commonwealth of Pennsylvania requires all pre-service teachers participating in clinical experiences (i.e., pre-student teaching, student teaching, practicum & internship, field experiences) to obtain clearances prior to beginning their placements in a PK12 school setting. Clearances must be obtained prior to placement and remain valid through the end of the placement. Clearances are valid for three years from the start of the first semester. Students must obtain updated clearances prior to student teaching. Students are responsible for updating their clearances as they progress through the academic program.

- All students must obtain PA clearances.
- Graduate students who are employed full-time with a school district (not on an emergency certificate), can provide a letter on school letterhead signed by either Human Resources, the Principal, or the Superintendent verifying that their clearances are submitted and in good standing with the school/district.
- Students should maintain a copy of clearances documentation for their records.

Required clearances:

- FBI Criminal History Report
- PA State Criminal History Record (Act 34)
- PA Child Abuse History Clearance (Act 151)
- Proof of Tuberculin Skin Test

Required child abuse training to be completed during clearances process:

- Protecting Children: Identifying and Reporting Sexual Misconduct (valid for five calendar years)

Pennsylvania State Criminal History Record (Act 34)

To submit an online request for a Pennsylvania State Criminal History Record (Act 34) (<https://epatch.pa.gov/home/>), visit, <https://>

epatch.state.pa.us. You will be able to log-in again within a few days and access your clearance. If you pick 'volunteer' as reason for applying for a clearance, the first clearance should be free of charge. There is a charge for future additional clearances.

Pennsylvania Child Abuse History Clearance (Act 151)

To complete the Pennsylvania Child Abuse History Clearance (Act 151) (<https://www.compass.state.pa.us/cwis/public/home/>) form, visit <https://www.compass.state.pa.us/cwis/public/home>. You will be able to log-in again within a few days and access your clearance. If you pick 'volunteer' as reason for applying for a clearance, the first clearance should be free of charge. You will have to pay for future additional clearances.

FBI Criminal History Report

To register online for the Federal FBI Criminal History Report (<https://uenroll.identogo.com/>), visit <https://uenroll.identogo.com/>. You must use the Service Code 1KG6RT to apply for the clearance. Applicants must register prior to going to the fingerprinting site location and schedule a fingerprinting session at the selected location. Locations of fingerprinting sites can also be found by clicking the link above. You will be able to log-in again within a few days and access your unofficial clearance. The unofficial clearance will suffice for uploading to Canvas and presenting for field experience clearances. Note: The actual FBI clearance stating any criminal history is required, not a copy of student fingerprints. Fingerprinting must be completed at a site in Pennsylvania.

Tuberculin Skin Test

Students can obtain a proof of Tuberculin Skin Test by visiting the Student Health Center in Quirk Hall on the SJU campus or from a primary care provider.

Protecting Children: Identifying and Reporting Sexual Misconduct

Students are required to complete training in child abuse reporting practices. Access the Protecting Children: Identifying and Reporting Sexual Misconduct training instructions (<https://learn.ue.org/HH0E1593465/SJUProtectingChildren/>). You need to register and create an account. Applicants will be required to enter a Branch Code: 2090-93465. Once you have created an account, you will sign in and search in the search bar at the top for the training "Protecting Children: Identifying and Reporting Sexual Misconduct". Select and complete the training. It should take about 45 minutes to complete. Upon completion of the training, you will receive a certificate that you upload. This clearance must be obtained before the start of your first semester at SJU.

Field Experiences

Clinical experiences that occur at the beginning of a student's training are referred to as field experiences. Specific courses within the educator preparation curriculum require students to complete observations and/or participate in microteaching experiences of theory, pedagogy and other relevant topics in school settings as part of the course requirements. In methods courses, candidates apply pedagogical practice in specific content areas under the guidance of school based teachers.

Pre-Student Teaching

Prior to the student teaching semester, students will be evaluated by a university supervisor who will conduct at least one formal observation of their teaching in a field based classroom setting. Students must apply

for pre-student teaching and must successfully complete the pre-student teaching experience in order to progress through this gate to student teaching. Eligibility is based on good academic standing as determined by a cumulative 3.0 grade point average and successful completion of all prerequisite courses. If a candidate has a cumulative GPA between 2.8 - 2.99, the candidate can meet eligibility by achieving a qualifying score on an approved assessment for the Basic Skills Testing Requirements in Reading, Writing, and Mathematics. Questions about qualifying scores can be directed to the Assistant Dean of Assessment and Clinical Experiences in the School of Education and Human Development.

Student Teaching

During the student teaching semester, candidates are fully immersed in a classroom setting with guidance and support from a school based cooperating teacher and a university based supervisor while concurrently enrolled in a university based seminar course. Students will be evaluated by a university supervisor who will conduct at least four formal observations of their teaching in a field based classroom setting. Students must apply for student teaching. Eligibility is based on good academic standing as determined by a cumulative 3.0 grade point average and successful completion of all prerequisite courses, including the pre-student teaching observation. If a candidate has a cumulative GPA between 2.8 - 2.99, the candidate can meet eligibility by achieving a qualifying score on an approved assessment for the Basic Skills Testing Requirements in Reading, Writing, and Mathematics. Questions about qualifying scores can be directed to the Assistant Dean of Assessment and Clinical Experiences in the School of Education and Human Development.

Dispositional check process for candidates

Students applying for entrance into an educational program leading to certification will be required to complete disposition self reflections and will be assessed at multiple points about dispositions by a supervisor and/or instructor/advisor. Consistent with the conceptual framework, the educator preparation program evaluates dispositions in students in the following domains:

- Intellectual curiosity and reflection
- Communication skills
- Professionalism
- Collaboration
- Ethical behavior
- Social justice orientation

If students are found to need improvement or are demonstrating concerning behaviors in one of these domains, the program will develop a plan of action to address concerns. The plan of action may include additional learning experiences, additional observation and reflection, or in some cases counseling out of the program and into another area of study.

Professional Testing Requirements for Certification and Licensure

In addition to completing the prescribed program of study for certification in their respective areas, candidates are also required to successfully complete standardized tests in order to qualify for professional licenses and certifications. Testing requirements vary from state to state; therefore candidates must be alert to the requirements for any

state in which they wish to be certified. Saint Joseph's University's educator preparation programs are aligned with Pennsylvania testing requirements.

Applying for Certification and Licensure

Saint Joseph's University's educator preparation programs are aligned with Pennsylvania testing requirements. The Certification Officer for the School of Education and Human Development reviews, validates and fulfills all requests for certification and licensure. Candidates are encouraged to apply for certification as close to program completion as possible. Candidates applying for certification are required to meet certification requirements set by PDE at the time of their application for certification. Students may be required to complete additional coursework and/or field work to meet certification requirements. Students with coursework older than five years will also be reviewed by the program director for their certification area.

Student Score Reports

Students applying for certification in Pennsylvania must request that all test scores be sent directly from the testing company to the Pennsylvania Department of Education (PDE). This is free of charge at the time of registration. PDE will only accept scores that have been received directly from the testing company. SJU will submit SAT and ACT scores to PDE, if requested, after candidates provide evidence of their scores to the School of Education and Human Development, Director of Assessment.

Admission to Candidacy

All students in programs leading to initial educator certification are required to be formally admitted into education programs. This formal admission is in addition to the admission to Saint Joseph's University. Formal admission is a gateway called Admission to Candidacy. This status is granted by the School of Education and Human Development after students have met specific program and Pennsylvania Department of Education requirements. Candidacy status is required before eligibility to take specific courses, including student teaching, and these courses are indicated by prerequisites within the course catalog. Students are expected to demonstrate the knowledge, skills, and dispositions of future educators.

Admission to Candidacy Process:

- Undergraduate students typically apply by January 31 of their sophomore year using an online application. Undergraduate students, including transfer students, should contact their faculty advisor with questions about admission to candidacy. Students are required to meet with their advisors prior to applying for candidacy. A copy of the application form, completed by the student, is provided to the SEHD Assistant Dean. Students will be notified about their Educator Preparation Program application status.
- Graduate students and students in 4+1 programs are evaluated for candidacy at application to the program. Graduate students should contact the graduate faculty program director with questions about admission to candidacy in graduate programs, including 4+1 programs.

Admission to Candidacy Requirements:

Undergraduate Students

- Complete at least 45 credit hours (including transfer credits)
- Complete English 101 and CCC English Literature Requirements
- Have at least completed 6 credits in Mathematics

- Earn a B- average (2.7) or better in all major courses taken
- Earn a minimum cumulative GPA of at least 3.0
- If cumulative GPA between 2.8-2.99;
 - Achieve a qualifying score on a Pennsylvania Department of Education approved assessment for the Basic Skills Testing Requirements in Reading, Writing, and Mathematics or satisfy the requirements through the alternatives policy. Questions about qualifying scores can be directed to the Assistant Dean of Assessment and Clinical Experiences in the School of Education and Human Development. PDE approved assessments include:
 - PAPA
 - SAT
 - ACT
 - ETS Academic Core

Graduate Students

- Complete a bachelor's degree from a regionally accredited college or university with a GPA of at least 3.0
- For art education, foreign language education and middle or secondary education students, provide evidence of completion of an undergraduate major, or required prerequisite coursework, in their chosen certification area
- Graduate students should speak with their program directors regarding the timing of PDE required certification examinations during their programs of study.

Educational Leadership, Counseling and Social Work

The Department of Educational Leadership, Counseling and Social Work is dedicated to cultivating future transformational leaders who advance human knowledge and global welfare.

The values and principles of discernment, personal and professional development (magis), social justice, democratic ideals, service with and for others and cura personalis (care for the whole person) serve as the foundation for an interprofessional community.

Faculty

Most of our courses are taught by full-time faculty who are experts and scholars in their field. High-level practitioner experts and interdisciplinary faculty from across the University and other institutions also teach some of our courses or course modules, serve as guest speakers and join dissertation committees.

Department of Educational Leadership, Counseling and Social Work Faculty & Staff (<https://www.sju.edu/departments/educational-leadership/faculty-staff/>)

Programs Graduate

- Clinical Mental Health Counseling (p. 274)
- Educational Leadership and Transformational Change (p. 276)
- Museum Education (p. 280)
- School Counseling (p. 281)
- Social Work (p. 281)

Graduate Certificate

- Addictions Counseling (p. 274)
- Catholic Education Leadership (p. 274)
- Museum Education (p. 279)

Doctoral

- Healthcare Education EdD (p. 277)
- Interdisciplinary EdD for Educational Leaders (p. 278)

Doctoral Certificate

- Diversity, Equity and Inclusion in Educational Leadership (p. 275)
- Principal Leader (p. 280)
- Superintendent Letter of Eligibility (p. 282)

Addictions Counseling Graduate Certificate

The Addictions Counseling Graduate Certificate is a 12-credit certificate designed to prepare students for licensure and certification as addictions specialists. The certificate can be completed as a standalone option or while pursuing the Clinical Mental Health Counseling master’s degree. Current students, alumni of the Clinical Mental Health Counseling Program, and individuals with an earned master’s degree in a relevant helping professions field from an accredited institution are eligible to apply. Up to six credits may be applied to both the graduate certificate and the Clinical Mental Health Counseling master’s degree. For students seeking both the master’s degree and the certificate, the certificate is awarded when all of the requirements for both the certificate and the degree have been met. For individuals seeking only the certificate, the certificate is awarded when the student has met all certificate requirements.

Licensure

The Addictions Counseling certificate, a 12-credit hour graduate certificate, meets the academic requirements for the Certified Advanced Alcohol and Drug Counselor (CAADC) certification and the NBCC Master Addictions Counselor (MAC).

Learning Goals and Outcomes

- Goal 1:** Students demonstrate knowledge and skills foundational to the counseling specialty area of addiction counseling.
- Goal 2:** Students demonstrate knowledge and skills specific to addiction counseling settings, including treatment of co-occurring disorders in a variety of settings.
- Goal 3:** Students make professional and ethical decisions using sound clinical judgment based on research, standards and best practices established for addiction counseling.

Requirements

Code	Title	Hours
CNS 565	Addictions Counseling	3
CNS 575	Family Systems and Addictions	3
CNS 580	Diag, Treat & Recov in Addict	3

CNS 585	Psychopharmacology	3
Total Hours		12

Catholic Education Leadership Graduate Certificate

The Catholic Educational Leadership Certificate is a 12-credit (four courses) graduate program that prepares leaders to meet the critical needs and challenges facing 21st century Catholic K-12 education in our local communities. Grounded in the nearly 500-year tradition of Jesuit education, this certificate offers the insights of Ignatian leadership which is imaginative, practical, flexible, and visionary. This program teaches participants the most current information on holistic fiduciary care of school communities, education law, finance, and the development and implementation of transformational leadership.

Students pursuing this certificate at the post-baccalaureate could apply the 12 credits toward the 30-credit MS in Educational Leadership & Transformational Change (ELTC). Students pursuing this certificate at the post-master’s level could apply these credits toward our 60-credit Interdisciplinary Doctor of Education Program for Educational Leaders (IDEPEL).

Graduates of this program will be able to:

- Advance to the highest positions of leadership within Catholic schools and diocesan offices of Catholic education.
- Contribute to the extraordinary leadership needs of the rapidly changing landscape of Catholic education today.
- Advance Catholic education.

Requirements

Code	Title	Hours
EDL 665	Transformational Leadership	3
EDL 670	Strategic Human Resources	3
EDL 680	Navigating the Dynamics of Law	3
EDL 690	Equity Allocation: Bridging	3
Total Hours		12

Clinical Mental Health Counseling MS

The Master of Science in Clinical Mental Health Counseling (CMHC) is a 60 credit hour graduate degree program that prepares students to work with individuals, couples, families or groups to develop behaviors and skills that will help them to manage and recover from stressors and problems of living, addictions, relational difficulties, self-harm and thoughts of suicide, and mental health disorders such as anxiety and depression. The Clinical Mental Health Counseling program prepares students to assess, diagnose, and treat mental health disorders and problems of living, including grief and loss, relationships, and wellness. Clinical mental health counselors and addiction counseling specialists work in a variety of settings including private practice, education and health care settings, and community agencies. Clinical mental health counselors work with other health professionals to coordinate care through the development and implementation of treatment plans.

Licensure

CMHC degree program meets the Pennsylvania Board of Social Workers, Marriage and Family Therapist and Professional Counselors education requirements for the Licensed Professional Counselor (LPC) credential and the National Board Certified Counselors education requirements for the National Certified Counselor (NCC) and the Certified Clinical Mental Health Counselors (CCMHC) credentials.

Learning Goals and Outcomes

Program Learning Outcomes (PLOs)

Informed by specific CACREP Knowledge Domains (Section 3)

Saint Joseph's University Counseling Program graduates will:

PLO1: Develop a professional identity as a counselor and demonstrate knowledge and skills related to ethical and professional practice in counseling (3.A).

PLO2: Apply knowledge and demonstrate skills associated with humility and culturally responsive practice (3.B).

PLO3: Apply knowledge of human development across the lifespan and how it relates to the counseling process (3.C).

PLO4: Apply knowledge and skills of career development and demonstrate how they relate to the counseling process (3.D).

PLO5: Demonstrate the communication skills required to be effective counselors (3.E).

PLO6: Apply knowledge and skills related to group counseling, dynamics, and facilitation (3.F).

PLO7: Apply knowledge and skills related to appraisal and diagnostic processes (3.G.).

PLO8: Apply knowledge and skills related to research and program development (3.H)

SJU Clinical Mental Health Counseling Program graduates will:

PLO10: Apply knowledge and skills related to intake interviews, mental status evaluations, biopsychosocial histories, mental health histories, and psychological assessment for treatment planning and caseload management (5.C.4).

PLO11: Demonstrate knowledge and skills related to techniques and interventions for prevention and treatment of a broad range of mental health issues (5.C.5).

Requirements

Code	Title	Hours
CNS 500	Ethic Legal & Prof Iss in Coun	3
CNS 505	Coun Theories & Techniques	3
CNS 510	Counseling Across the Lifespan	3
CNS 515	Career Counseling	3
CNS 520	Group Counseling	3
CNS 525	Counseling Skills & Techniques	3
CNS 530	Assessment Practices for Coun	3
CNS 535	Cult Div, Iden & Soc Justice	3
CNS 540	Res & Prog Eval in Coun Pract	3

CNS 545	Crisis Coun Trauma, Violence	3
CNS 550	Psychopathology	3
CNS 555	Sexuality Counseling	3
CNS 560	Family & Couples Couns Techniq	3
CNS 565	Addictions Counseling	3
CNS 600	Practicum ¹	3
CNS 691	Internship I ¹	3
CNS 692	Internship II ¹	3
Electives (Choose three): ²		9
CNS 570	Special Topics in Counseling	
CNS 575	Family Systems and Addictions	
CNS 580	Diag, Treat & Recov in Addict	
CNS 585	Psychopharmacology	
CNS 605	Foundations: School Counseling	
CNS 610	Counseling Children in Schools	
CNS 615	College and Career Readiness	
CNS 620	Seminar in School Counseling	
Total Hours:		60

¹ **Practicum and Internship Requirements:** Students obtain 700 hours of clinical experience through supervised practicum and internship experiences. Students are required to maintain a personal liability insurance policy throughout their practicum and internship coursework. Non-degree seeking students are not eligible to complete practicum and internship courses.

² Students are eligible to take graduate courses offered by other programs as electives, pending availability and approval.

Diversity, Equity and Inclusion in Educational Leadership Doctoral Certificate

The Diversity, Equity, and Inclusion in Educational Leadership Doctoral Certificate is housed in the Interdisciplinary Doctor of Education Program for Educational Leaders (IDEPEL) and Healthcare Education programs. This certificate prepares leaders across K-12 schools, colleges and universities, social sector fields (e.g., healthcare, organizations, educational non-profits, government), and healthcare education to engage in culturally relevant ways and to help others' learning and interactions in diverse contexts.

There are two options for obtaining the Diversity, Equity, and Inclusion in Educational Leadership Doctoral Certificate:

1. Students pursuing the IDEPEL/Healthcare Education EdD will take four of the required courses during pursuit of the EdD and the remaining two stand-alone courses after taking the first four courses. Students will need to declare the certificate in order to receive it upon completion of the EdD.
2. Students complete all six-course (18 credits) for the certificate, with or without the option to count four specified courses from the doctoral curriculum toward future EdD degree completion.

Requirements

Code	Title	Hours
Select four courses:		12
EDL 830	Critical Ldsh: Social Justice (Fall, Hybrid)	
EDL 850	Learning Design&Env: K-12 (Fall, Hybrid)	
or EDL 851	Learning Design&Env: HE	
EDL 885	Global Perspectives on Ldsh (Summer II, Online)	
EDL 820	Interdisciplinary Ldsh Theory	
Required:		
EDL 888 (Coming Fall 2026)		3
EDL 889 (Coming Fall 2026)		3
Total Hours		18

Educational Leadership and Transformational Change MS

The MS in Educational Leadership Transformational Change at Saint Joseph's University prepares aspiring educational leaders, school administrators, supervisors of curriculum, and supervisors of special education to become transformative leaders in PK-12 settings.

Learning Goals and Outcomes

Goal 1: Students will demonstrate knowledge of Educational Leadership content, theory and practices.

Goal 2: Students will demonstrate knowledge of and professional leadership skills in developing a strong, positive school culture to ensure PK-12 student success.

Goal 3: Students will demonstrate the ability to manage democratically the school organization, operations and resources for effective results.

Goal 4: Students will demonstrate knowledge of policies, laws and regulations and apply the principles of integrity, equity and fairness in effectively advocating for children and public education.

Requirements

Those pursuing a Master of Science in Educational Leadership and Transformational Change may add both concentrations, but a concentration is not required to earn the degree.

Required courses with no concentration selected (GENL):

Code	Title	Hours
EDL 600	Empowering Change Agents	3
EDL 660	Strategic Leadership for K-12	3
EDL 665	Transformational Leadership	3
EDL 670	Strategic Human Resources	3
EDL 680	Navigating the Dynamics of Law	3
EDL 685	Instructional Design Contemp	3
EDL 690	Equity Allocation: Bridging	3
SPE 622	Admin & Supv.Spec Ed Progs	3
Any two electives from EDL, EDU, SPE 6XX level courses.		6
Total Hours		30

Required courses for the Administrative I Principal PK-12 and Curriculum and Instruction Supervisor PK-12 Concentration (PCSP):

Code	Title	Hours
EDL 600	Empowering Change Agents	3
EDL 660	Strategic Leadership for K-12	3
EDL 665	Transformational Leadership	3
EDL 670	Strategic Human Resources	3
EDL 680	Navigating the Dynamics of Law	3
EDL 685	Instructional Design Contemp	3
EDL 690	Equity Allocation: Bridging	3
EDL 695	Internship I: Leaders/Action	3
EDL 696	Internship II: Leaders/Action	3
SPE 622	Admin & Supv.Spec Ed Progs	3
Total Hours		30

Required courses for the Supervisory I of Special Education PK-12 Concentration (SPSU):

Code	Title	Hours
EDL 600	Empowering Change Agents	3
EDL 660	Strategic Leadership for K-12	3
EDL 665	Transformational Leadership	3
EDL 670	Strategic Human Resources	3
EDL 685	Instructional Design Contemp	3
EDL 690	Equity Allocation: Bridging	3
SPE 700	Special Education Law/Policy	3
SPE 622	Admin & Supv.Spec Ed Progs	3
SPE 623	Advanced Fieldwork/Seminar	3
SPE 624	Adv Super & Curr Fieldwk/Sem	3
Total Hours		30

Required courses for the Administrative I Principal PK-12 and Curriculum and Instruction Supervisor PK-12 Concentration and Supervisory I of Special Education PK-12 Concentration (PSCS):

Code	Title	Hours
EDL 600	Empowering Change Agents	3
EDL 660	Strategic Leadership for K-12	3
EDL 665	Transformational Leadership	3
EDL 670	Strategic Human Resources	3
EDL 680	Navigating the Dynamics of Law	3
EDL 685	Instructional Design Contemp	3
EDL 690	Equity Allocation: Bridging	3
EDL 695	Internship I: Leaders/Action	3

EDL 696	Internship II: Leaders/Action	3
SPE 700	Special Education Law/Policy	3
SPE 622	Admin & Supv: Spec Ed Progs	3
SPE 623	Advanced Fieldwork/Seminar	3
SPE 624	Adv Super & Curr Fieldwk/Sem	3
Total Hours		39

Healthcare Education EdD

Our Doctor of Education (EdD) in Healthcare Education Program develops equity-oriented, transformational leaders committed to preparing the next generation of healthcare professionals. The EdD in Healthcare Education is a 54-credit program that follows a hybrid, cohort model with one night a week of on-campus courses and the remaining instructional hours taking pace in asynchronous online learning. Within the cohort model (new cohorts begin each Fall), students complete three years of coursework, followed by a year of dissertation advisement.

The curriculum for the EdD in Healthcare Education includes two key strands: (a) content courses that cover theories, subject-matter knowledge, and professional skills needed to teach and prepare future healthcare professionals, and (b) research courses that cover concepts and skills for designing, conducting, analyzing and presenting a scholarly study and dissertation.

Learning Goals and Outcomes

Goal 1: Our graduates will develop strong qualitative and quantitative research skills in order to be critical consumers and producers of knowledge.

Outcome 1.1: Students will acquire qualitative, quantitative, and mixed research skills as a tool for collecting and using data for leading change and making decisions in their fields

Outcome 1.2: Students will develop the capacity to design and implement their dissertation research according to the scholarly and technical requirements of the field.

Goal 2: Our graduates will develop a strong foundation in their field's theoretical and empirical literature, as well as the capacity to apply theory to practice-based problems.

Outcome 2.1: Students will develop a strong foundation in their field's theoretical and empirical literature.

Outcome 2.2: Students will demonstrate the ability to apply a theoretical framework or empirical study to a problem of practice, as well as the capacity to reflect on the efficacy of their decision-making.

Goal 3: Our graduates will develop a strong foundation in leadership focused on inclusive cultures, social justice, and equity-minded change.

Outcome 3.1: Students will develop the capacity to participate in and lead inclusive cultures in their field.

Outcome 3.2: Students will develop critical analysis skills and practices around the role of social justice in equity-minded change.

Goal 4: Our graduates will develop mastery of specific skills that they can apply to their professional fields.

Outcome 4.1: Students will develop an understanding of the impact of historical, political, and contextual perspectives on their professional practices.

Outcome 4.2: Students will develop the capacity to apply effective leadership practices in their field, including mission formation, strategic planning, finance/operations, learning design, diversity, equity, and inclusion frameworks and practices, and communications.

Requirements

Code	Title	Hours
EDL 800	Prof Sem: Doctoral Studies	3
EDL 805	Quantitative Research I	3
EDL 820	Interdisciplinary Ldsh Theory	3
EDL 830	Critical Ldsh: Social Justice	3
EDL 846	Hist/Pol/LegalContxt Ldsh: HE	3
EDL 835	Qualitative Research I	3
EDL 843	Curriculum and Instruction	3
EDL 844	Teaching Practicum	3
EDL 851	Learning Design&Env: HE	3
EDL 860	Strat Plan,Eval,Fiscal Resour	3
EDL 870	Proposal Writing: K-12	3
or EDL 871	Proposal Writing: Higher Educa	
EDL 875	Organizational Theory&Change	3
EDL 885	Global Perspectives on Ldsh	3
EDL 890	Adv Resrch Method: Quant/Mixed	3
or EDL 891	Adv Resrch Method: Qualitative	
EDL 893	Dissertation Study I	3
EDL 894	Dissertation Study II	3
EDL 895	Dissertation Study III	3
EDL 896	Dissertation Study IV	3
EDL 899	Dissertation Study V+	0
Total Hours		54

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
EDL 800	Prof Sem: Doctoral Studies	3
EDL 830	Critical Ldsh: Social Justice	3
Hours		6
Spring		
EDL 805	Quantitative Research I	3
EDL 820	Interdisciplinary Ldsh Theory	3
Hours		6
Summer		
EDL 846	Hist/Pol/LegalContxt Ldsh: HE	3
EDL 875	Organizational Theory&Change	3
Hours		6
Second Year		
Fall		
EDL 835	Qualitative Research I	3
EDL 851	Learning Design&Env: HE	3
Hours		6
Spring		
EDL 860	Strat Plan,Eval,Fiscal Resour	3

EDL 843	Curriculum and Instruction	3
Hours		6
Summer		
EDL 885	Global Perspectives on Ldsh	3
EDL 844	Teaching Practicum	3
Hours		6
Third Year		
Fall		
EDL 870 or EDL 871	Proposal Writing: K-12 or Proposal Writing: Higher Educa	3
EDL 893	Dissertation Study I	3
Hours		6
Spring		
EDL 890 or EDL 891	Adv Resrch Method: Quant/Mixed or Adv Resrch Method: Qualitative	3
EDL 894	Dissertation Study II	3
Hours		6
Fourth Year		
Fall		
EDL 895	Dissertation Study III	3
Hours		3
Spring		
EDL 896	Dissertation Study IV	3
Hours		3
Fifth Year		
Spring		
EDL 899	Dissertation Study V+	0
Hours		0
Total Hours		54

Interdisciplinary EdD for Educational Leaders

Our Doctor of Educational Leadership (EdD) and Certification Program prepares transformational leaders across K-12, higher education, social sector, and healthcare fields who are committed to equity-oriented change. The EdD in Educational Leadership program is a 54-credit program that follows a hybrid, cohort model with one night a week of on-campus courses and the remaining instructional hours taking pace in asynchronous online learning. Within the cohort model (new cohorts begin each Fall), students complete three years of coursework, followed by a year of dissertation advisement.

The curriculum for the EdD in Educational Leadership includes two key strands: (a) content courses that cover theories, subject-matter knowledge, and professional skills needed to lead in educational settings, and (b) research courses that cover concepts and skills for designing, conducting, analyzing and presenting a scholarly study and dissertation.

The EdD in Educational Leadership Program offers four concentrations and four certification options:

Concentrations:

- K-12 Education
- Higher Education and Social Sectors (e.g., leadership in organizations, government, non-profits, healthcare, and criminal justice)

Learning Goals and Outcomes

Goal 1: Our graduates will develop strong qualitative and quantitative research skills in order to be critical consumers and producers of knowledge.

Outcome 1.1: Students will acquire qualitative, quantitative, and mixed research skills as a tool for collecting and using data for leading change and making decisions in their fields

Outcome 1.2: Students will develop the capacity to design and implement their dissertation research according to the scholarly and technical requirements of the field.

Goal 2: Our graduates will develop a strong foundation in their field's theoretical and empirical literature, as well as the capacity to apply theory to practice-based problems.

Outcome 2.1: Students will develop a strong foundation in their field's theoretical and empirical literature.

Outcome 2.2: Students will demonstrate the ability to apply a theoretical framework or empirical study to a problem of practice, as well as the capacity to reflect on the efficacy of their decision-making.

Goal 3: Our graduates will develop a strong foundation in leadership focused on inclusive cultures, social justice, and equity-minded change.

Outcome 3.1: Students will develop the capacity to participate in and lead inclusive cultures in their field.

Outcome 3.2: Students will develop critical analysis skills and practices around the role of social justice in equity-minded change.

Goal 4: Our graduates will develop mastery of specific skills that they can apply to their professional fields.

Outcome 4.1: Students will develop an understanding of the impact of historical, political, and contextual perspectives on their professional practices.

Outcome 4.2: Students will develop the capacity to apply effective leadership practices in their field, including mission, strategic planning, finance/operations, learning design, and communications.

Requirements

Code	Title	Hours
EDL 800	Prof Sem: Doctoral Studies	3
EDL 805	Quantitative Research I	3
EDL 820	Interdisciplinary Ldsh Theory	3
EDL 830	Critical Ldsh: Social Justice	3
EDL 835	Qualitative Research I	3
EDL 840	Mixed Methods Research	3
EDL 860	Strat Plan,Eval,Fiscal Resour	3
EDL 875	Organizational Theory&Change	3
EDL 880	Community Engaged Leadership	3
EDL 885	Global Perspectives on Ldsh	3
EDL 893	Dissertation Study I	3
EDL 894	Dissertation Study II	3
EDL 890	Adv Resrch Method: Quant/Mixed	3
or EDL 891	Adv Resrch Method: Qualitative	

EDL 895	Dissertation Study III	3
EDL 896	Dissertation Study IV	3
EDL 899	Dissertation Study V+	0
Concentration Options		9
Basic K-12 Education		
EDL 850	Learning Design&Env: K-12	
EDL 870	Proposal Writing: K-12	
EDL 845	Historical, Political, & Legal Contexts of Leadership: K-12	
Higher Education		
EDL 851	Learning Design&Env: HE	
EDL 871	Proposal Writing: Higher Educa	
EDL 846	Hist/Pol/LegalContxt Ldsh: HE	
Total Hours		54

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
EDL 800	Prof Sem: Doctoral Studies	3
EDL 830	Critical Ldsh: Social Justice	3
Hours		6
Spring		
EDL 805	Quantitative Research I	3
EDL 820	Interdisciplinary Ldsh Theory	3
Hours		6
Summer		
EDL 845	Historical, Political, & Legal Contexts of Leadership: K-12	3
EDL 875 or EDL 846	Organizational Theory&Change or Hist/Pol/LegalContxt Ldsh: HE	3
Hours		6
Second Year		
Fall		
EDL 835	Qualitative Research I	3
EDL 850 or EDL 851	Learning Design&Env: K-12 or Learning Design&Env: HE	3
Hours		6
Spring		
EDL 840	Mixed Methods Research	3
EDL 860	Strat Plan,Eval,Fiscal Resour	3
Hours		6
Summer		
EDL 880	Community Engaged Leadership	3
EDL 885	Global Perspectives on Ldsh	3
Hours		6
Third Year		
Fall		
EDL 870 or EDL 871	Proposal Writing: K-12 or Proposal Writing: Higher Educa	3
EDL 893	Dissertation Study I	3
Hours		6
Spring		
EDL 890 or EDL 891	Adv Resrch Method: Quant/Mixed or Adv Resrch Method: Qualitative	3
EDL 894	Dissertation Study II	3
Hours		6

Fourth Year		
Fall		
EDL 895	Dissertation Study III	3
Hours		3
Spring		
EDL 896	Dissertation Study IV	3
Hours		3
Fifth Year		
Fall		
EDL 899	Dissertation Study V+ (Only Required if Dissertation is Incomplete)	0
Hours		0
Total Hours		54

Museum Education Graduate Certificate

The four course (12 credit) stackable certificate in Museum Education is an additional entry point, allowing students to complete four courses for the certificate, with the option to continue on to the MA with credit for the four completed courses. The certificate contains four required courses and can be completed within two semesters.

Learning Goals and Outcomes

Goal 1: Our graduates will develop a strong foundation in their field's theoretical and empirical literature, as well as the capacity to apply theory to practice-based problems.

Outcome 1.1: Students will develop a strong foundation in their field's theoretical and empirical literature.

Outcome 1.2: Students will demonstrate the ability to apply a theoretical framework or empirical study to a problem of practice, as well as the capacity to reflect on the efficacy of their decision-making.

Goal 2: Our graduates will develop a strong foundation in education and leadership focused on inclusive cultures, social justice, and equity-minded change.

Outcome 2.1: Students will develop the capacity to participate in and lead inclusive cultures in their field.

Outcome 2.2: Students will develop critical analysis skills and practices around the role of social justice in equity-minded change.

Goal 3: Our graduates will develop mastery of specific skills that they can apply to their professional fields.

Outcome 3.1: Students will develop an understanding of the impact of historical, political, and contextual perspectives on their professional practices.

Outcome 3.2: Students will develop the capacity to apply effective instructional practices in their field, including culturally relevant pedagogy, experiential and object-based education, and pedagogical content knowledge.

Requirements

Code	Title	Hours
Select One Foundations in Museum Education		3
EDL 604	History of Museum Education	

EDL 615	Museum Mgmt & Admin	
Select One Inclusive Learning Environments		3
EDL 600	Empowering Change Agents	
EDL 685	Instructional Design Contemp	
Select One Course in the Pedagogical Practices		3
EDL 630	Museum Education Internship	
EDL 620	Object-based Learning	
EDL 685	Instructional Design Contemp	
Select One Additional Course from the Museum Education Curriculum Offerings		3
EDL 604	History of Museum Education	
EDL 615	Museum Mgmt & Admin	
EDL 600	Empowering Change Agents	
EDL 625	Inclusive Practice in Museums	
EDL 630	Museum Education Internship	
EDL 620	Object-based Learning	
EDL 685	Instructional Design Contemp	
Total Hours		12

Museum Education MA

The fully online, synchronous curriculum includes three key strands: (a) foundations in museum education, (b) pedagogical practices, and (c) inclusive learning environments.

Within each strand, the program focuses on:

- Foundations of Museum Education: history and philosophy of museums, especially museum education; the museum’s shifting role in society
- Inclusive Learning Environments: Anti-racism, anti-bias lens in museum education, DEI frameworks
- Pedagogical Practices: experiential learning, object-based learning, and design theory for in-person and virtual spaces; effective communication and presentations

Learning Goals and Outcomes

Goal 1: Our graduates will develop a strong foundation in their field’s theoretical and empirical literature, as well as the capacity to apply theory to practice-based problems.

Outcome 1.1: Students will develop a strong foundation in their field’s theoretical and empirical literature.

Outcome 1.2: Students will demonstrate the ability to apply a theoretical framework or empirical study to a problem of practice, as well as the capacity to reflect on the efficacy of their decision-making.

Goal 2: Our graduates will develop a strong foundation in education and leadership focused on inclusive cultures, social justice, and equity-minded change.

Outcome 2.1: Students will develop the capacity to participate in and lead inclusive cultures in their field.

Outcome 2.2: Students will develop critical analysis skills and practices around the role of social justice in equity-minded change.

Goal 3: Our graduates will develop mastery of specific skills that they can apply to their professional fields.

Outcome 3.1: Students will develop an understanding of the impact of historical, political, and contextual perspectives on their professional practices.

Outcome 3.2: Students will develop the capacity to apply effective instructional practices in their field, including culturally relevant pedagogy, experiential and object-based education, and pedagogical content knowledge.

Requirements

Code	Title	Hours
Foundations in Museum Education		
EDL 604	History of Museum Education	3
EDL 615	Museum Mgmt & Admin	3
Inclusive Learning Environments/DEI		
EDL 600	Empowering Change Agents	3
EDL 625	Inclusive Practice in Museums	3
EDL 670	Strategic Human Resources	3
Elective		3
Pedagogical Practices		
EDL 685	Instructional Design Contemp	3
EDL 620	Object-based Learning	3
EDL 610	Public Speaking & Presentation	3
EDL 630	Museum Education Internship	3
Total Hours		30

Principal Leader Doctoral Certificate

Students completing the Principal Leader Certificate at Saint Joseph’s University will be automatically endorsed by our university in their application for the PA School Leader Endorsement. As such, the Principal Leader Certificate outlined in this mandate follows the curriculum, program structure and learning objectives proposed by NCEE and approved by PDE.

Learning Goals and Outcomes

Goal 1: Students will acquire qualitative, quantitative, and mixed research skills as a tool for collecting and using data for leading change and making decisions in their fields.

Goal 2: Students will demonstrate the ability to apply a theoretical framework or empirical study to a problem of practice, as well as the capacity to reflect on the efficacy of their decision-making.

Goal 3: Students will develop the capacity to participate in and lead inclusive cultures in their field.

Goal 4: Students will develop critical analysis skills and practices around the role of social justice in equity-minded change.

Goal 5: Students will develop an understanding of the impact of historical, political, and contextual perspectives on their professional practices.

Goal 6: Students will develop the capacity to apply effective leadership practices in their field, including mission, strategic planning, finance/operations, learning design, and communications.

Requirements

Code	Title	Hours
EDL 822	Collaborative Data Discourse	3
EDL 824	Coaching: Support Action Learn	3
EDL 826	Coaching New Principals	3
EDL 828	Case Study Writing and Portfol	3
Total Hours		12

School Counseling MS

The MS in School Counseling prepares students to apply instructional and school counseling interventions through the use of data informed strategies to promote student learning outcomes. Students will design, implement, and assess comprehensive school counseling programs in PK-12 schools. The MS in School Counseling meets Pennsylvania Department of Education (PDE) educational requirements for certification as a school counselor. Students obtain 700 hours of clinical experience through supervised practicum and internship experiences in PK-12 schools.

Learning Goals and Outcomes

Program Learning Outcomes (PLOs)

Informed by specific CACREP Knowledge Domains (Section 3)

Saint Joseph's University Counseling Program graduates will:

PLO1: Develop a professional identity as a counselor and demonstrate knowledge and skills related to ethical and professional practice in counseling (3.A).

PLO2: Apply knowledge and demonstrate skills associated with humility and culturally responsive practice (3.B).

PLO3: Apply knowledge of human development across the lifespan and how it relates to the counseling process (3.C).

PLO4: Apply knowledge and skills of career development and demonstrate how they relate to the counseling process (3.D).

PLO5: Demonstrate the communication skills required to be effective counselors (3.E).

PLO6: Apply knowledge and skills related to group counseling, dynamics, and facilitation (3.F).

PLO7: Apply knowledge and skills related to appraisal and diagnostic processes (3.G.).

PLO8: Apply knowledge and skills related to research and program development (3.H)

SJU School Counseling Program graduates will:

PLO12: Develop skills to critically examine the connections of social, cultural, familial, emotional, and behavioral factors to academic achievement (5.H.11)

PLO13: Develop skills to screen PK-12 students for characteristics, risk factors, and warning signs of mental health and behavioral disorders (5.H.12).

Requirements

Code	Title	Hours
CNS 500	Ethic Legal & Prof Iss in Coun	3
CNS 505	Coun Theories & Techniques	3
CNS 510	Counseling Across the Lifespan	3
CNS 515	Career Counseling	3
CNS 520	Group Counseling	3
CNS 525	Counseling Skills & Techniques	3
CNS 530	Assessment Practices for Coun	3
CNS 535	Cult Div, Iden & Soc Justice	3
CNS 540	Res & Prog Eval in Coun Pract	3
CNS 545	Crisis Coun Trauma, Violence	3
CNS 605	Foundations: School Counseling	3
CNS 610	Counseling Children in Schools	3
CNS 615	College and Career Readiness	3
CNS 620	Seminar in School Counseling	3
CNS 600	Practicum ¹	3
CNS 691	Internship I ¹	3
CNS 692	Internship II ¹	3
Electives (Choose 3): ²		9
CNS 550	Psychopathology	
CNS 555	Sexuality Counseling	
CNS 560	Family & Couples Couns Techniq	
CNS 565	Addictions Counseling	
CNS 570	Special Topics in Counseling	
CNS 575	Family Systems and Addictions	
CNS 580	Diag, Treat & Recov in Addict	
CNS 585	Psychopharmacology	
Total Hours		60

¹ **Practicum and Internship Requirements:** Students obtain 700 hours of clinical experience through supervised practicum and internship experiences. Students are required to maintain a personal liability insurance policy throughout their practicum and internship coursework. Non-degree seeking students are not eligible to complete practicum and internship courses.

² Students are eligible to take graduate courses offered by other programs as electives, pending availability and approval. Students who wish to pursue clinical licenses in their states should consult with their state licensure board for specific course requirements, as many states require specific courses be taken to meet educational requirements for clinical licensure; choosing these courses as electives can be a good strategy for those seeking both school counseling certification and future clinical licensure as a professional counselor.

Social Work MSW

The Master of Social Work (MSW) Program is dedicated to equipping students for diversity-responsive practice, innovative leadership, and research dissemination that fosters social and economic well-being, and creates impact in expanding access to opportunities for individuals, families, and communities in the global environment. Grounded in

interdisciplinary knowledge and the values of service, competence, dignity and worth of persons, human rights and social justice, the program facilitates engaged learning experiences resulting in advanced generalist skills to promote a more equitable society.

Learning Goals and Outcomes

Goal 1: To create an inclusive learning environment that represents diversity-responsive excellence in the training of social work professionals.

Goal 2: To prepare advanced generalist social workers who engage in lifelong learning with a commitment to the growth of their own professional knowledge base and ongoing professional development.

Goal 3: To collaborate with community service organizations and professionals, interdisciplinary programs, and equity advocates to promote practices, programs, and policies that enhance the well-being, dignity, and human rights of individuals.

Goal 4: To practice according to professional ethics and competency standards across all forms of practice and geographic areas within an anti-racist framework that acknowledges and advances human rights.

Requirements

The following curricula are based on 2022 CSWE accreditation standards for Social Work programs.

The curriculum is divided into 3 sections for full/part-time programs: generalist courses (30 credits), advanced generalist specialization courses (26 credits), and electives (6 credits). The field education is 900 total hours.

Code	Title	Hours
Generalist Year Courses:		
SWK 510	Human Development & Diversity	3
SWK 540	Ethics & Generalist Practice	3
SWK 541	Individuals Families & Groups	3
SWK 550	Clinical Assessment I	3
SWK 560	Human Rights & Social Justice	3
SWK 561	Organizations & Community I	3
SWK 565	Data Equity	3
SWK 580	Practicum Seminar I	3
SWK 581	Practicum Seminar II	3
SWK 591	Social Policy & Change	3
Advanced Generalist Year Courses:		
SWK 620	Small Groups II	3
SWK 641	Leadership & Supervision	3
SWK 642	Clinical Assessment II	3
SWK 660	Individuals & Families II	3
SWK 661	Organizations & Community II	3
SWK 695	Program & Practice Evaluation	3
SWK 680	Practicum Seminar III	4
SWK 681	Practicum Seminar IV	4
Elective Courses (Full/Part-Time)		6
Total Hours		62

Superintendent Letter of Eligibility Doctoral Certificate

Saint Joseph University's Superintendent Letter of Eligibility has been approved by the Pennsylvania Department of Education and is aligned with the National Educational Leadership Preparation (NELP) standards (see Appendix A).

There are two options for obtaining the doctoral certificate:

1. Students pursuing the Interdisciplinary EdD for Educational Leaders will take the required three courses and fieldwork hours during pursuit of the EdD. Students will need to declare the certificate in order to receive it upon completion of the EdD.
2. Students complete the stand-alone three-course (9 credits) certificate, with or without the option to count toward future EdD degree completion.

Requirements

Code	Title	Hours
EDL 845	Historical, Political, & Legal Contexts of Leadership: K-12	3
EDL 850	Learning Design&Env: K-12	3
EDL 860	Strat Plan,Eval,Fiscal Resour	3
360 hours of supervised fieldwork evenly dispersed across the three semesters of one calendar year (i.e., 120 hours in Spring, 120 hours in Summer, 120 hours in Fall).		
Total Hours		9

Special Education

The Department of Special Education is a vibrant department of dedicated faculty members with a wealth of educational experiences. Our goal is to prepare exemplary teachers, innovative school leaders and educational researchers. Almost every classroom today has a number of students who have a disability, whether it be physical, intellectual, emotional or any combination of the three. The special education department offers programs designed to develop and refine competencies in professional educators to meet the demands of teaching students with special needs in a variety of school environments, including public, private, urban and suburban.

Faculty

Faculty members bring extensive experience in inclusive and special education, urban teaching, assistive technology, behavior analysis and more. They are eager to apply their knowledge to the classroom and support students throughout their field experiences.

Department of Special Education Faculty & Staff (<https://www.sju.edu/departments/special-education/faculty-staff/>)

Programs Undergraduate Majors

- Autism Behavioral Studies (p. 283)
- Education PK-4 and Special Education Dual Major (p. 288)

Undergraduate Minors

- Autism Studies (p. 285)
- Special Education Studies (p. 295)

Graduate

- Applied Behavior Analysis (p. 283)
- Deaf and Hard of Hearing (p. 286)
- Special Education (p. 291)
- Special Education PK-12 (p. 293)

Graduate Certificate

- Applied Behavior Analysis (p. 283)
- Autism Spectrum Disorder (p. 285)
- Deaf and Hard of Hearing (p. 286)
- Intensive Structured Literacy w/ Wilson (p. 290)
- Social, Emotional, and Behavioral Wellness (p. 290)
- Supervisor of Special Education (p. 295)

Post Master's Certificate

- Special Education PK-12 (p. 295)

Applied Behavior Analysis Graduate Certificate

The online Applied Behavior Analysis (ABA) graduate certificate at Saint Joseph's prepares students to sit for the Board Certified Behavior Analyst (BCBA) exam (<https://www.bacb.com/bcba/>) when accompanied with a master's degree. The graduate certificate explores both the theoretical and methodological foundations of behavior analysis.

Requirements

Code	Title	Hours
ABA 601	Concepts & Prin of Behav Analys	3
ABA 602	Ethics & Prof in Behav Analys	3
ABA 603	Measuring Eval Behav Change	3
ABA 604	Behavior Assessment	3
ABA 605	Behavior Change Procedures	3
ABA 606	Collab, Superv, & Mgmt in BA	3
ABA 607	Science and Philosophy of BA	3
ABA 608	Capstone: Applied Behav Analys	3
Total Hours		24

Applied Behavior Analysis MS

Saint Joseph's University's online MS in Applied Behavior Analysis is designed for individuals with a background in education or the social sciences who are interested in becoming Board Certified Behavior Analysts (BCBA) (<https://www.bacb.com/bcba/>). However, anyone with an interest in learning about positive behavioral interventions and support can also benefit from this program.

Requirements

The following curriculum outline is based on the verified course sequence for the 5th edition task list of the BACB for Applied Behavior Analysis programs. ABA 601-607 are the seven required courses for the BACB.

Code	Title	Hours
ABA 601	Concepts & Prin of Behav Analys	3
ABA 602	Ethics & Prof in Behav Analys	3
ABA 603	Measuring Eval Behav Change	3
ABA 604	Behavior Assessment	3
ABA 605	Behavior Change Procedures	3
ABA 606	Collab, Superv, & Mgmt in BA	3
ABA 607	Science and Philosophy of BA	3
ABA 608	Capstone: Applied Behav Analys	3
Electives:		6-7
ABA 609	Supervised Fieldwork in ABA	
SPE 600	Found & Current Issues w/Field	
SPE 608	Families Schls & Cmnty w/Field	
SPE 613	Incl. Class Practices w/Field	
SPE 700	Special Education Law/Policy	
Total Hours		30-31

Autism Behavioral Studies Major

The autism behavioral studies program at Saint Joseph's University has a strong focus in behavioral analysis, health policy and more. Many students choose to learn from experts at the University's Kinney Center of Autism Education.

Learning Goals and Outcomes

Goal 1: Graduates of the Autism Behavioral Studies Program will know and understand the potential causes, symptoms and diagnostic criteria of autism spectrum disorders as well as the specific needs of individuals with autism across the lifespan and how they are treated.

Outcome 1.1: Demonstrate knowledge of the current theories on the causes of autism spectrum disorders.

Outcome 1.2: Demonstrate knowledge of the frequency, characteristics, symptoms, and diagnostic criteria of individuals with autism spectrum disorders.

Outcome 1.3: Demonstrate knowledge of the nature of stereotypes, stigma, and discrimination of individuals with autism spectrum disorders.

Goal 2: Graduates of the Autism Behavioral Studies Program will know and understand the unique and specific behavioral needs of individuals with autism as well as both medical and behavioral approaches to autism treatment and related issues.

Outcome 2.1: Identify the behavioral needs of children and adults with autism spectrum disorders and demonstrate the current behavioral approaches to treating behavioral issues of individuals with autism using Applied Behavior Analysis and medically related therapeutic services.

Outcome 2.2: Demonstrate the ability to communicate orally and in writing in the language of the discipline and particularly on the principles of Applied Behavior Analysis.

Goal 3: Graduates of the Autism Behavioral Studies Program will understand, follow and demonstrate the ethics guidelines and professional codes of conduct for working with individuals with autism.

Outcome 3.1: Demonstrate the roles and responsibilities of behavior analysts, therapists, allied health professionals and related staff, and demonstrate understanding of ethics guidelines in working with individuals with autism.

Outcome 3.2: Graduates will act as responsible citizens, embracing personal and career objectives that honor and serve individuals with autism and their families.

Goal 4: Graduates of the Autism Behavioral Studies Program will identify and understand the difficulties that families face in coping with autism and the impact of paying for autism-related services, as well as the social and economic impact on families and on society.

Outcome 4.1: Identify the impact on parents, siblings, families, and friends of individuals with autism spectrum disorders and demonstrate how to best help these individuals cope with associated stress.

Outcome 4.2: Identify the impact of political issues, including funding and approval of services, around autism spectrum disorders.

Goal 5: Graduates of the Autism Behavioral Studies Program will demonstrate how to collect behavioral data using Applied Behavior Analysis; to measure the progress of individuals with autism; to develop behavioral plans for individuals with autism; and/or to conduct research on individuals with autism or on related treatment plans.

Outcome 5.1: Collect data on the progress of individuals with autism and develop behavioral plans; or collect data for the purpose of conducting research on a particular topic in the field of autism.

Outcome 5.2: Identify and demonstrate methods to empirically assess and evaluate the progress of individuals with autism spectrum disorders for the purpose of developing intervention plans.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3

Philosophy Level Two 3

Theology & Religious Studies Requirements

If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.

Theology	3
Religious Studies	3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
INT 151	Inequality in American Society 1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement 3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement 3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Social Science		
PSY 100	Introductory Psychology	
Writing Intensive		
HSC 331	Health Sciences Research	

Mission-Overlay

SPE 160	Intro to Special Edu w/Field
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Major Requirements

Code	Title	Hours
ABA 100	Intro Autism Spectrum Disorder	3
ABA 200	Applied Behav Anlysis & Autism	3
ABA 201	Skill Assess & Instr ABA&ASD	3
ABA 468	Resources& Advocacy for Autism	3
ABA 469	Adult/Transition Autism	3
ABA 470	Senior Sem ABS Research	3
HSC 331	Health Sciences Research	3
Additional PSY Course		3
Area Studies Courses		12
12 credits (at least two courses must be from Special Education or Teacher Education)		
HSC 110	Intro Health Prof Practice	
HSC 248	Health of School Aged Children	
LIN 101	Language and Communication	
LIN 320	Phonetics	
PHL 286	Philosophy of Mental Illness	
PSY 120	Lifespan Development	
PSY 122	Psychological Disorders	
PSY 201	Biological Bases of Behavior	
PSY 222	Neuropsychology	
PSY 226	Psychology of Emotion	
PSY 237	Child Psychological Disorders	
EDU 241	Soc/Emo Dev/Lrn: Erly Chld	
SPE 160	Intro to Special Edu w/Field	
SPE 205	Inclusive Classrooms w/ Field	
SPE 369	Emot-Beh'I Disabil w/Field	
SPE 379	Fam School & Comm:Diverse Soc	
Total Hours		36

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 101	Craft of Language	3
Theology		3
Non-Native Language		3-4
Diversity		3
Free Elective		3
Hours		15-16
Spring		
ABA 100	Intro Autism Spectrum Disorder	3
Mathematics		3-4
Philosophy Level One		3
Literature		3

Free Elective		3
Hours		15-16
Sophomore		
Fall		
PSY 100	Introductory Psychology	3
ABA 200	Applied Behav Anlysis & Autism	3
ABS Area Studies course (1 of 4)		3
Natural Science		4
World History		3
Hours		16
Spring		
ABA 201	Skill Assess & Instr ABA&ASD	3
Religious Studies		3
Fine & Performing Arts, Design & Creativity		3
INT 151	Inequality in American Society	1
Free Electives		3-6
Hours		13-16
Junior		
Fall		
ABA 468	Resources& Advocacy for Autism	3
ABA 469	Adult/Transition Autism	3
SPE 160	Intro to Special Edu w/Field	3
PSY Course		3
Free Elective		3
Hours		15
Spring		
ABS Area Studies course (2 of 4)		3
HSC 331	Health Sciences Research	3
Philosophy Level Two		3
Free Electives		6
Hours		15
Senior		
Fall		
ABS Area Studies course (3 of 4)		
Free Electives		12
Hours		12
Spring		
ABA 470	Senior Sem ABS Research	3
ABS Area Studies course (4 of 4)		3
Free Electives		9
Hours		15
Total Hours		116-121

Autism Spectrum Disorder Graduate Certificate

Code	Title	Hours
SPE 720	Intro ASD: Caus Diag & Advoc (must be taken as the first ASDE course)	3
SPE 721	Aug & Alt Com & Soc Stratg	3
SPE 722	Evid Based Prac: AI&I Method	3
SPE 723	Autism: Behv Manag Approaches	3
Total Hours		12

Autism Studies Minor

Learning Goals and Outcomes

Goal 1: Graduates of the Autism Studies Minor will know and understand the potential causes, symptoms and diagnostic criteria of Autism

Spectrum Disorders as well as the specific needs of individuals with autism across the lifespan and how they are treated.

Outcome 1.1: Demonstrate knowledge of the current theories on the causes of Autism Spectrum Disorders.

Outcome 1.2: Demonstrate knowledge of the frequency, characteristics, symptoms, and diagnostic criteria of individuals with Autism Spectrum Disorders.

Outcome 1.3: Demonstrate knowledge of the nature of stereotypes, stigma, and discrimination of individuals with Autism Spectrum Disorders.

Goal 2: Graduates of the Autism Studies Minor will know and understand the specific behavioral needs of individuals with Autism Spectrum Disorders as well as behavior-based and alternative interventions to behaviors frequently displayed by individuals with Autism Spectrum Disorders.

Outcome 2.1: Identify the behavioral excesses and deficits frequently displayed by children and adults with Autism Spectrum Disorders and demonstrate understanding of approaches to treating behaviors using interventions grounded in Applied Behavior Analysis as well as medically related therapeutic services.

Outcome 2.2: Demonstrate the ability to communicate orally and in writing in the language of the discipline and the principles of Applied Behavior Analysis.

Goal 3: Graduates of the Autism Studies Minor will understand, follow and demonstrate the ethical guidelines and professional codes of conduct for working with individuals with autism.

Outcome 3.1: Demonstrate the roles and responsibilities of behavior analysts, therapists, allied health professionals and related staff, and demonstrate understanding of ethics guidelines in working with individuals with autism.

Outcome 3.2: Demonstrate understanding of ethical guidelines in working with individuals with autism.

Goal 4: Graduates of the Autism Studies Minor will identify and understand the difficulties that families face in coping with Autism Spectrum Disorders.

Outcome 4.1: Identify the impact on parents, siblings, families, and friends of individuals with Autism Spectrum Disorders and demonstrate how to best help these individuals cope with associated stress.

Goal 5: Graduates of the Autism Studies Minor will demonstrate how to collect behavioral data using Applied Behavior Analysis; to measure the progress and to develop behavior intervention plans for individuals with Autism Spectrum Disorders.

Outcome 5.1: Collect data on the progress of individuals with Autism Spectrum Disorders and develop behavior plans.

Outcome 5.2: Identify and demonstrate methods to empirically assess and evaluate the behavior of individuals with autism spectrum disorders for the purpose of developing intervention plans.

Requirements

Code	Title	Hours
ABA 100	Intro Autism Spectrum Disorder	3
ABA 200	Applied Behav Anlysis & Autism	3
ABA 201	Skill Assess & Instr ABA&ASD	3
Three of the following:		9
EDU 121	Child Development	
EDU 241	Soc/Emo Dev/Lrn: Erly Chld	
HSC 110	Intro Health Prof Practice	
HSC 248	Health of School Aged Children	
HSC 490	Internship in Health Sciences	
ABA 468	Resources& Advocacy for Autism	
ABA 469	Adult/Transition Autism	
ABA 471	Special Topics in Autism	
LIN 101	Language and Communication	
LIN 150	First Year Seminar	
LIN 320	Phonetics	
PSY 120	Lifespan Development	
PSY 222	Neuropsychology	
PSY 226	Psychology of Emotion	
PSY 237	Child Psychological Disorders	
SPE 160	Intro to Special Edu w/Field	
SPE 205	Inclusive Classrooms w/ Field	
SPE 369	Emot-Beh'l Disabil w/Field	
SPE 379	Fam School & Comm:Diverse Soc	
Total Hours		18

Deaf and Hard of Hearing Graduate Certificate

Code	Title	Hours
SPE 600	Found & Current Issues w/Field	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 730	Ed Found - Deaf & Hard of Hear	3
SPE 731	Lang, Lit & Comm Dev-Deaf & HH	3
SPE 732	Curr, Inst & Lrn Env-Deaf & HH	3
SPE 733	List & Spk Skills - Deaf & HH	3
SPE 734	Sign Comm in Instruct Settings	3
SPE 739	Student Teach & Prof Seminar	6
Total Hours		30

Deaf and Hard of Hearing MS

Saint Joseph's University's Deaf and Hard of Hearing Education PK-12 program is designed to serve those interested in the education of the 40 to 50% of children impacted by hearing loss.

Candidates are required to hold a bachelor's degree and are expected to have basic sign language competency. Additionally, this program is intended for individuals who have earned at least initial Standard/Level 1 certification.

Learning Goals and Outcomes

Initial Preparation Standard 1: Learner Development and Individual Learning Differences

1.0 Beginning special education professionals understand how exceptionalities may interact with development and learning and use this knowledge to provide meaningful and challenging learning experiences for individuals with exceptionalities.

Key Elements

1.1 Beginning special education professionals understand how language, culture, and family background influence the learning of individuals with exceptionalities.

1.2 Beginning special education professionals use understanding of development and individual differences to respond to the needs of individuals with exceptionalities.

Initial Preparation Standard 2: Learning Environments

2.0 Beginning special education professionals create safe, inclusive, culturally responsive learning environments so that individuals with exceptionalities become active and effective learners and develop emotional well being, positive social interactions, and self-determination.

Key Elements

2.1 Beginning special education professionals, through collaboration with general educators and other colleagues, create safe, inclusive, culturally responsive learning environments to engage individuals with exceptionalities in meaningful learning activities and social interactions.

2.2 Beginning special education professionals use motivational and instructional interventions to teach individuals with exceptionalities how to adapt to different environments.

2.3 Beginning special education professionals know how to intervene safely and appropriately with individuals with exceptionalities in crisis.

Initial Preparation Standard 3: Curricular Content Knowledge

3.0 Beginning special education professionals use knowledge of general and specialized curricula to individualize learning for individuals with exceptionalities.

Key Elements

3.1 Beginning special education professionals understand the central concepts, structures of the discipline, and tools of inquiry of the content areas they teach, and can organize this knowledge, integrate cross-disciplinary skills, and develop meaningful learning progressions for individuals with exceptionalities.

3.2 Beginning special education professionals understand and use general and specialized content knowledge for teaching across curricular content areas to individualize learning for individuals with exceptionalities.

3.3 Beginning special education professionals modify general and specialized curricula to make them accessible to individuals with exceptionalities.

Initial Preparation Standard 4: Assessment

4.0 Beginning special education professionals use multiple methods of assessment and data sources in making educational decisions

Key Elements

4.1 Beginning special education professionals select and use technically sound formal and informal assessments that minimize bias.

4.2 Beginning special education professionals use knowledge of measurement principles and practices to interpret assessment results and guide educational decisions for individuals with exceptionalities.

4.3 Beginning special education professionals, in collaboration with colleagues and families, use multiple types of assessment information in making decisions about individuals with exceptionalities.

4.4 Beginning special education professionals engage individuals with exceptionalities to work toward quality learning and performance and provide feedback to guide them.

Initial Preparation Standard 5: Instructional Planning and Strategies

Key Elements

5.1 Beginning special education professionals consider individual abilities, interests, learning environments, and cultural and linguistic factors in the selection, development, and adaptation of learning experiences for individuals with exceptionalities.

5.2 Beginning special education professionals use technologies to support instructional assessment, planning, and delivery for individuals with exceptionalities.

5.3 Beginning special education professionals are familiar with augmentative and alternative communication systems and a variety of assistive technologies to support the communication and learning of individuals with exceptionalities.

5.4 Beginning special education professionals use strategies to enhance language development and communication skills of individuals with exceptionalities.

5.5 Beginning special education professionals develop and implement a variety of education and transition plans for individuals with exceptionalities across a wide range of settings and different learning experiences in collaboration with individuals, families, and teams.

5.6 Beginning special education professionals teach to mastery and promote generalization of learning.

5.7 Beginning special education professionals teach cross-disciplinary knowledge and skills such as critical thinking and problem solving to individuals with exceptionalities.

Initial Preparation Standard 6: Professional Learning and Ethical Practice

6.0 Beginning special education professionals use foundational knowledge of the field and their professional ethical principles and practice standards to inform special education practice, to engage in lifelong learning, and to advance the profession.

Key Elements

6.1 Beginning special education professionals use professional ethical principles and professional practice standards to guide their practice.

6.2 Beginning special education professionals understand how foundational knowledge and current issues influence professional practice.

6.3 Beginning special education professionals understand that diversity is a part of families, cultures, and schools, and that complex human issues can interact with the delivery of special education services.

6.4 Beginning special education professionals understand the significance of lifelong learning and participate in professional activities and learning communities.

6.5 Beginning special education professionals advance the profession by engaging in activities such as advocacy and mentoring.

6.6 Beginning special education professionals provide guidance and direction to paraeducators, tutors, and volunteers.

Initial Preparation Standard 7: Collaboration

7.0 Beginning special education professionals collaborate with families, other educators, related service providers, individuals with exceptionalities, and personnel from community agencies in culturally responsive ways to address the needs of individuals with exceptionalities across a range of learning experiences.

Key Elements

7.1 Beginning special education professionals use the theory and elements of effective collaboration.

7.2 Beginning special education professionals serve as a collaborative resource to colleagues.

7.3 Beginning special education professionals use collaboration to promote the well being of individuals with exceptionalities across a wide range of settings and collaborators.

Requirements

Code	Title	Hours
SPE 600	Found & Current Issues w/Field	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
SPE 730	Ed Found - Deaf & Hard of Hear	3
SPE 731	Lang, Lit & Comm Dev-Deaf & HH	3
SPE 732	Curr, Inst & Lrn Env-Deaf & HH	3
SPE 733	List & Spk Skills - Deaf & HH	3
SPE 734	Sign Comm in Instruct Settings	3
SPE 739	Student Teach & Prof Seminar	6
Total Hours		33

Code Title Hours

For those who do not have teaching certification, two additional courses are required:

SPE 604	Research:Lit,Writ,Lang w/Field	3
SPE 605	RsrchBasedModel:MathSciencePro	3

Education PK-4 and Special Education Dual Major

The dual major prepares teachers for teaching in Elementary PK4 and Special Education PK12 grades. The Elementary Education PK4 major leading to Level 1 Instructional Teaching Licensure is an accredited program approved by the Pennsylvania Department of Education (PDE) and is aligned with the requirements for teacher certification in PK4. Students will also engage with content and pedagogical approaches relevant to grades 5 and 6 which enables them to add certification to teach grades 5 and 6 with additional testing. Throughout the Elementary Education PK4 program, students integrate theory with practice through coursework and field experiences in PK4 classrooms.

Students in the PK4 program have the option to add the Special Education PK12 major to their program of study. The Special Education PK12 program leading to Level 1 Instructional Teaching Licensure is aligned with the Pennsylvania Department of Education requirements for teacher certification for Special Education PK12 grades and for serving the needs of learners of all abilities. In all our teacher preparation programs leading to Level 1 Instructional Teaching Licensure, in-class coursework is combined with weekly field experiences in local PK12 classrooms starting with the first semester of study to give students hands-on experience for teaching young learners.

The undergraduate Teacher Education and Special Education programs are built upon a strong liberal arts curriculum provided through the General Education Program (GEP) at Saint Joseph's University. This enables students to integrate their understanding of interdisciplinary content with an understanding of developmentally appropriate pedagogy.

Special Education PK-12 must be a double major with Elementary PK-4.

Learning Goals and Outcomes

Goal 1: Students will demonstrate knowledge of PK-12 learner development and curricular content

Outcome 1.1: The student will be able to identify individual differences and to respond to the needs of individuals with exceptionalities.

Outcome 1.2: The student will be able to use general and specialized content knowledge for teaching across curricular content areas to individualize learning for individuals with exceptionalities.

Goal 2: Students will demonstrate the ability to create positive PK-12 learning environments

Outcome 2.1: The student will demonstrate the ability to use motivational and instructional interventions to teach individuals with exceptionalities how to adapt to different environments.

Outcome 2.2: The student will demonstrate an understanding of ways to collaborate with general educators and other colleagues to create safe, inclusive, culturally responsive learning environments

to engage individuals with exceptionalities in meaningful learning activities and social interactions.

Goal 3: Students will demonstrate the use of assessment for diagnosis and progress monitoring

Outcome 3.1: The student will be able to select and use technically sound formal and informal assessments that minimize bias.

Outcome 3.2: The student will assess performance and provide feedback.

Goal 4: Students will demonstrate knowledge of research-based instructional planning and strategies

Outcome 4.1: The student will be able to identify an individual's abilities, interests, learning environments, and cultural and linguistic factors in the selection, development, and adaptation of learning experiences for individuals with exceptionalities.

Outcome 4.2: The student will be able to use strategies and technology to enhance language development and communication skills of individuals with exceptionalities.

Goal 5: Students will demonstrate knowledge of professional ethical practice

Outcome 5.1: The student will demonstrate an understanding that diversity is a part of families, cultures, and schools, and that complex human issues can interact with the delivery of special education services.

Outcome 5.2: The student will demonstrated the ability to develop a variety of education and transition plans for individual with exceptionalities across a wide range of settings and different learning experiences in collaboration with individuals, families and teams.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3

Religious Studies 3

Diversity & INT 151 Requirements

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
INT 151	Inequality in American Society 1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement 3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement 3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EDU 150	Schools in Society w/ Field	
Social Science		
EDU 151	Cognition & Learning w/ Field	
Writing Intensive		
EDU 151	Cognition & Learning w/ Field	
Mission-Overlay		
SPE 160	Intro to Special Edu w/Field	

Major Requirements

(Special Education PK-12 must be a double major with Elementary PK-4)

Code	Title	Hours
EDU 121	Child Development	3
EDU 150	Schools in Society w/ Field	3
EDU 151	Cognition & Learning w/ Field	3
EDU 155	Found of Early Child w/ Field	3
EDU 231	Assessment and Evaluation	3
EDU 232	Literacy/Literature I w/ Field	3
EDU 246	Language and Culture w/ Field	3
EDU 265	Teaching Math in PK2 w/ Field	3
EDU 340	Literacy/Literature II w/Field	3
EDU 362	Soc Stud Thru Arts PK4 w/Field	3
EDU 363	Science Methods PK-4 w/ Field	3
EDU 366	Teaching Math Gr. 3-6 w/Field	3
EDU 498	Dual Major Student Teaching	6
SPE 160	Intro to Special Edu w/Field	3
SPE 205	Inclusive Classrooms w/ Field	3
SPE 320	Progress Monitoring w/ Field	3
SPE 329	High Incid Disabil w/Field	3
SPE 339	Low Incid Disabil w/Field	3
SPE 349	Literacy Intervention w/Field	3
SPE 359	Math & Content Interv w/Field	3
SPE 369	Emot-Beh'l Disabil w/Field	3
SPE 379	Fam School & Comm:Diverse Soc	3
SPE 495	Special Ed. Student Teaching	6
Total Hours		75

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Intensive Structured Literacy w/ Wilson Graduate Certificate

The 13-credit reading interventionist graduate certificate will help you develop the skills and knowledge you need to teach students to become fluent, independent readers. The certificate, which is International Dyslexia Association (IDA) (<https://dyslexiaida.org/knowledge-and-practices/>) accredited, can be completed online and can stack into a Special Education MS and Education MS for all grade levels.

Learning Goals and Outcomes

Outcome 1: Demonstrate a conceptual understanding of the components of reading and describe how these areas pose challenges for students with disabilities:

- Phonological awareness & phonics
- Fluency
- Vocabulary
- Comprehension
- Language
- Word study (investigate and understand the patterns in words)

Outcome 2: Describe the Simple View of Reading & Reading Rope models and how they are used to understand reading development, instructional needs, and reading concerns

Outcome 3: Describe key characteristics of good and poor readers including students with reading disabilities.

Outcome 4: Understand the reciprocal relationships among phonemic awareness, decoding, word recognition, spelling, and vocabulary knowledge.

Outcome 5: Know/apply in practice considerations for systematically, cumulatively, and explicitly teaching basic decoding and spelling skills.

Outcome 6: Implement an integrated system of assessment and data collection for identification of students struggling to meet academic and behavioral expectations.

Outcome 7: Know and utilize in practice well-validated screening tests designed to identify students at risk for reading difficulties.

Outcome 8: Demonstrate an ability to match instructional research-validated literacy interventions to identified student needs.

Outcome 9: Align general education curriculum, compensatory and special education in providing high quality standards-based instruction/ intervention that is matched to students' academic needs

Requirements

Code	Title	Hours
SPE 604	Research:Lit,Writ,Lang w/Field	3
SPE 710	WRP. Intro Multisens Lang Inst	1
SPE 711	WRP. Int Instr- NonRepsRdr 1-3	3
SPE 712	WRP. Int Instr- NonRepsRdr 4-6	3
SPE 713	WRP. Int Instr- NonRepsRdrPrac	3
Total Hours		13

Social, Emotional, and Behavioral Wellness Graduate Certificate

Social and emotional learning is the process by which children and adults acquire the skills necessary for managing emotions, showing empathy, establishing and maintaining positive relationships, making responsible decisions, and setting and achieving positive goals. These skills must be practiced in social contexts, including classroom and school environments. Many children and youth struggle with these skills, particularly if they have experienced trauma or emotional crisis and few teachers have had formal training to help them.

Learning Goals and Outcomes

Goal 1: Social Emotional Wellness Learning and Youth Development

Outcome 1.1: Describe and define what social emotional learning is and how it relates to resiliency, including the research linking SEL to positive and negative developmental outcomes;

Outcome 1.2: Explain how research grounded in different theoretical traditions frame social and emotional wellness, and the relevance of this prevention science to educators;

Outcome 1.3: Discuss how a multi-tiered system/Positive Behavior Intervention and Supports (PBIS) approach is used to guide the selection and implementation of evidence-based SEL programs and practices;

Outcome 1.4: Evaluate research on social and emotional wellness programs and practices to identify those that are likely to address the needs of a specific student population and students with targeted needs; and

Outcome 1.5: Demonstrate an understanding of typical child, adolescent, and young adult development.

Goal 2: Characteristics and Impact of Adverse Childhood Experiences, Trauma, and Mental Illness on PK-12 Students Candidates will demonstrate their ability to:

Outcome 2.1: Describe and define Adverse Childhood Experiences (ACEs), Trauma, and Mental Illness, including how such experiences and conditions can impact growth, development, and learning of children and adolescents;

Outcome 2.2: Discuss the relevance as an educator of understanding ACEs, Trauma, and Mental Illness, and the role of schools in reducing risk factors and increasing protective factors;

Outcome 2.3: Describe the relevant history of stigmatization and stereotyping associated with ACEs, Trauma, and Mental Illness, and their relationship to educational services;

Outcome 2.4: Identify and describe examples of ACEs, Trauma, and Mental Illness that will predictably be part of some of their PK-12 students' life experiences; and

Outcome 2.5: Describe the cultural implications associated with ACEs, Trauma, and Mental Illness.

Goal 3: Behavioral and Mental Health Literacy

Outcome 3.1: Describe the most common types of Mental Illness that PK-12 students may experience, including both internalizing and externalizing conditions;

Outcome 3.2: Explain the processes and general relationship between diagnosis via the Diagnostic and Statistical Manual V (DSM-V) and the classification system under the Individuals with Disabilities Education Act (IDEA);

Outcome 3.3: Identify and describe the roles of other relevant child-serving systems within communities that can be supportive to addressing matters associated with social, emotional, and behavioral wellness of PK-12 students (e.g., children's mental health and juvenile justice); and

Outcome 3.4: Identify and describe the requirements for schools (e.g., Student Assistance Program and Act 71) to support a youth who appears in emotional distress.

Goal 4: Prevention and Intervention to Support Social, Emotional, and Behavioral Wellness across PK-12 Educational Environments

Outcome 4.1: Describe the features of a Multi-Tiered System of Support (MTSS) framework to support social, emotional, and behavioral wellness;

Outcome 4.2: Plan and implement universal prevention strategies associated with the MTSS framework: February 2018 8 a. That are culturally responsive and address students' developmental social and emotional learning needs; and b. That are reflective of trauma-informed practices in the classroom with all students;

Outcome 4.3: Plan and implement (when necessary) approaches to de-escalate no crisis and crisis situations in the instance when the safety of students or others may be in jeopardy that reflect trauma-informed principles;

Outcome 4.4: Demonstrate an understanding of how to use academic and behavioral progress monitoring data (e.g., individual, classroom, school-wide) to support educational practice; and

Outcome 4.5: Participate in suicide prevention activities in alignment with the requirements of Act 71.

Goal 5: Collaboration with Families, Agencies, and the Community

Outcome 5.1: Demonstrate authentic collaboration with youth, families, school, and community partners regarding student social, emotional, or behavioral needs in simulated or actual contexts;

Outcome 5.2: Demonstrate culturally responsive approaches when communicating with family, school, and community partners regarding student social, emotional, or behavioral needs in simulated or actual contexts;

Outcome 5.3: Demonstrate the skills necessary to authentically engage youth in decision-making processes;

Outcome 5.4: Describe and comply with protections associated with confidentiality, including release of information; and

Outcome 5.5: Communicating and advocating for the social, emotional, and behavioral wellness of students PK-12 with police, initial responders, and other groups within the community.

Requirements

Code	Title	Hours
SPE 606	ThryInstrPract:Emot/Soc/Behav	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 611	Mental Health Literacy w/Field	3
SPE 614	SEB Wellness w/Field	3
Total Hours		12

Special Education MS Learning Goals and Outcomes

Initial Preparation Standard 1: Learner Development and Individual Learning Differences

1.0 Beginning special education professionals understand how exceptionalities may interact with development and learning and use this knowledge to provide meaningful and challenging learning experiences for individuals with exceptionalities.

Key Elements

1.1 Beginning special education professionals understand how language, culture, and family background influence the learning of individuals with exceptionalities.

1.2 Beginning special education professionals use understanding of development and individual differences to respond to the needs of individuals with exceptionalities.

Initial Preparation Standard 2: Learning Environments

2.0 Beginning special education professionals create safe, inclusive, culturally responsive learning environments so that individuals with exceptionalities become active and effective learners and develop emotional well being, positive social interactions, and self-determination.

Key Elements

2.1 Beginning special education professionals, through collaboration with general educators and other colleagues, create safe, inclusive, culturally responsive learning environments to engage individuals with exceptionalities in meaningful learning activities and social interactions.

2.2 Beginning special education professionals use motivational and instructional interventions to teach individuals with exceptionalities how to adapt to different environments.

2.3 Beginning special education professionals know how to intervene safely and appropriately with individuals with exceptionalities in crisis.

Initial Preparation Standard 3: Curricular Content Knowledge

3.0 Beginning special education professionals use knowledge of general and specialized curricula to individualize learning for individuals with exceptionalities.

Key Elements

3.1 Beginning special education professionals understand the central concepts, structures of the discipline, and tools of inquiry of the content areas they teach, and can organize this knowledge, integrate cross-disciplinary skills, and develop meaningful learning progressions for individuals with exceptionalities.

3.2 Beginning special education professionals understand and use general and specialized content knowledge for teaching across curricular content areas to individualize learning for individuals with exceptionalities.

3.3 Beginning special education professionals modify general and specialized curricula to make them accessible to individuals with exceptionalities.

Initial Preparation Standard 4: Assessment

4.0 Beginning special education professionals use multiple methods of assessment and data sources in making educational decisions

Key Elements

4.1 Beginning special education professionals select and use technically sound formal and informal assessments that minimize bias.

4.2 Beginning special education professionals use knowledge of measurement principles and practices to interpret assessment

results and guide educational decisions for individuals with exceptionalities.

4.3 Beginning special education professionals, in collaboration with colleagues and families, use multiple types of assessment information in making decisions about individuals with exceptionalities.

4.4 Beginning special education professionals engage individuals with exceptionalities to work toward quality learning and performance and provide feedback to guide them.

Initial Preparation Standard 5: Instructional Planning and Strategies

Key Elements

5.1 Beginning special education professionals consider individual abilities, interests, learning environments, and cultural and linguistic factors in the selection, development, and adaptation of learning experiences for individuals with exceptionalities.

5.2 Beginning special education professionals use technologies to support instructional assessment, planning, and delivery for individuals with exceptionalities.

5.3 Beginning special education professionals are familiar with augmentative and alternative communication systems and a variety of assistive technologies to support the communication and learning of individuals with exceptionalities.

5.4 Beginning special education professionals use strategies to enhance language development and communication skills of individuals with exceptionalities.

5.5 Beginning special education professionals develop and implement a variety of education and transition plans for individuals with exceptionalities across a wide range of settings and different learning experiences in collaboration with individuals, families, and teams.

5.6 Beginning special education professionals teach to mastery and promote generalization of learning.

5.7 Beginning special education professionals teach cross-disciplinary knowledge and skills such as critical thinking and problem solving to individuals with exceptionalities.

Initial Preparation Standard 6: Professional Learning and Ethical Practice

6.0 Beginning special education professionals use foundational knowledge of the field and their professional ethical principles and practice standards to inform special education practice, to engage in lifelong learning, and to advance the profession.

Key Elements

6.1 Beginning special education professionals use professional ethical principles and professional practice standards to guide their practice.

6.2 Beginning special education professionals understand how foundational knowledge and current issues influence professional practice.

6.3 Beginning special education professionals understand that diversity is a part of families, cultures, and schools, and that

complex human issues can interact with the delivery of special education services.

6.4 Beginning special education professionals understand the significance of lifelong learning and participate in professional activities and learning communities.

6.5 Beginning special education professionals advance the profession by engaging in activities such as advocacy and mentoring.

6.6 Beginning special education professionals provide guidance and direction to paraeducators, tutors, and volunteers.

Initial Preparation Standard 7: Collaboration

7.0 Beginning special education professionals collaborate with families, other educators, related service providers, individuals with exceptionalities, and personnel from community agencies in culturally responsive ways to address the needs of individuals with exceptionalities across a range of learning experiences.

Key Elements

7.1 Beginning special education professionals use the theory and elements of effective collaboration.

7.2 Beginning special education professionals serve as a collaborative resource to colleagues.

7.3 Beginning special education professionals use collaboration to promote the well being of individuals with exceptionalities across a wide range of settings and collaborators.

Requirements

Code	Title	Hours
Core Requirements		
SPE 600	Found & Current Issues w/Field	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 700	SpecialEducation Law/Policy	3
Electives:		18
SPE 603	Thry&Instr High Incid w/Field	
SPE 604	Research:Lit,Writ,Lang w/Field	
SPE 605	RsrchBasedModel:MathSciencePro	
SPE 606	ThryInstrPract:Emot/Soc/Behav	
SPE 607	ThryInstrPractStdntsw/LowIncid	
SPE 611	Mental Health Literacy w/Field	
SPE 626	Assess/ProgMonitorPK12 w/Field	
SPE 701	Cog Proc: Resrch Brain Studies	
SPE 702	Culturally Responsive Teaching	
SPE 720	Intro ASD: Caus Diag & Advoc	
SPE 721	Aug & Alt Com & Soc Stratg	
SPE 722	Evid Based Prac: AI&I Method	
SPE 723	Autism: Behv Manag Approaches	
SPE 710	WRP. Intro Multisens Lang Inst	
SPE 711	WRP. Int Instr- NonRepsRdr 1-3	
SPE 712	WRP. Int Instr- NonRepsRdr 4-6	
SPE 713	WRP. Int Instr- NonRepsRdrPrac	

SPE 608	Families Schls & Cmnty w/Field
SPE 614	SEB Wellness w/Field

Total Hours

30

Special Education PK-12 MS Learning Goals and Outcomes

Initial Preparation Standard 1: Learner Development and Individual Learning Differences

1.0 Beginning special education professionals understand how exceptionalities may interact with development and learning and use this knowledge to provide meaningful and challenging learning experiences for individuals with exceptionalities.

Key Elements

1.1 Beginning special education professionals understand how language, culture, and family background influence the learning of individuals with exceptionalities.

1.2 Beginning special education professionals use understanding of development and individual differences to respond to the needs of individuals with exceptionalities.

Initial Preparation Standard 2: Learning Environments

2.0 Beginning special education professionals create safe, inclusive, culturally responsive learning environments so that individuals with exceptionalities become active and effective learners and develop emotional well being, positive social interactions, and self-determination.

Key Elements

2.1 Beginning special education professionals, through collaboration with general educators and other colleagues, create safe, inclusive, culturally responsive learning environments to engage individuals with exceptionalities in meaningful learning activities and social interactions.

2.2 Beginning special education professionals use motivational and instructional interventions to teach individuals with exceptionalities how to adapt to different environments.

2.3 Beginning special education professionals know how to intervene safely and appropriately with individuals with exceptionalities in crisis.

Initial Preparation Standard 3: Curricular Content Knowledge

3.0 Beginning special education professionals use knowledge of general and specialized curricula to individualize learning for individuals with exceptionalities.

Key Elements

3.1 Beginning special education professionals understand the central concepts, structures of the discipline, and tools of inquiry of the content areas they teach, and can organize this knowledge, integrate cross-disciplinary skills, and

develop meaningful learning progressions for individuals with exceptionalities.

3.2 Beginning special education professionals understand and use general and specialized content knowledge for teaching across curricular content areas to individualize learning for individuals with exceptionalities.

3.3 Beginning special education professionals modify general and specialized curricula to make them accessible to individuals with exceptionalities.

Initial Preparation Standard 4: Assessment

4.0 Beginning special education professionals use multiple methods of assessment and data sources in making educational decisions

Key Elements

4.1 Beginning special education professionals select and use technically sound formal and informal assessments that minimize bias.

4.2 Beginning special education professionals use knowledge of measurement principles and practices to interpret assessment results and guide educational decisions for individuals with exceptionalities.

4.3 Beginning special education professionals, in collaboration with colleagues and families, use multiple types of assessment information in making decisions about individuals with exceptionalities.

4.4 Beginning special education professionals engage individuals with exceptionalities to work toward quality learning and performance and provide feedback to guide them.

Initial Preparation Standard 5: Instructional Planning and Strategies

Key Elements

5.1 Beginning special education professionals consider individual abilities, interests, learning environments, and cultural and linguistic factors in the selection, development, and adaptation of learning experiences for individuals with exceptionalities.

5.2 Beginning special education professionals use technologies to support instructional assessment, planning, and delivery for individuals with exceptionalities.

5.3 Beginning special education professionals are familiar with augmentative and alternative communication systems and a variety of assistive technologies to support the communication and learning of individuals with exceptionalities.

5.4 Beginning special education professionals use strategies to enhance language development and communication skills of individuals with exceptionalities.

5.5 Beginning special education professionals develop and implement a variety of education and transition plans for individuals with exceptionalities across a wide range of settings and different

learning experiences in collaboration with individuals, families, and teams.

5.6 Beginning special education professionals teach to mastery and promote generalization of learning.

5.7 Beginning special education professionals teach cross-disciplinary knowledge and skills such as critical thinking and problem solving to individuals with exceptionalities.

Initial Preparation Standard 6: Professional Learning and Ethical Practice

6.0 Beginning special education professionals use foundational knowledge of the field and their professional ethical principles and practice standards to inform special education practice, to engage in lifelong learning, and to advance the profession.

Key Elements

6.1 Beginning special education professionals use professional ethical principles and professional practice standards to guide their practice.

6.2 Beginning special education professionals understand how foundational knowledge and current issues influence professional practice.

6.3 Beginning special education professionals understand that diversity is a part of families, cultures, and schools, and that complex human issues can interact with the delivery of special education services.

6.4 Beginning special education professionals understand the significance of lifelong learning and participate in professional activities and learning communities.

6.5 Beginning special education professionals advance the profession by engaging in activities such as advocacy and mentoring.

6.6 Beginning special education professionals provide guidance and direction to paraeducators, tutors, and volunteers.

Initial Preparation Standard 7: Collaboration

7.0 Beginning special education professionals collaborate with families, other educators, related service providers, individuals with exceptionalities, and personnel from community agencies in culturally responsive ways to address the needs of individuals with exceptionalities across a range of learning experiences.

Key Elements

7.1 Beginning special education professionals use the theory and elements of effective collaboration.

7.2 Beginning special education professionals serve as a collaborative resource to colleagues.

7.3 Beginning special education professionals use collaboration to promote the well being of individuals with exceptionalities across a wide range of settings and collaborators.

Requirements

Certification Requirements PK-12

- GPA
- Pass Special Education: Core Knowledge and Applications (5354).

Code	Title	Hours
SPE 600	Found & Current Issues w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
SPE 603	Thry&Instr High Incid w/Field	3
SPE 604	Research:Lit,Writ,Lang w/Field	3
SPE 605	RsrchBasedModel:MathSciencePro	3
SPE 606	ThryInstrPract:Emot/Soc/Behav	3
SPE 607	ThryInstrPractStdntsw/LowIncid	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
Elective		3
SPE 645	Student Teaching Certification	1
Total Hours		31

Masters' Degree and Special Education PK-12 Certification Program for individuals who do not have an Initial Teaching Certification, only a Bachelor's Degree.

Code	Title	Hours
SPE 600	Found & Current Issues w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
SPE 603	Thry&Instr High Incid w/Field	3
SPE 604	Research:Lit,Writ,Lang w/Field	3
SPE 605	RsrchBasedModel:MathSciencePro	3
SPE 606	ThryInstrPract:Emot/Soc/Behav	3
SPE 607	ThryInstrPractStdntsw/LowIncid	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
One Elective		3
SPE 646	Student Teaching Certification	6
Total Hours		36

Concentration Option

Code	Title	Hours
Autism Spectrum Disorders		12
SPE 720	Intro ASD: Caus Diag & Advoc	
SPE 721	Aug & Alt Com & Soc Stratg	
SPE 722	Evid Based Prac: AI&I Method	
SPE 723	Autism: Behv Manag Approches	

Special Education PK-12 Post Master's Certificate

Code	Title	Hours
SPE 600	Found & Current Issues w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
SPE 604	Research:Lit,Writ,Lang w/Field	3
SPE 605	RsrchBasedModel:MathSciencePro	3

SPE 606	ThryInstrPract:Emot/Soc/Behav	3
SPE 607	ThryInstrPractStdntsw/LowIncid	3
SPE 608	Families Schls & Cmnty w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 645	Student Teaching Certification	1
Total Hours		25

Special Education Studies Minor

A minor in Special Education Studies is available for undergraduates who are interested in building a foundation in special education without pursuing Pennsylvania Department of Education certification.

Requirements

Code	Title	Hours
Required Core		
SPE 160	Intro to Special Edu w/Field	3
SPE 379	Fam School & Comm:Diverse Soc	3
SPE 205	Inclusive Classrooms w/ Field	3
Select three other courses from the list below:		9
SPE 320	Progress Monitoring w/ Field	
SPE 329	High Incid Disabil w/Field	
SPE 339	Low Incid Disabil w/Field	
SPE 349	Literacy Intervention w/Field	
SPE 359	Math & Content Interv w/Field	
SPE 369	Emot-Beh'l Disabil w/Field	
Total Hours		18

Supervisor of Special Education Graduate Certificate

The Supervisor of Special Education Graduate Certificate requires four courses. Students are urged to maintain continued contact with the Special Education Graduate Program Advisor to assure certification program compliance.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of and the ability to promote the success of all PK-12 students by facilitating the shared school vision of learning supported by the stakeholders.

Outcome 1.1: The student will collaboratively develop a shared vision of learning for a school that promotes the success of all PK-12 students.

Outcome 1.2: The student will articulate the components of this vision for a school and the leadership processes necessary to implement and support the vision.

Goal 2: The students will demonstrate an understanding of how to articulate a plan for a school culture that is conducive to PK-12 student learning.

Outcome 2.1: The student will create and evaluate a comprehensive, rigorous, and coherent curricular and instructional school program.

Outcome 2.2: The student will develop a plan for the future supervision of the instructional and leadership capacity.

Goal 3: The student will demonstrate an understanding of the role of Special Education within the school and school district.

Outcome 3.1: The student will demonstrate knowledge of the needs of Special Education programs in relation to budgeting and curriculum and instruction.

Outcome 3.2: The student will demonstrate an understanding of standardized testing results for students with IEPs.

Requirements

Code	Title	Hours
SPE 622	Admin & Supv:Spec Ed Progs	3
SPE 623	Advanced Fieldwork/Seminar	3
SPE 624	Adv Super & Curr Fieldwk/Sem	3
SPE 700	SpecialEducation Law/Policy	3
Total Hours		12

Teacher Education

The Department of Teacher Education offers undergraduate and graduate programs leading to a PA Instructional 1 Teaching Certification. Undergraduate programs leading to Instructional 1 Teaching Certification include Elementary Grades PK4, with the option to add grades 5 and 6 with additional testing, Elementary and Middle Grades 4-8, Secondary Grades 7-12, Art Education PK12 and Foreign Language PK12. Graduate programs leading to certification include Elementary Grades PK4, Elementary and Middle Grades 4-8, Secondary Grades 7-12, Art Education PK12, and Foreign Language PK12. The department also offers an MS in Reading Specialist leading to an initial Instructional 1 Teaching Certification and an ESL Program leading to a PDE Program Specialist Certificate. All programs leading to Instructional 1 Teaching Certification offered in the Department of Teacher Education are approved by the Pennsylvania Department of Education.

The department also offers an undergraduate program in Child and Family Studies as a major, Educational Studies as a minor, and an MS in Curriculum and Instruction. These three programs do not lead to certification for teaching. All our programs connect theory, research, and practice aimed at preparing innovative teachers, critical thinkers, curriculum and educational specialists who practice social justice in education. Our programs teach future educators and educational specialists critical aspects of education — from empowering students to be critical thinkers and being responsive to different forms of diversity among learners to adapting instruction for individual and special needs. Students work closely with distinguished faculty and have several field experiences observing and working in PK12 classrooms beginning with their first semester.

Faculty

Faculty members are experts and scholars in their field and have extensive knowledge of areas in education such as multicultural classrooms, urban teaching, assistive technology, literacy studies, mathematical writing. They are eager to apply their experience to the classroom and support students throughout their courses and field work.

Department of Teacher Education Faculty & Staff (<https://www.sju.edu/departments/teacher-education/faculty-staff/>)

Programs Undergraduate Majors

- Child and Family Studies (p. 297)
- Education PK-4 and Special Education Dual Major (p. 300)
- Elementary/Middle Grades (4-8) (p. 302) Education (p. 302)
- Elementary Education (Pre K-4) (p. 307)
- PK-12 Education (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/prek-12-major/>)
- Secondary Education (7-12) Major (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)

Undergraduate Minor

- Educational Studies (p. 302)

Graduate

- Art Education (p. 296)
- Curriculum & Instruction (p. 299)
- Elementary/Middle Grades (4-8) (p. 305) Education (p. 305)
- Elementary Education (PK-4) (p. 306)
- Reading Specialist (p. 310)
- Secondary Education (7-12) (p. 311)
- World Languages PK-12 Education (p. 309)

Graduate Certificate

- English as Second Language (p. 309)
- Reading Specialist (p. 310)

Art Education MS

The art education PK12 program at Saint Joseph's University is approved by Pennsylvania Department of Education and prepares art teachers for PK12 classrooms. This program helps candidates develop the necessary skills for effective teaching of art, while broadening the range of understanding of the art curriculum in PK12 schools. Candidates will be able to combine theory and practice through coursework and field experiences in PK12 classrooms.

The art education PK12 program is accredited and aligned with the Pennsylvania Department of Education requirements for level I teacher certification in Art Education PK12.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of PK12 learner development.

Outcome 1.1: The student will acquire knowledge of key concepts, principles, theories, and research about learner development in social and classroom contexts.

Outcome 1.2: The student will identify the diverse developmental needs and abilities of learners and use this information effectively when selecting instructional strategies and making curricular decisions.

Goal 2: The student will examine and use the central concepts, standards, research, and structures of content to plan and implement a curriculum that develops all school learners' competence in art education.

Outcome 2.1: The student will describe and explain the philosophical and historical foundations of comprehensive school education and apply this knowledge in analyzing school culture and climate, classroom management, and instructional design.

Goal 3: The student will use developmentally appropriate instructional strategies for teaching and learning art.

Outcome 3.1: The student will describe and analyze a range of specific teaching strategies and apply them appropriately in instructional planning, modifying their use based on the unique learning needs of PK12 school students and the particular demands of art education.

Outcome 3.2: The student will demonstrate a practiced habit of self-analysis and collaboration with students and colleagues to assess the impact of instruction on student motivation and learning and will adjust teaching accordingly.

Goal 4: The student will demonstrate understanding and appropriate use of multiple methods of assessment.

Outcome 4.1: The student will define and describe types of valid and reliable educational assessments (including screening, diagnostic, formative, summative, and authentic) and identify strengths, weaknesses, and appropriate uses associated with each.

Outcome 4.2: The student will analyze and interpret assessment data to understand patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to learners and their guardians.

Goal 5: The student will demonstrate knowledge of culturally responsive education and an understanding of teaching art for social justice.

Outcome 5.1: The student will demonstrate the ability to interact positively and respectfully with those of different racial, ethnic, language and socioeconomic backgrounds and sexual orientations.

Outcome 5.2: The student will identify and describe practices and policies that reinforce inequalities and undermine high school student learning, as well as steps that can be taken to challenge such practices in order to create a more just society.

Requirements

Code	Title	Hours
EDU 550	His & Contemp Persp Ed w/Field	3
EDU 557	Adolescent Psychology w/ Field	3
EDU 646	Language and Culture w/ Field	3
EDU 647	Literacy & Lrn Acr Cur w/Field	3
EDU 622	Instr Tech Art Ed w/Field	3
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
EDU 692	PK12 Student Teaching	6
Total Hours		30

Child and Family Studies Major

The Child and Family Studies major prepares students to work with children and families throughout the lifespan in a broad range of settings. The program is designed to provide a thorough understanding of how to work with children and families in multiple contexts. The program includes child and family development classes that include diversity in families, the impact of stress and trauma, and emotional and behavioral considerations when working with children and families. Professional skill development is an essential part of the program and intended to give students the theoretical knowledge and practical skills needed by child and family services specialists be they future educators, educational specialists, social workers, or counselors.

Learning Goals and Outcomes

Standard #1: Young Children's Development. The practitioner understands how young children grow and develop, recognizing that patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas, and designs and implements developmentally appropriate and challenging learning experiences.

Standard #2: Diversity and Differences. The practitioner uses understanding of individual differences and diversity among children and families to ensure inclusion in multiple contexts.

Standard #3: Developmentally Appropriate Environments. The practitioner works with others to create environments that support individuals and families, and that encourage positive social interaction, active engagement and social interaction.

Standard #4: Content Knowledge. The practitioner understands the central concepts, tools of inquiry, and structures of the discipline(s) and creates learning experiences that make the discipline accessible and meaningful for young children and families to assure mastery of the content.

Standard #5: Application of Content and Assessment. The practitioner understands how to connect concepts and use differing perspectives to engage young children in critical thinking, creativity, and collaborative problem solving. He/she uses multiple methods of assessment to engage young children in their own growth, to monitor progress, and to guide his/her decision making.

Standard #6: Professional Learning and Leadership. The practitioner engages in ongoing professional learning, uses evidence to continually evaluate his/her practice, and adapts practice to meet the needs of each young child. The practitioner also seeks appropriate leadership roles and opportunities to collaborate with young children, families, colleagues, other professionals, and community members.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		

Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.	
Philosophy Level One	3
Philosophy Level Two	3
Theology & Religious Studies Requirements	
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.	
Theology	3
Religious Studies	3
Diversity & INT 151 Requirements	
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years	
Diversity	3
INT 151	Inequality in American Society 1
Math & Natural Science Requirements	
If approved, Math & Natural Science Requirements may count toward overlay requirements.	
Mathematics	3-4
Natural Science	4
Social Science Requirement	
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	

47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EDU 150	Schools in Society w/ Field	
Social Science		
EDU 151	Cognition & Learning w/ Field	
Writing Intensive		
EDU 151	Cognition & Learning w/ Field	
Mission-Overlay		
SPE 160	Intro to Special Edu w/Field	

Major Requirements

Code	Title	Hours
CFS 101	Intro to Child &Family Studies	3
EDU 121	Child Development	3
EDU 150	Schools in Society w/ Field	3
EDU 151	Cognition & Learning w/ Field	3
SPE 160	Intro to Special Edu w/Field	3
CFS 290	CFS Professional Prep Seminar	1
CFS 350	Crgvr Prof Prtnrshps &Advocacy	3
CFS 400	Internship: Child & Family St	3

Select three courses: 9

Teaching and Learning		
EDU 155	Found of Early Child w/ Field	
EDU 231	Assessment and Evaluation	
EDU 246	Language and Culture w/ Field	

Social Emotional Development, Mental Health, and Health		
EDU 241	Soc/Emo Dev/Lrn: Erly Chld	
EDU 345	Trauma in Infan & Early Child	
SPE 205	Inclusive Classrooms w/ Field	

Communities, Systems, and Advocacy		
EDU 157	Adolescent Development w/Field	
SPE 379	Fam School & Comm:Diverse Soc	
EDU 246	Language and Culture w/ Field	

Total Hours 31

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CFS 101	Intro to Child &Family Studies	3
or EDU 150	or Schools in Society w/ Field	
EDU 121	Child Development	3
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
Non-Native Language		3-4
World History		3

Hours 16-17

Spring		
EDU 151	Cognition & Learning w/ Field	3
CFS Concentration Course 1		3
Philosophy Level One		3
Mathematics		3-4
Free Elective		3
Hours		15-16
Sophomore		
Fall		
CFS 101 or EDU 150	Intro to Child & Family Studies or Schools in Society w/ Field	3
Literature		3
Theology		3
Free Electives		6
Hours		15
Spring		
CFS 290	CFS Professional Prep Seminar	1
CFS Concentration Course 2		3
Philosophy Level Two		3
Free Electives		6
Hours		13
Junior		
Fall		
SPE 160	Intro to Special Edu w/Field	3
CFS Concentration Course 3 or Elective		3
Natural Science		4
Free Electives		6
Hours		16
Spring		
CFS 350	Crgvr Prof Ptnrshps & Advocacy	3
Religious Studies		3
Free Electives		9
Hours		15
Senior		
Fall		
Fine & Performing Arts, Design & Creativity		3
CFS Concentration Course 3 or Elective		3
Free Electives		9
Hours		15
Spring		
CFS 400	Internship: Child & Family St	3
Free Electives		9-12
Hours		12-15
Total Hours		117-122

Curriculum & Instruction MS

Saint Joseph's University's Master of Science in Curriculum and Instruction is designed to meet the professional needs of candidates/educators interested in expanding their knowledge of curriculum theory and advancing their skills in curriculum development for a diverse student population. The core program is grounded in knowledge of curriculum theory, how to develop curriculum and instruction that meet the needs of diverse learners in varied educational settings, how to assess and evaluate curriculum and instruction, how to integrate technology into innovative curricula, and how to conduct research for generating new knowledge that advances curriculum and instruction for educational equity and inclusion. The program attends to the needs of certified teachers, STEM teachers and professionals working in the field of education, literacy specialists and coaches and curricula coordinators working in traditional and non-traditional school settings, and special

education specialists and teachers working in schools or in alternative educational settings.

Note: This degree does not lead to teacher certification.

Learning Goals and Outcomes

Goal 1: Gain historical knowledge of curriculum theory in relation to current trends in education

Outcome 1.1: Examine contemporary curriculum theories in education

Outcome 1.2: Identify challenges faced by current educators and education specialists

Outcome 1.3: Explore basic assumptions that influence current educational policy and curricula reform.

Goal 2: Design inclusive curriculum and instruction for diverse learners

Outcome 2.1: Gain knowledge and skills on how to design curriculum and instruction

Outcome 2.2: Identify strategies that respond to the needs of diverse learners in educational settings.

Goal 3: Analyze and evaluate research in curriculum and instruction

Outcome 3.1: Review current and emerging research in curriculum, instruction and assessment

Outcome 3.2: Evaluate texts and learning resources

Outcome 3.3: Examine research on test data, curriculum standards and assessment practices

Outcome 3.4: Conduct research on any one area of curriculum and instruction

Goal 4: Integrate technology and innovation

Outcome 4.1: Identify and integrate technology into curriculum and instruction

Outcome 4.2: Plan learning opportunities that drive innovation across organizations

Requirements

The program consists of six core courses and additional four courses in the candidate's concentration area.

Core Requirements

Code	Title	Hours
EDU 600	Curriculum Theory	3
EDU 631	Assessment & Evaluation 7-12	3
EDU 716	Cultural Diversity in Classrooms	3
or EDU 646	Language and Culture w/ Field	
or SPE 702	Culturally Responsive Teaching	
EDU 650	Curriculum Development & Pract	3
EDU 690	Curriculum & Instruction Sem.	3
EDL 685	Instructional Design Contemp	3
Total Hours		18

Concentration Requirements

Code	Title	Hours
STEM Education Concentration:		
EDU 660	Integrated STEM Education	3
EDU 627	Theory & Pr Sec Mat/Sc w/Field	3
EDU 616	Instr Techniq Math w/Field	3
or EDU 618	Instr Techniq Science w/Field	
or EDU 621	Instruct Techniq: Comp Sci Edu	
EDU 620	Tech& Innovation in Curriculum	3
Total Hours		12

Code	Title	Hours
English as a Second Language Teaching Concentration:		
EDU 710	English Linguistics	3
EDU 712	Topics in Language Acquisition	3
EDU 713	Method Teach English Sec Lang	3
EDU 714	ESL/Bilin Inst Prac w/Field	4
Total Hours		13

Code	Title	Hours
Literacy Concentration:		
EDU 700	Psychology of Literacy	3
SPE 604	Research:Lit,Writ,Lang w/Field	3
EDU 703	Crit Exp of Literacy Research	3
EDU 704	Plng & Org a Literacy Program	3
Total Hours		12

Code	Title	Hours
Supervisor for Special Education Concentration:		
** The Supervisor for Special Education requires Special Education Teacher Certification and 5 years of Special Education Teaching experience.		
SPE 700	SpecialEducation Law/Policy	3
SPE 622	Admin & Supv:Spec Ed Progs	3
SPE 623	Advanced Fieldwork/Seminar	3
SPE 624	Adv Super & Curr Fieldwk/Sem	3
Total Hours		12

Education PK-4 and Special Education Dual Major

The dual major prepares teachers for teaching in Elementary PK4 and Special Education PK12 grades. The Elementary Education PK4 major leading to Instructional Level 1 Teacher Certification, is an accredited program approved by the Pennsylvania Department of Education (PDE) and is aligned with the requirements for teacher certification in PK4. Students will also engage with content and pedagogical approaches relevant to grades 5 and 6 which enables them to add certification to teach grades 5 and 6 with additional testing. Throughout the Elementary Education PK4 program, students integrate theory with practice through coursework and field experiences in PK4 classrooms.

Students in the PK4 program have the option to add the Special Education PK12 major to their program of study. The Special Education PK12 program leading to Instructional Level 1 Instructional Teacher Certification is aligned with the Pennsylvania Department of Education

requirements for teacher certification for Special Education PK12 grades and for serving the needs of learners of all abilities. In all our teacher preparation programs leading to Instructional Level 1 Teacher Certification, in-class coursework is combined with weekly field experiences in local PK12 classrooms starting with the first semester of study to give students hands-on experience for teaching young learners.

The undergraduate Teacher Education and Special Education programs are built upon a strong liberal arts curriculum provided through the General Education Program (GEP) at Saint Joseph's University. This enables students to integrate their understanding of interdisciplinary content with an understanding of developmentally appropriate pedagogy.

Special Education PK-12 must be a dual major with Elementary PK-4.

Learning Goals and Outcomes

Goal 1: Students will demonstrate knowledge of PK-12 learner development and curricular content

Outcome 1.1: The student will be able to identify individual differences and to respond to the needs of individuals with exceptionalities.

Outcome 1.2: The student will be able to use general and specialized content knowledge for teaching across curricular content areas to individualize learning for individuals with exceptionalities.

Goal 2: Students will demonstrate the ability to create positive PK-12 learning environments

Outcome 2.1: The student will demonstrate the ability to use motivational and instructional interventions to teach individuals with exceptionalities how to adapt to different environments.

Outcome 2.2: The student will demonstrate an understanding of ways to collaborate with general educators and other colleagues to create safe, inclusive, culturally responsive learning environments to engage individuals with exceptionalities in meaningful learning activities and social interactions.

Goal 3: Students will demonstrate the use of assessment for diagnosis and progress monitoring

Outcome 3.1: The student will be able to select and use technically sound formal and informal assessments that minimize bias.

Outcome 3.2: The student will assess performance and provide feedback.

Goal 4: Students will demonstrate knowledge of research-based instructional planning and strategies

Outcome 4.1: The student will be able to identify an individual's abilities, interests, learning environments, and cultural and linguistic factors in the selection, development, and adaptation of learning experiences for individuals with exceptionalities.

Outcome 4.2: The student will be able to use strategies and technology to enhance language development and communication skills of individuals with exceptionalities.

Goal 5: Students will demonstrate knowledge of professional ethical practice

Outcome 5.1: The student will demonstrate an understanding that diversity is a part of families, cultures, and schools, and that complex human issues can interact with the delivery of special education services.

Outcome 5.2: The student will demonstrated the ability to develop a variety of education and transition plans for individual with exceptionalities across a wide range of settings and different learning experiences in collaboration with individuals, families and teams.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student’s Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student’s Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student’s overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student’s Mission Overlay requirement.		
Literature Requirement		

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EDU 150	Schools in Society w/ Field	
Social Science		
EDU 151	Cognition & Learning w/ Field	
Writing Intensive		
EDU 151	Cognition & Learning w/ Field	
Mission-Overlay		
SPE 160	Intro to Special Edu w/Field	

Major Requirements

(Special Education PK-12 must be a double major with Elementary PK-4)

Code	Title	Hours
EDU 121	Child Development	3
EDU 150	Schools in Society w/ Field	3
EDU 151	Cognition & Learning w/ Field	3
EDU 155	Found of Early Child w/ Field	3
EDU 231	Assessment and Evaluation	3
EDU 232	Literacy/Literature I w/ Field	3
EDU 246	Language and Culture w/ Field	3
EDU 265	Teaching Math in PK2 w/ Field	3
EDU 340	Literacy/Literature II w/Field	3
EDU 362	Soc Stud Thru Arts PK4 w/Field	3
EDU 363	Science Methods PK-4 w/ Field	3
EDU 366	Teaching Math Gr. 3-6 w/Field	3
EDU 498	Dual Major Student Teaching	6
SPE 160	Intro to Special Edu w/Field	3
SPE 205	Inclusive Classrooms w/ Field	3
SPE 320	Progress Monitoring w/ Field	3
SPE 329	High Incid Disabil w/Field	3
SPE 339	Low Incid Disabil w/Field	3
SPE 349	Literacy Intervention w/Field	3
SPE 359	Math & Content Interv w/Field	3
SPE 369	Emot-Beh'l Disabil w/Field	3

SPE 379	Fam School & Comm:Diverse Soc	3
SPE 495	Special Ed. Student Teaching	6
Total Hours		75

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
EDU 150	Schools in Society w/ Field	3
EDU 121	Child Development	3
ENG 101	Craft of Language	3
World History		3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		16-17
Spring		
EDU 151	Cognition & Learning w/ Field	3
EDU 155	Found of Early Child w/ Field	3
Literature		3
Mathematics		3-4
Philosophy Level One		3
Hours		15-16
Sophomore		
Fall		
EDU 231	Assessment and Evaluation	3
EDU 246	Language and Culture w/ Field	3
SPE 160	Intro to Special Edu w/Field	3
MAT 111	The Mathematics of Patterns	3
Philosophy Level Two		3
Hours		15
Spring		
EDU 232	Literacy/Literature I w/ Field	3
EDU 265	Teaching Math in PK2 w/ Field	3
SPE 205	Inclusive Classrooms w/ Field	3
Natural Science		4
Philosophy Level Two		3
Hours		16
Junior		
Fall		
EDU 340	Literacy/Literature II w/Field	3
EDU 366	Teaching Math Gr. 3-6 w/ Field	3
SPE 320	Progress Monitoring w/ Field	3
SPE 329	High Incid Disabil w/Field	3
SPE 369	Emot-Beh'l Disabil w/Field	3
Hours		15
Spring		
EDU 362	Soc Stud Thru Arts PK4 w/Field	3
EDU 363	Science Methods PK-4 w/ Field	3
SPE 339	Low Incid Disabil w/Field	3
SPE 359	Math & Content Interv w/Field	3
Hours		12
Senior		
Fall		
Theology		3
Religious Studies		3

Fine & Performing Arts, Design & Creativity		3
Free Electives		3-6
Hours		12-15
Spring		
EDU 498	Dual Major Student Teaching	6
SPE 495	Special Ed. Student Teaching	6
SPE 379	Fam School & Comm:Diverse Soc	3
Hours		15
Total Hours		116-121

Educational Studies Minor

A minor in educational studies at Saint Joseph’s University is designed for undergraduates who are interested in building a base in education without earning Pennsylvania Department of Education (PDE) certification. Students will take classes in child and adolescent psychology, cognition and learning, language and culture, assessment and evaluation and more.

Students in the Elementary Education PK4, Middle Grades Education, Secondary Education, PK12 Education, and Child and Family Studies programs may not opt for a Minor in Educational Studies.

The Educational Studies Minor does not lead to teacher certification.

Requirements

Code	Title	Hours
Required Core Courses		
EDU 150	Schools in Society w/ Field	3
EDU 246	Language and Culture w/ Field	3
EDU 471	Writing in the Classroom	3
Select One Developmental Course		3
EDU 121	Child Development	
EDU 151	Cognition & Learning w/ Field	
EDU 157	Adolescent Development w/Field	
Select Two Additional Courses		6
EDU 155	Found of Early Child w/ Field	
EDU 231	Assessment and Evaluation	
or EDU 230	Eval: Secondary Grades 7-12	
EDU 232	Literacy/Literature I w/ Field	
EDU 247	Literacy in Cont Areas w/Field	
SPE 160	Intro to Special Edu w/Field	
SPE 205	Inclusive Classrooms w/ Field (SPE 160 is a prerequisite)	
Total Hours		18

Substitutions may be made only with the advance approval of the Chair of the Teacher Education Department. Except for EDU 471, undergraduates are not permitted to enroll in upper level courses (300 and 400 level) without having satisfied the basic skills requirement.

Elementary/Middle Grades (4-8) Education Major

The Elementary/Middle Grades (4-8) Education major is an accredited program approved by the Pennsylvania Department of Education (PDE) requirements for teacher certification in Grade 4-8. The program is aligned with PDE requirements for certification. Throughout the program,

students integrate theory with practice through coursework and field experiences in 4-8 classrooms in local schools.

The undergraduate Teacher Education programs are built upon a strong liberal arts curriculum provided through the Cornerstone Core Curriculum (CCC) at Saint Joseph's University. This enables students to integrate their understanding of interdisciplinary content with an understanding of developmentally appropriate pedagogy.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of young adolescent learner development.

Outcome 1.1: The student will understand and accurately interpret key concepts, principles, theories, and research about young adolescent development in social context.

Outcome 1.2: The student will identify the diverse developmental needs and abilities of 4-8 learners.

Goal 2: The student will understand and use the central concepts, standards, research, and structures of content to plan and implement curriculum that develops all young adolescents' competence in subject matter.

Outcome 2.1: The student will describe and explain the philosophical foundations of middle level education and apply this knowledge in analyzing classroom management and instructional design.

Goal 3: The student will understand and use developmentally appropriate instructional strategies.

Outcome 3.1: The student will describe and analyze a range of specific teaching strategies and apply them appropriately in instructional planning, modifying their use based on the unique learning needs of middle school students.

Outcome 3.2: The student will demonstrate a practiced habit of self-analysis and collaboration with students and colleagues to assess the impact of instruction on student motivation and learning and will adjust teaching accordingly.

Goal 4: The student will demonstrate understanding and effective use of multiple methods of assessment.

Outcome 4.1: The student will define and describe types of valid and reliable educational assessments (including screening, diagnostic, formative, summative, and authentic) and identify strengths, weaknesses, and appropriate uses associated with each.

Outcome 4.2: The student will analyze and interpret assessment data to understand patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to learners and their guardians.

Goal 5: The student will demonstrate an understanding of educating for social justice.

Outcome 5.1: The student will describe key elements of interacting positively and respectfully with those of different racial, ethnic, language, and socioeconomic backgrounds and sexual orientations.

Outcome 5.2: The student will identify and describe practices and policies that reinforce inequalities and undermine 4-8 student

learning, as well as steps that can be taken to challenge such practices in order to create a more just society.

INTASC Standards

Standard #1: Learner Development. The teacher understands how learners grow and develop, recognizing that patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas, and designs and implements developmentally appropriate and challenging learning experiences.

Standard #2: Learning Differences. The teacher uses understanding of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

Standard #3: Learning Environments. The teacher works with others to create environments that support individual and collaborative learning, and that encourage positive social interaction, active engagement in learning, and self motivation.

Standard #4: Content Knowledge. The teacher understands the central concepts, tools of inquiry, and structures of the discipline(s) he or she teaches and creates learning experiences that make the discipline accessible and meaningful for learners to assure mastery of the content.

Standard #5: Application of Content. The teacher understands how to connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

Standard #6: Assessment. The teacher understands and uses multiple methods of assessment to engage learners in their own growth, to monitor learner progress, and to guide the teacher's and learner's decision making.

Standard #7: Planning for Instruction. The teacher plans instruction that supports every student in meeting rigorous learning goals by drawing upon knowledge of content areas, curriculum, cross-disciplinary skills, and pedagogy, as well as knowledge of learners and the community context.

Standard #8: Instructional Strategies. The teacher understands and uses a variety of instructional strategies to encourage learners to develop deep understanding of content areas and their connections, and to build skills to apply knowledge in meaningful ways.

Standard #9: Professional Learning and Ethical Practice. The teacher engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effects of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Standard #10: Leadership and Collaboration. The teacher seeks appropriate leadership roles and opportunities to take responsibility for student learning, to collaborate with learners, families, colleagues, other school professionals, and community members to ensure learner growth, and to advance the profession.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours **47-49**

Recommended CCC Courses

Code	Title	Hours
Literature		
ENG Literature Course		
Diversity		
EDU 150	Schools in Society w/ Field	
Social Science		
EDU 151	Cognition & Learning w/ Field	
Writing Intensive		
EDU 151	Cognition & Learning w/ Field	
Mission-Overlay		
SPE 160	Intro to Special Edu w/Field	

Major Requirements

Code	Title	Hours
EDU 150	Schools in Society w/ Field	3
EDU 151	Cognition & Learning w/ Field	3
EDU 157	Adolescent Development w/Field	3
EDU 231	Assessment and Evaluation	3
EDU 246	Language and Culture w/ Field	3
EDU 247	Literacy in Cont Areas w/Field	3
EDU 471	Writing in the Classroom	3
SPE 160	Intro to Special Edu w/Field	3
SPE 205	Inclusive Classrooms w/ Field	3
SPE 379	Fam School & Comm:Diverse Soc	3
One required Instructional Techniques course (Two other Instructional Techniques Courses or Content Area courses (check concentration curriculum worksheet))		9
EDU 410	Instr Techniq English w/Field	
EDU 412	Instr Techniq Soc St w/Field	
EDU 416	Instr Techniq Math w/Field	
EDU 418	Instr Techniq Science w/Field	
Student Teaching		
EDU 496	Student Teaching 4-8	12

4-8 Major Additional Content Requirements

Students who complete the 4-8 program can be certified to teach all subjects in grades 5-6. They must choose one or two disciplines and take additional introductory and advanced courses in order to be certified to teach the selected subject(s) in grades 7-8. The following options are available:

Option 1: One concentration and three generalist academic content areas

Code	Title	Hours
Option 1A: English/Language Arts/Reading		
Option 1B: Mathematics		

Option 1C: Science**Option 1D: Social Studies**

This option for teacher candidates is to complete a minimum of 30 credit hours in one of the four content areas of mathematics, science, English/ language arts and reading or social studies as well as 12 credits in each of the two remaining content areas.

Option 2: Concentration in two content areas

Code	Title	Hours
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Option 2A: English/Language Arts/Reading and Mathematics		
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Option 2B: Science and Mathematics		
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Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Elementary/Middle Grades (4-8) Education MS

The Master of Science in Elementary/Middle Grades (4-8) Education is approved by the Pennsylvania Department of Education (PDE) and aligned with PDE course requirements for initial certification to teach middle grades in specific content areas. Students will graduate with the skills and experience to educate adolescents in grades 4-8. The 33-credit master's program includes traditional course instruction in addition to student teaching experiences where you can put theory into practice.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of young adolescent learner development.

Outcome 1.1: The student will understand and accurately interpret key concepts, principles, theories, and research about young adolescent development in social context.

Outcome 1.2: The student will identify the diverse developmental needs and abilities of 4-8 learners and use this information effectively when selecting instructional strategies and making curricular decisions.

Goal 2: The student will understand and use the central concepts, standards, research, and structures of content to plan and implement curriculum that develops all young adolescents' competence in subject matter.

Outcome 2.1: The student will describe and explain the philosophical foundations of middle level education and apply this knowledge in analyzing classroom management and instructional design.

Goal 3: The student will understand and use developmentally appropriate instructional strategies.

Outcome 3.1: The student will describe and analyze a range of specific teaching strategies and apply them appropriately in instructional planning, modifying their use based on the unique learning needs of middle school students.

Outcome 3.2: The student will demonstrate a practiced habit of self-analysis and collaboration with students and colleagues to assess the impact of instruction on student motivation and learning and will adjust teaching accordingly.

Goal 4: The student will demonstrate understanding and effective use of multiple methods of assessment.

Outcome 4.1: The student will define and describe types of valid and reliable educational assessments (including screening, diagnostic, formative, summative, and authentic) and identify strengths, weaknesses, and appropriate uses associated with each.

Outcome 4.2: The student will analyze and interpret assessment data to understand patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to learners and their guardians.

Goal 5: The student will demonstrate an understanding of educating for social justice.

Outcome 5.1: The student will describe key elements of interacting positively and respectfully with those of different racial, ethnic, language, and socioeconomic backgrounds and sexual orientations.

Outcome 5.2: The student will identify and describe practices and policies that reinforce inequalities and undermine 4-8 student learning, as well as steps that can be taken to challenge such practices in order to create a more just society.

Requirements

Code	Title	Hours
EDU 550	His & Contemp Persp Ed w/Field	3
EDU 557	Adolescent Psychology w/ Field	3
EDU 631	Assessment & Evaluation 7-12	3
EDU 646	Language and Culture w/ Field	3
EDU 647	Literacy & Lrn Acr Cur w/Field	3
EDU 671	Writing in the Curriculum	3
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3
EDU 696	Student Teaching 4-8	6
One (or two) Instructional Techniques Courses (based on concentration(s))		3-6
EDU 610	Instr Techniq English w/Field	
EDU 612	Instr Techniq Soc St w/Field	
EDU 616	Instr Techniq Math w/Field	
EDU 618	Instr Techniq Science w/Field	
Total Hours		33-36

4-8 Major Content Requirements

Students must choose one or two disciplines and take additional introductory and advanced courses in order to be certified to teach the selected subject(s). The following options are available:

Option 1: One concentration and three generalist academic content areas.

This option for teacher candidates is to complete a minimum of 30 credit hours in one of the four content areas of mathematics, science, English/

language arts and reading or social studies as well as 12 credits in each of the three remaining content areas.

Code	Title	Hours
Option 1A: English/Language Arts/Reading		
Option 1B: Mathematics		
Option 1C: Science		
Option 1D: Social Studies		

Option 2: Concentration in two content areas

The second option permitted under the Elementary/Middle Level program design requires a concentration in two content areas. Teacher candidates are to complete a minimum of 21 credits in each content area concentration, as well as 12 credits in each of the two remaining content areas.

Code	Title	Hours
Option 2A: English/Language Arts/Reading and Mathematics		
Option 2B: Science and Mathematics		

Elementary Education (PK-4) MS

Saint Joseph's University offers a 36-credit Master of Science program for students looking to become early childhood and elementary PK4 teachers. The Elementary Education PK4 teacher preparation program is approved by the Pennsylvania Department of Education (PDE) and aligned with PDE requirements for teacher certification in PK4. Students will also engage with content and pedagogical approaches relevant to grades 5 and 6. Coursework is designed to deepen students' understanding of early childhood development and learning needed to teach young learners while field experiences in PK4 classrooms help to integrate theory with practice.

Students can opt to take courses online or in person but should be aware that all courses in the program are not offered each semester; therefore, must be planned in consultation with the graduate program director.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of learner development.

Outcome 1.1: The student will explain how learning occurs—how learners construct knowledge, acquire skills and develop disciplined thinking processes.

Outcome 1.2: The student will identify readiness for learning and explain how development in one area may affect performance in others.

Goal 2: The student will demonstrate an understanding of learning differences.

Outcome 2.1: The student will identify and explain reasons for differences in children's learning and performance.

Outcome 2.2: The student will articulate learner strengths based on their individual experiences, prior learning, and peer and social group interactions, as well as language, culture, family and community values.

Goal 3: The student will demonstrate an understanding of the central concepts of PK-4 teaching.

Outcome 3.1: The student will identify and describe major concepts, assumptions, debates, processes of inquiry, and ways of knowing that are central to PK-4 teaching.

Outcome 3.2: The student will identify and describe PK-4 content standards and learning progressions.

Goal 4: The student will plan instruction that supports PK-4 student learning.

Outcome 4.1: The student will plan for instruction based on appropriate curriculum goals and content standards.

Outcome 4.2: The student will plan instruction that is responsive to the identified strengths and needs of individual learners.

Goal 5: The student will demonstrate understanding and effective use of multiple methods of assessment.

Outcome 5.1: The student will define and interpret types of valid and reliable education assessments (including screening, diagnostic, formative, summative, and authentic) and identify principles of their effective use.

Outcome 5.2: The student will analyze and interpret assessment data to identify patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to all learners and their guardians.

Goal 6: The student will demonstrate an understanding of educating for social justice.

Outcome 6.1: The student will describe key elements of interacting positively and respectfully with those of different racial, ethnic, language and socioeconomic backgrounds and sexual orientations.

Outcome 6.2: The student identify and describe practices and policies that reinforce inequalities and that undermine

Requirements

Code	Title	Hours
EDU 550	His & Contemp Persp Ed w/Field	3
EDU 632	Literacy/Literature I w/ Field	3
EDU 640	Literacy/Literature II w/Field	3
EDU 642	Per in Dev & Child Ed w/Field	3
EDU 646	Language and Culture w/ Field	3
EDU 663	Science Methods PK-4 w/ Field	3
EDU 665	Interd Teach Mat w/ Field	3
EDU 667	Soc St Thru Arts Pk4 w/Field	3
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3
Student Teaching		
EDU 695	PK-4 Student Teaching	6
Total Hours		36

Elementary Education (Pre K-4) Major

The Elementary Education PK4 major is an accredited program approved by the Pennsylvania Department of Education (PDE) and aligned with the requirements for teacher certification in PK4. Students will also engage with content and pedagogical approaches relevant to grades 5 and 6 which will enable them to add certification for grades 5 and 6 via additional testing. Throughout the Elementary Education PK4 program, students integrate theory with practice through coursework and field experiences in PK4 classrooms in local schools.

The undergraduate Teacher Education programs are built upon a strong liberal arts curriculum provided through the Cornerstone Core Curriculum (CCC) at Saint Joseph's University. This enables students to integrate their understanding of interdisciplinary content with an understanding of developmentally appropriate pedagogy.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of learner development.

Outcome 1.1: The student will explain how learning occurs—how learners construct knowledge, acquire skills and develop disciplined thinking processes.

Outcome 1.2: The student will identify readiness for learning and explain how development in one area may affect performance in others.

Goal 2: The student will demonstrate an understanding of learning differences.

Outcome 2.1: The student will identify the different ways students learn.

Outcome 2.2: The student will differentiate instruction based on how students learn.

Goal 3: The student will demonstrate an understanding of the central concepts of PK-6 teaching.

Outcome 3.1: The student will identify and describe major concepts, assumptions, debates, processes of inquiry, and ways of knowing that are central to PK-6 teaching.

Outcome 3.2: The student will identify and describe PK-6 content standards and learning progressions.

Goal 4: The student will plan instruction that supports PK-6 student learning.

Outcome 4.1: The student will plan for instruction based on appropriate curriculum goals and content standards.

Outcome 4.2: The student will plan instruction that is responsive to the identified strengths and needs of individual learners.

Goal 5: The student will demonstrate understanding and effective use of multiple methods of assessment.

Outcome 5.1: The student will define and interpret types of valid and reliable education assessments (including screening, diagnostic,

formative, summative, and authentic) and identify principles of their effective use.

Outcome 5.2: The student will analyze and interpret assessment data to identify patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to all learners and their guardians.

Goal 6: The student will demonstrate an understanding of educating for social justice.

Outcome 6.1: The student will describe key elements of interacting positively and respectfully with those of different racial, ethnic, language and socioeconomic backgrounds and sexual orientations.

Outcome 6.2: The student will identify and describe practices and policies that reinforce inequalities and that undermine PK-6 student learning, as well as what can be done to challenge such practices in order to create a more just society.

INTASC Standards

Standard #1: Learner Development. The teacher understands how learners grow and develop, recognizing that patterns of learning and development vary individually within and across the cognitive, linguistic, social, emotional, and physical areas, and designs and implements developmentally appropriate and challenging learning experiences.

Standard #2: Learning Differences. The teacher uses understanding of individual differences and diverse cultures and communities to ensure inclusive learning environments that enable each learner to meet high standards.

Standard #3: Learning Environments. The teacher works with others to create environments that support individual and collaborative learning, and that encourage positive social interaction, active engagement in learning, and self motivation.

Standard #4: Content Knowledge. The teacher understands the central concepts, tools of inquiry, and structures of the discipline(s) he or she teaches and creates learning experiences that make the discipline accessible and meaningful for learners to assure mastery of the content.

Standard #5: Application of Content. The teacher understands how to connect concepts and use differing perspectives to engage learners in critical thinking, creativity, and collaborative problem solving related to authentic local and global issues.

Standard #6: Assessment. The teacher understands and uses multiple methods of assessment to engage learners in their own growth, to monitor learner progress, and to guide the teacher's and learner's decision making.

Standard #7: Planning for Instruction. The teacher plans instruction that supports every student in meeting rigorous learning goals by drawing upon knowledge of content areas, curriculum, cross-disciplinary skills, and pedagogy, as well as knowledge of learners and the community context.

Standard #8: Instructional Strategies. The teacher understands and uses a variety of instructional strategies to encourage learners to develop deep understanding of content areas and their connections, and to build skills to apply knowledge in meaningful ways.

Standard #9: Professional Learning and Ethical Practice. The teacher engages in ongoing professional learning and uses evidence to continually evaluate his/her practice, particularly the effects of his/her choices and actions on others (learners, families, other professionals, and the community), and adapts practice to meet the needs of each learner.

Standard #10: Leadership and Collaboration. The teacher seeks appropriate leadership roles and opportunities to take responsibility for student learning, to collaborate with learners, families, colleagues, other school professionals, and community members to ensure learner growth, and to advance the profession.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		

Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EDU 150	Schools in Society w/ Field	
Social Science		
EDU 151	Cognition & Learning w/ Field	
Writing Intensive		
EDU 151	Cognition & Learning w/ Field	
Mission-Overlay		
SPE 160	Intro to Special Edu w/Field	

Major Requirements

Code	Title	Hours
EDU 121	Child Development	3
EDU 150	Schools in Society w/ Field	3
EDU 151	Cognition & Learning w/ Field	3
EDU 155	Found of Early Child w/ Field	3
EDU 231	Assessment and Evaluation	3
EDU 232	Literacy/Literature I w/ Field	3
EDU 246	Language and Culture w/ Field	3
EDU 265	Teaching Math in PK2 w/ Field	3
EDU 340	Literacy/Literature II w/Field	3
EDU 362	Soc Stud Thru Arts PK4 w/Field	3
EDU 363	Science Methods PK-4 w/ Field	3
EDU 366	Teaching Math Gr. 3-6 w/Field	3
SPE 160	Intro to Special Edu w/Field	3
SPE 205	Inclusive Classrooms w/ Field	3
SPE 379	Fam School & Comm:Diverse Soc	3
Student Teaching		
EDU 495	ECE Student Teaching	12
Total Hours		57

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
EDU 150	Schools in Society w/ Field	3
EDU 121	Child Development	3
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
World History		3
Non-Native Language		3-4
Hours		16-17
Spring		
EDU 151	Cognition & Learning w/ Field	3
EDU 155	Found of Early Child w/ Field	3
Literature		3
Mathematics		3-4
Philosophy Level One		3
Hours		15-16
Sophomore		
Fall		
EDU 231	Assessment and Evaluation	3
EDU 246	Language and Culture w/ Field	3
SPE 160	Intro to Special Edu w/Field	3
MAT 111	The Mathematics of Patterns	3
Philosophy Level Two		3
Hours		15
Spring		
EDU 232	Literacy/Literature I w/ Field	3
EDU 265	Teaching Math in PK2 w/ Field	3
SPE 205	Inclusive Classrooms w/ Field	3
Natural Science		4
Free Elective		3
Hours		16
Junior		
Fall		
EDU 340	Literacy/Literature II w/Field	3
EDU 366	Teaching Math Gr. 3-6 w/Field	3
Fine & Performing Arts, Design & Creativity		3
HIS 201	U.S. History to 1877	3
Free Elective		3
Hours		15
Spring		
EDU 362	Soc Stud Thru Arts PK4 w/Field	3
EDU 363	Science Methods PK-4 w/ Field	3
Theology		3
Free Electives		6
Hours		15
Senior		
Fall		
Religious Studies		3
Free Electives		12
Hours		15
Spring		
EDU 495	ECE Student Teaching	12

SPE 379	Fam School & Comm:Diverse Soc	3
Hours		15
Total Hours		122-124

English as Second Language Graduate Certificate

The ESL Program Specialist Certificate Program is approved by the Pennsylvania Department of Education. The program prepares candidates to develop classroom practices for attending to the academic and language needs of English language learners. The ESL Program Specialist Certificate enables candidates to teach English as a Second Language (ESL)/English Language Development (ELD) in the elementary, middle, and secondary levels in PK12 schools. The program also enables PK4 teachers and content area teachers who teach 4-8 and 7-12 grades to work with ESL students in their classrooms. Candidates must hold or be enrolled in an Instructional I or II teaching certificate to enroll in the program. Candidates must hold Instructional I Teaching Certificate to apply to PDE for the ESL Program Specialist Certificate; however, coursework may be completed at the undergraduate or graduate level.

Requirements

Code	Title	Hours
EDU 646	Language and Culture w/ Field ¹	3
EDU 710	English Linguistics	3
EDU 712	Topics in Language Acquisition	3
EDU 713	Method Teach English Sec Lang	3
EDU 714	ESL/Bilin Inst Prac w/Field	4
Total Hours		16

¹ Teachers who hold an Instructional I Teaching Licensure are not required to take EDU 646.

World Languages PK12 Education MS

The MS in Education with a major in World Languages PK12 Education at Saint Joseph's University is approved by the Pennsylvania Department of Education (PDE) and aligned with PDE requirements for teaching world languages to students in PK12 grades. The program is designed to build on the solid foundation of a student's bachelor's degree and competency in a world language.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of PK12 learner development.

Outcome 1.1: The student will understand and accurately interpret key concepts, principles, theories, and research about PK12 learner development in social context.

Outcome 1.2: The student will identify the diverse developmental needs and abilities of PK12 learners and use this information effectively when selecting instructional strategies and making curricular decisions with respect to foreign language learning.

Goal 2: The student will understand and use the central concepts, standards, research, and structures of content to plan and implement

curriculum that develops all high school learners' competence in the area of learning a foreign language.

Outcome 2.1: The student will describe and explain the philosophical and historical foundations of foreign language education and apply this knowledge in analyzing school culture and climate, classroom management, and instructional design.

Goal 3: The student will understand and use developmentally appropriate instructional strategies.

Outcome 3.1: The student will describe and analyze a range of specific teaching strategies and apply them appropriately in instructional planning, modifying their use based on the unique learning needs of PK12 students and the particular demands of learning a foreign language.

Outcome 3.2: The student will demonstrate a practiced habit of self-analysis and collaboration to assess the impact of instruction on student motivation and learning and will adjust teaching accordingly.

Goal 4: The student will demonstrate understanding and appropriate use of multiple methods of assessment.

Outcome 4.1: The student will define and describe types of valid and reliable educational assessments (including screening, diagnostic, formative, summative, and authentic) and identify strengths, weaknesses, and appropriate uses associated with each.

Outcome 4.2: The student will analyze and interpret assessment data to understand patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to learners and their guardians.

Goal 5: The student will demonstrate an understanding of educating for social justice.

Outcome 5.1: The student can demonstrate the ability to interact positively and respectfully with those of different racial, ethnic, language and socioeconomic backgrounds and sexual orientations.

Outcome 5.2: The student will identify and describe practices and policies that reinforce inequalities and undermine high school student learning, as well as steps that can be taken to challenge such practices in order to create a more just society.

Requirements

Code	Title	Hours
EDU 550	His & Contemp Persp Ed w/Field	3
EDU 557	Adolescent Psychology w/ Field	3
EDU 646	Language and Culture w/ Field	3
EDU 614	Instr Tchnq Wrld Lang w/Field	3
EDU 647	Literacy & Lrn Acr Cur w/Field	3
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3
SPE 626	Assess/ProgMonitorPK12 w/Field	3
Student Teaching		
EDU 691	Secondary Student Teaching	6
Total Hours		30

Reading Specialist Graduate Certificate

Code	Title	Hours
EDU 671	Writing in the Curriculum	3
For candidates who have not previously taken introductory literacy pedagogy courses, EDU 632 or EDU 640 must be completed before taking any 700-level course.		
EDU 700	Psychology of Literacy	3
EDU 701	Assess & Instr in Liter K-3	3
EDU 702	Assess & Instr in Liter 4-12	3
EDU 703	Crit Exp of Literacy Research	3
EDU 704	Plng & Org a Literacy Program	3
EDU 705	Literacy Practicum	6
or EDU 769	Advanced Fieldwork in Literacy	
Total Hours		24

Reading Specialist MS

The MS in Reading Specialist at Saint Joseph's University is approved by the Pennsylvania Department of Education (PDE) and aligned with PDE requirements for reading specialists, including competencies and standards in structured literacy. This masters degree offers initial Level 1 certification to candidates who do not have educational backgrounds and do not have Instructional 1 Teaching Certification, as well as classroom teachers who already hold initial Level 1 certification. The program is fully online and tailored for students interested in obtaining a master's degree as well as those who wish to get certified as Reading Specialists without a master's degree.

Learning Goals and Outcomes

Goal 1: Candidates will demonstrate knowledge of major theoretical, conceptual, historical, and evidence-based foundations of literacy and language and the ways in which they interrelate.

Goal 2: Candidates will design literacy curricula to meet the needs of a variety of literacy learners by drawing from a range of literacy teaching paradigms, including structured literacy, culturally sustaining literacy, critical literacy, multimodal and digital literacies, and thoughtful literacy.

Goal 3: Candidates will recognize and appreciate the inherent literate capacities of all students.

Goal 4: Candidates will design, implement, and evaluate small-group and individual evidence-based literacy instruction for learners, including those who experience difficulties with literacy.

Goal 5: Candidates will understand, select, and use valid, reliable, fair, and appropriate cognitive and noncognitive assessment tools to inform instruction, evaluate interventions, and guide teachers in their understanding and use of assessment results.

Goal 6: Candidates will strive to enact and advance equitable literacy teaching practices and policies at the classroom, school, district, and community levels.

Goal 7: Candidates will demonstrate the ability to be reflective literacy professionals who apply their knowledge of adult learning to work

collaboratively with colleagues and advocate on behalf of teachers, students, families, and communities.

Goal 8: Candidates will complete supervised practicum experiences that include intervention.

Requirements

Code	Title	Hours
EDU 646	Language and Culture w/ Field	3
EDU 671	Writing in the Curriculum	3
For candidates who have not previously taken introductory literacy pedagogy courses, EDU 632 or EDU 640 must be completed before taking any 700-level course.		
EDU 700	Psychology of Literacy	3
EDU 701	Assess & Instr in Liter K-3	3
EDU 702	Assess & Instr in Liter 4-12	3
EDU 703	Crit Exp of Literacy Research	3
EDU 704	Plng & Org a Literacy Program	3
Practicum		6
EDU 705	Literacy Practicum	
EDU 705 is for students holding Instructional 1 certificate. Students taking EDU 705 do not take EDU 769.		
EDU 769	Advanced Fieldwork in Literacy	
EDU 769 is the literacy practicum for candidates obtaining Level 1 Certification. They do not take EDU 705.		
Elective		3
Total Hours		30

Per PDE Chapter 49 the following courses are required if candidates have not previously completed them:

Code	Title	Hours
EDU 632	Literacy/Literature I w/ Field	3
or EDU 640	Literacy/Literature II w/Field	
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3

Secondary Education (7-12) MS

The Secondary Education Program at Saint Joseph's University is approved by the Pennsylvania Department of Education (PDE) and coursework is aligned with PDE requirements for secondary grade content area teachers. The program is a Master's Program leading to Instructional Level 1 Teaching Certification and prepares students for a rewarding career as an educator of students in grades 7-12. In the 30-credit program, students select a content area for teaching grades 7-12 education and gain practical experience through field experiences in 7-12 classrooms. Students can opt to be fully online or take campus courses.

Learning Goals and Outcomes

Goal 1: The student will demonstrate an understanding of adolescent learner development.

Outcome 1.1: The student will understand and accurately interpret key concepts, principles, theories, and research about adolescent development in social context.

Outcome 1.2: The student will identify the diverse developmental needs and abilities of adolescent learners and use this information effectively when selecting instructional strategies and making curricular decisions.

Goal 2: The student will understand and use the central concepts, standards, research, and structures of content to plan and implement curriculum that develops all high school learners' competence in a specific subject matter area.

Outcome 2.1: The student will describe and explain the philosophical and historical foundations of comprehensive high school education and apply this knowledge in analyzing school culture and climate, classroom management, and instructional design.

Goal 3: The student will understand and use developmentally appropriate instructional strategies.

Outcome 3.1: The student will describe and analyze a range of specific teaching strategies and apply them appropriately in instructional planning, modifying their use based on the unique learning needs of high school students and the particular demands of the subject matter.

Outcome 3.2: The student will demonstrate a practiced habit of self-analysis and collaboration with students and colleagues to assess the impact of instruction on student motivation and learning and will adjust teaching accordingly.

Goal 4: The student will demonstrate understanding and appropriate use of multiple methods of assessment.

Outcome 4.1: The student will define and describe types of valid and reliable educational assessments (including screening, diagnostic, formative, summative, and authentic) and identify strengths, weaknesses, and appropriate uses associated with each.

Outcome 4.2: The student will analyze and interpret assessment data to understand patterns and gaps in learning, to guide planning and instruction, and to provide meaningful feedback to learners and their guardians.

Goal 5: The student will demonstrate an understanding of educating for social justice.

Outcome 5.1: The student can demonstrate the ability to interact positively and respectfully with those of different racial, ethnic, language and socioeconomic backgrounds and sexual orientations.

Outcome 5.2: The student will identify and describe practices and policies that reinforce inequalities and undermine high school student learning, as well as steps that can be taken to challenge such practices in order to create a more just society.

Requirements

Code	Title	Hours
EDU 550	His & Contemp Persp Ed w/Field	3
EDU 557	Adolescent Psychology w/ Field	3
EDU 646	Language and Culture w/ Field	3
EDU 647	Literacy & Lrn Acr Cur w/Field	3
SPE 600	Found & Current Issues w/Field	3
SPE 613	Incl. Class Practices w/Field	3

SPE 626	Assess/ProgMonitorPK12 w/Field	3
One Instructional Techniques Course (as stated in the advising sheet for each content area)		3
EDU 610	Instr Techniq English w/Field	
EDU 612	Instr Techniq Soc St w/Field	
EDU 616	Instr Techniq Math w/Field	
EDU 618	Instr Techniq Science w/Field	
Student Teaching		
EDU 691	Secondary Student Teaching	6
Total Hours		30

SCHOOL OF HEALTH PROFESSIONS

School of Health Professions Leadership

Dean: Cathy Y. Poon, PharmD, FPPA, FCPP, FNAP

Associate Dean: Lora B. Packel, PT, MSPT, PhD

Faculty Listing: School of Health Professions (<https://directory.sju.edu/school-health-professions/faculty/>)

Mission & Vision

Saint Joseph's University's School of Health Professions has a clear mission: to prepare compassionate healthcare providers to be advocates for positive change. With a rigorous and competitive health sciences curricula paired with unique clinical experiences and a liberal arts core, we challenge future healthcare professionals to think critically, problem-solve creatively and communicate effectively. We believe that the future of healthcare is interdisciplinary, innovative and rooted in empathy — and our graduates have what it takes to lead it.

Health Sciences

The Department of Health Sciences, encompassing both Health Sciences and Exercise Physiology majors, offers a comprehensive foundation in natural sciences, public health, the healthcare system, and social sciences, preparing students for successful careers in health services and fitness industries. In addition to a broad spectrum of health issues, including sociocultural influences, health behavior, legal and ethical concerns, and environmental impacts on health, the Exercise Physiology major further immerses students in practical experience with access to state-of-the-art facilities and cutting-edge equipment. The combination of programs ensures that all students, regardless of their major, are well-equipped to address a wide range of health and fitness needs, enhancing health outcomes and athletic performance across diverse populations. By fostering a deep understanding of both the theoretical and practical aspects of health and physical activity, the department is committed to preparing students for lifelong success in a variety of health-related careers, from public health policy to sports performance.

Faculty

Faculty and staff in the Department of Health Studies bring extensive experience in healthcare from previous roles as health administrators, pharmacists, nurses, community educators, researchers, and clinicians. Faculty engage in research in Alzheimer's Disease, behavioral health, health policy, public health, health systems, exercise physiology, acute injury and other topics. Faculty are dedicated to helping students learn and grow into competent health or fitness professionals.

Department of Health Sciences Faculty & Staff (<https://www.sju.edu/departments/health-sciences/faculty-staff/>)

Programs

Undergraduate Majors

- Exercise Physiology (p. 313)
- Health Science (p. 318)

Undergraduate Minor

- Exercise Physiology (p. 318)
- Health Science (p. 329)

Exercise Physiology Major

The Bachelor of Science in Exercise Physiology at Saint Joseph's University is designed to equip students with a deep and comprehensive understanding of how the human body responds and adapts to physical activity, exercise, and sports. This thorough program combines foundational knowledge in physiology, fitness, health, psychology and behavior management with practical skills in communication, leadership, planning, and organizational development. Students gain a holistic view of health and the multidimensional aspects of physical fitness, preparing them to design and implement programs that promote healthy lifestyles across diverse populations, ranging anywhere from the chronically ill to the elite athlete.

Program Features:

- **Hands-On Learning:** Students engage in practical learning experiences through required hands-on laboratory courses, internships, and research opportunities, utilizing cutting-edge equipment and technology in state-of-the-art health and fitness facilities.
- **Flexible Curriculum:** The program offers both a traditional four-year curriculum and a three-year accelerated, direct-entry track to Physical Therapy, along with specialty electives tailored to students interests or career goals.
- **Certification Opportunities:** Before graduation, students have the chance to earn certifications in up to six areas, including exercise physiologist, sports nutritionist, performance and sport scientist, personal training, special populations specialist and strength and conditioning specialist, enhancing their employability and expertise.
- **Career and Graduate Pathways:** Graduates are well-prepared for immediate entry into the health and fitness industry or for advanced studies in exercise physiology, athletic training, chiropractic, sports nutrition and more, thanks to thorough and well-rounded education and strong access to a robust network of local career opportunities in and around the Philadelphia region.

Educational Philosophy: At the core of our Exercise Physiology program is the commitment to instill a passion for learning and an understanding of the fundamental role of physical activity in preventing chronic diseases, treating acute injuries, and maximizing human performance. Our approach is designed to prepare students for success in a variety of health-related careers, encouraging them to follow their passions and tailor their education to forge a unique personal and professional identity.

Career Outcomes: Graduates of the Exercise Physiology program are equipped for diverse roles in the health and fitness industry, including positions in corporate fitness, strength and conditioning, adaptive fitness coaching, surgical neurophysiology, health and physical education, and beyond. With a strong foundation in both the theoretical and practical aspects of exercise science, our graduates are ready to make significant contributions to health and fitness service delivery, wellness, disease prevention and health promotion, embodying professional behavior and a critical understanding of the health and fitness services, public health initiatives, and societal health challenges as they relate to both improved healthspan and lifespan.

The SJU Exercise Physiology program is a National Strength and Conditioning Association (NSCA) Education Recognized Program (ERP), which is an approved and standardized curricula designed to prepare students for the NSCA-Certified Strength and Conditioning Specialist (CSCS) or Certified Personal Trainer (CPT) certifications.

Learning Goals and Outcomes

Goal 1: Foundational Knowledge in Exercise Science

Outcome 1.1: Graduates will possess a profound understanding of exercise physiology which encompasses; testing and prescription, strength and conditioning, clinical exercise prescription, kinesiology, motor learning, sports psychology, and sports nutrition. These topics and courses serve to professionally certify students and enhance practice in the field of health and fitness. The students will learn about diverse populations, from chronic illness to sports performance.

Goal 2: Ethical Conduct in Professional Practice

Outcome 2.1: Graduates will consistently demonstrate ethical conduct, adhere to professional standards, and engage in ethical decision-making within all aspects of exercise science practice.

Goal 3: Research Proficiency and Applied Critical Thinking

Outcome 3.1: Graduates will conduct research, apply scientific inquiry, and integrate evidence-based practices into discipline-specific practicum experiences to develop advanced exercise assessment and programming.

Goal 4: Communication, Community Involvement, and Lifelong Learning

Outcome 4.1: Graduates will demonstrate effective communication, engage in lifelong learning and professional development, and pursue advanced academic or leadership opportunities to foster growth in exercise physiology and contribute meaningfully to their communities and professional settings.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student’s Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		

Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student’s Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student’s Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student’s overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student’s Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student’s overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student’s overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EPH 431	Exercise For Special Popultns	
Writing Intensive		
EPH 350	Research Methods in Kines	
Mission-Overlay		
EPH 311	Essentials of Sports Science	

Major Requirements

Code	Title	Hours
EPH 120	Foundations: Exercise Science	3
EPH 300	Exercise Testing& Prescription	4
EPH 301	Exercise Physiology	4
EPH 340	Exercise Psychology	3
EPH 350	Research Methods in Kines	3
EPH 360	Fitness & Sports Nutrition	3
EPH 380	Introduction to Kinesiology	3
EPH 431	Exercise For Special Popultrns	3
EPH 481	Internship	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Statistics (will count for CCC: Mathematics)		3-4
MAT 128	Applied Statistics	
MAT 118	Introduction to Statistics	
Area Studies: (2 courses must be EPH)		15
Exercise Physiology Courses:		
EPH 201	Personal Training Essentials	
EPH 205	Mind & Muscle:Science of Succe	
EPH 210	Athletic Injuries&Sports Rehab	
EPH 221	Exercise Pharmacology	
EPH 260	Health and Wellness	
EPH 270	Special Topics	
EPH 271	Motor Learning	
EPH 276	Applied Sports Nutrition	
EPH 302	Cardiovascular Pathophysiology	
EPH 310	Ethics in Sports	
EPH 311	Essentials of Sports Science	
EPH 321	Tactical Strength & Conditioni	
EPH 355	Research Experience	
EPH 370	Special Topics	
EPH 387	Biomechanics	
EPH 401	Adv Ex Physiology	
EPH 411	Strength and Conditioning	
EPH 415	Strength & Conditioning I	
EPH 416	Strength & Conditioning II	
EPH 421	Pediatric Clinical Ex. Phys	
EPH 482	Internship II	
EPH 483	Fitness and Health Management	
Health Studies Courses:		
HSC 211	Health Care Systems	
HSC 216	Alcohol, Drugs and Society	
HSC 217	Ethics & Equity Mental Health	
HSC 244	Health Information Technology	

HSC 248	Health of School Aged Children
HSC 251	Healthcare Law and Ethics
HSC 252	Health Policy
HSC 253	Nutrition: Health & Disease
HSC 256	HIV/AIDS
HSC 276	Health of the Aging Adult
HSC 285	Med Terminology & Health Comm
HSC 323	Social Determinants of Health
HSC 345	DyingWell:The Hospice Movement
HSC 354	Diversity Ldrshp in Hlth Care
HSC 359	Health Program Planning
HSC 360	Animal Therapy
HSC 368	Just Hlth Care Dev Nations
HSC 370	Special Topics Health Sciences
HSC 390	Medical Terminology
HSC 441	Complementary & Alt Med
HSC 458	Public Health & Epidemiology
HSC 490	Internship in Health Sciences
HSC 493	Independent Study
HSC 494	Independent Study
Social Sciences Courses:	
ECN 390	The Economics of Healthcare
PSY 122	Psychological Disorders
PSY 222	Neuropsychology
PSY 223	Health Psychology
PSY 224	Drugs, the Brain, & Behavior
SOC 217	Mental Health & Society
Natural Sciences Courses:	
BIO 201 & 201L	Bio III: Organismic Biology and Bio III: Organismic Biol Lab
BIO 270 & 270L	Clinical Micro and Clinical Microbiology Lab
BIO 404	Biochemistry
BIO 406 & 406L	Human Anatomy and Human Anatomy Lab
BIO 416 & 416L	Microbiology and Microbiology Lab
BIO 417 & 417L	Systemic Physiology and Systemic Physiology Lab
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II
PHY 101 & 101L	General Physics I and General Physics Laboratory I
PHY 102 & 102L	General Physics II and General Physics Laboratory II
Humanities Courses:	
COM 460	Health Communication Advocacy
ENG 450	Health, Advocacy, Storytelling

LIN 270	Topics in Linguistics	
LIN 320	Phonetics	
THE 349	Theology of Disability	
Total Hours		63-64

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Typical Course Sequence for 4-year Exercise Physiology Major

Course	Title	Hours
First Year		
Fall		
EPH 120	Foundations: Exercise Science	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
Non-Native Language		3-4
Hours		14-15
Spring		
EPH Area Studies		3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
World History		3
Free Elective		3
Hours		13
Sophomore		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
EPH 360	Fitness & Sports Nutrition	3
Social Science		3
Area Studies		3
Free Elective		3
Hours		16
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Philosophy Level One		3
EPH 360	Fitness & Sports Nutrition	3
Area Studies		3
Free Elective		3
Hours		16
Junior		
Fall		
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
EPH 301	Exercise Physiology	4
EPH 340 or EPH 350	Exercise Psychology or Research Methods in Kines	3
Philosophy Level Two		3
Free Elective		3
Hours		16
Spring		
Mission Specific Overlay Course (EPH 311: Ethics in Sports fulfills)		3
EPH 300	Exercise Testing& Prescription	4

EPH 340 or EPH 350	Exercise Psychology or Research Methods in Kines	3
Free Electives		6
Hours		16
Senior		
Fall		
EPH 481	Internship	3
Theology		3
Literature		3
Free Electives		6
Hours		15
Spring		
EPH 431	Exercise For Special Popultns	3
Religious Studies		3
Fine & Performing Arts, Design & Creativity		3
Free Electives		6
Hours		15
Total Hours		121-122

Direct Entry Physical Therapy Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4

Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
EPH 431	Exercise For Special Popultns	
Social Science		
PSY 100	Introductory Psychology	
Writing Intensive		
EPH 350	Research Methods in Kines	
Mission-Overlay		
EPH 311	Essentials of Sports Science	

Major Requirements

Code	Title	Hours
EPH 120	Foundations: Exercise Science	3
EPH 300	Exercise Testing& Prescription	4
EPH 340	Exercise Psychology	3
EPH 350	Research Methods in Kines	3
EPH 360	Fitness & Sports Nutrition	3
EPH 380	Introduction to Kinesiology	3
EPH 431	Exercise For Special Popultns	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0

BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Statistics (will count for CCC: Mathematics)		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
Area Studies Courses		
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Area Studies Course		3
Additional Social Science Course (required for DPT program - 3rd social science)		3
Total Hours		63-64

Summer after Junior year begins the professional curriculum for DPT program. (p. 352)

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
EPH 120	Foundations: Exercise Science	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
Non-Native Language		3-4
Hours		14-15
Spring		
EPH Area Studies (EPH 311: Ethics in Sport - EPH Area Studies fulfills this; also fulfills Mission Specific overlay)		3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
World History		3
Literature		3
Philosophy Level One		
Hours		13
Sophomore		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
EPH 380 or EPH 360	Introduction to Kinesiology or Fitness & Sports Nutrition	3
EPH 350	Research Methods in Kines	3
PSY 100	Introductory Psychology	3
Hours		17
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
EPH 380 or EPH 360	Introduction to Kinesiology or Fitness & Sports Nutrition	3

EPH 300	Exercise Testing& Prescription	4
Hours		11
Junior		
Fall		
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
PHY 101	General Physics I	3
PHY 101L	General Physics Laboratory I	1
EPH 431	Exercise For Special Popultns	3
Theology		3
Fine & Performing Arts, Design & Creativity		3
Hours		16
Spring		
PHY 102	General Physics II	3
PHY 102L	General Physics Laboratory II	1
Religious Studies		3
Philosophy Level Two		
Social Science Course (required for DPT program - 3rd social science)		
EPH 340	Exercise Psychology	3
Hours		10
Senior		
Fall		
P1 Courses in DPT Curriculum		15
Hours		15
Spring		
P1 Courses in DPT Curriculum		15
Hours		15
Total Hours		111-112

Exercise Physiology Minor

The Exercise Physiology minor offers students from any discipline the opportunity to dive into the science of human movement and its profound impact on health and performance. Through two fundamentals courses and four elective courses, students will explore the systems of the human body, the principles of movement, and how exercise and fitness are related to chronic diseases, acute injuries, and human performance. Students may select four elective courses tailored to their interests, further deepening their knowledge in specific areas of exercise physiology and enabling them to pursue a variety of certifications within the health and fitness field. This minor equips students with valuable insights into the optimization of physical health and athletic capabilities, bridging the gap between theoretical knowledge and practical application in promoting lifelong health and optimal sports performance.

Learning Goals and Outcomes

Goal 1. Core Understanding in Exercise Science

Outcome 1.1: Students will gain essential knowledge in exercise physiology including fundamental concepts of human movement, fitness, chronic disease management, injury prevention, and performance enhancement through two foundational courses.

Goal 2. Specialized Knowledge and Professional Development

Outcome 2.1: Students will deepen their comprehension in targeted areas of exercise physiology, enhancing their understanding for health and fitness certifications and their readiness for a range of professional contexts.

Outcome 2.2: Students will develop a foundational capacity for critical thinking and ethical behavior, laying the groundwork for

potential advanced studies or various roles in the health and fitness industry.

Requirements

Code	Title	Hours
EPH 120	Foundations: Exercise Science	3
EPH 301	Exercise Physiology	4
Select any four Exercise Physiology (EPH) elective courses:		12
Total Hours		19

Health Sciences Major

The Health Sciences program provides students with the foundation to pursue either direct entry careers in healthcare or further training in the health professions. Basic coursework balances the natural and social sciences with the goal of developing a strong, holistic knowledge of human health, disease, lifestyle behaviors, and healthcare systems. Students are encouraged to tailor electives toward their desired career pathway. Many students use their electives to complete prerequisite courses for admission into programs in physical therapy, physician assistant, nursing, occupational therapy or other health-related disciplines. Popular electives offered by the department include medical terminology, nutrition, healthcare law and ethics, health policy, animal therapy, hospice care, kinesiology, and HIV/AIDS. Other learning opportunities include internships, study abroad, study tours, or independent research. Graduates opting for direct entry into the workforce find careers as administrative staff in hospitals, health clinics, medical offices, health maintenance organizations, health insurance companies, community health programs, or clinical researchers. On completion of the program, students are able to:

- Describe the normal structure and function of the major body systems and related diseases
- Use appropriate medical terminology
- Communicate in a professional manner, using written, oral, and electronic methods
- Display professional behavior
- Identify components of wellness, disease prevention, and health promotion
- Demonstrate awareness and appreciation of the humanistic and ethical aspects of health service delivery
- Identify, use and critique scholarly resources
- Critically analyze research design and methodology and to apply research findings to professional practice
- Discuss the current societal, governmental, and business issues concerning their selected area of study in health science.
- Provide services as a health educator, health administration manager, researcher or other health-related career.

There are many, many opportunities and needs to health care. Student are encouraged to follow their passion and to tailor the course offerings in a way that creates a unique personal and professional identity.

Learning Goals and Outcomes

Goal 1. Communicate effectively in the discipline

Outcome 1.1: Model patient-centered communication skills.

Outcome 1.2: Utilize medical terminology

Outcome 1.3: Write in the technical report style

Goal 2: Demonstrate information literacy

Outcome 2.1: Identify and evaluate peer-reviewed health and medical literature

Outcome 2.2: Use scholarly resources to identify evidence-based programs and practices

Goal 3: Direct systems collaboration

Outcome 3.1: Demonstrate an understanding of healthcare systems and effective healthcare systems management.

Outcome 3.2: Function effectively as a member of the team

Goal 4: Follow ethical codes of conduct of health care practice.

Outcome 4.1: Model ethical conduct reflecting Jesuit values of social justice and cura personalis

Outcome 4.2: Model professional healthcare ethics in the educational setting

Goal 5: Demonstrate conceptual understanding of the discipline.

Outcome 5.1: Know and understand the biological, psychological, and social determinants of health and disease.

Outcome 5.2: Apply critical and analytical thinking in a systematic approach to health care issues.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
HSC 323	Social Determinants of Health	
Philosophy Level One		
PHL 250	Philosophy of Death	
Writing Intensive		
HSC 331	Health Sciences Research	
Mission-Overlay		
HSC 251	Healthcare Law and Ethics	
HSC 217	Ethics & Equity Mental Health	

Major Requirements

Code	Title	Hours
Core Requirements		
HSC 110	Intro Health Prof Practice	3

HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research	3
HSC 495	Seminar in Health Sciences	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Statistics (will count for CCC: Mathematics)		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	

Area Studies Courses 15-20

Select five courses. At least three courses must be from Health Sciences.

HSC 216	Alcohol, Drugs and Society
HSC 217	Ethics & Equity Mental Health
HSC 244	Health Information Technology
HSC 248	Health of School Aged Children
HSC 251	Healthcare Law and Ethics
HSC 252	Health Policy
HSC 253	Nutrition: Health & Disease
HSC 256	HIV/AIDS
HSC 276	Health of the Aging Adult
HSC 285	Med Terminology & Health Comm
HSC 345	DyingWell:The Hospice Movement
HSC 354	Diversity Ldrship in Hlth Care
HSC 359	Health Program Planning
HSC 360	Animal Therapy
HSC 368	Just Hlth Care Dev Nations
HSC 370	Special Topics Health Sciences
HSC 390	Medical Terminology
HSC 441	Complementary & Alt Med
HSC 458	Public Health & Epidemiology
HSC 490	Internship in Health Sciences
HSC 493	Independent Study
HSC 494	Independent Study

Other area studies courses

Natural Science Courses

BIO 201	Bio III: Organismic Biology
BIO 270	Clinical Micro
BIO 404	Biochemistry
BIO 406	Human Anatomy
BIO 416	Microbiology
BIO 417	Systemic Physiology
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II

CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II

Humanities Courses

COM 460	Health Communication Advocacy (Humanities Courses)
ENG 450	Health, Advocacy, Storytelling
LIN 270	Topics in Linguistics
LIN 320	Phonetics
THE 349	Theology of Disability

Social Sciences Courses

ECN 390	The Economics of Healthcare
PSY 122	Psychological Disorders
PSY 222	Neuropsychology
PSY 223	Health Psychology
PSY 224	Drugs, the Brain, & Behavior
SOC 217	Mental Health & Society

Exercise Physiology Courses

EPH 120	Foundations: Exercise Science
EPH 210	Athletic Injuries&Sports Rehab
EPH 221	Exercise Pharmacology
EPH 271	Motor Learning
EPH 300	Exercise Testing& Prescription
EPH 301	Exercise Physiology
EPH 340	Exercise Psychology
EPH 380	Introduction to Kinesiology
EPH 387	Biomechanics
EPH 401	Adv Ex Physiology
EPH 421	Pediatric Clinical Ex. Phys
EPH 431	Exercise For Special Popultns

Total Hours 49-55

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Typical Course Sequence for 4-year Health Sciences Major

Course	Title	Hours
First Year		
Fall		
HSC 110	Intro Health Prof Practice	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		14-15
Spring		
HSC 211	Health Care Systems	3
Literature		3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0

World History	3
Area Study (Must be HSC course): HSC 390 Medical Terminology recommended	2
Hours	15
Sophomore	
Fall	
BIO 260 Anat&Physiol for Al Hlth I	4
PHL 250 Philosophy of Death	3
Area Studies (use list)	3
Free Electives	6
Hours	16
Spring	
BIO 261 Anat&Physiol for Al Hlth II	4
Philosophy Level Two	3
HSC 323 Social Determinants of Health	3
Free Electives	6
Hours	16
Junior	
Fall	
MAT 118 Introduction to Statistics or MAT 128 or Applied Statistics	3
MAT 128 Applied Statistics	3
Area Studies (use list)	3
Area Studies (must be HSC course)	3
Free Electives	6
Hours	18
Spring	
HSC 331 Health Sciences Research	3
Social Science	3
Area Studies (must be HSC course)	3
Free Electives	6
Hours	15
Senior	
Fall	
Theology	3
Fine & Performing Arts, Design & Creativity	3
Free Electives	9
Hours	15
Spring	
HSC 495 Seminar in Health Sciences	3
Religious Studies	3
Free Electives	9
Hours	15
Total Hours	124-125

Direct Entry Physical Therapy

Saint Joseph's BS in Health Science to Doctor of Physical Therapy (DPT) prepares you to develop as a skilled practitioner with a fast path to graduation, a full-time clinical education and a wealth of clinical experiences, including pro-bono and collaborative clinics. Earn two degrees — a BS in exercise physiology or health science and a Doctor of Physical Therapy — in under six years without having to re-apply by meeting all academic criteria and program requirements.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		3
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
HSC 323	Social Determinants of Health	
Philosophy Level One		
PHL 250	Philosophy of Death (Natural Science)	
Social Science		
PSY 100	Introductory Psychology	
Writing Intensive		
HSC 331	Health Sciences Research	

Major Requirements

Code	Title	Hours
HSC 110	Intro Health Prof Practice	3
HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Statistics (will count for CCC: Mathematics)		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
Area Studies Courses		
PHY 101	General Physics I (PHY 101L)	3
PHY 102	General Physics II (PHY 102L)	3
CHM 120	General Chemistry I (CHM 120L)	3
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	3
Upper Level Psychology Course		3
Additional Psychology or Social Science Course		3
HSC Area Studies Course		3
Total Hours		52-53

Summer after Junior year begins the professional curriculum for DPT program. (p. 352)

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
HSC 110	Intro Health Prof Practice	3

BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		14-15
Spring		
HSC 211	Health Care Systems	3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
Literature		3
World History		3
PSY 100	Introductory Psychology	3
Hours		16
Sophomore		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
Theology		3
Mission-Specific Course (Mission overlay requirement)		3
Hours		14
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
Religious Studies		3
HSC 323	Social Determinants of Health	3
Hours		14
Junior		
Fall		
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
Upper-Level Psychology		3
PHY 101	General Physics I	3
PHY 101L	General Physics Laboratory I	1
Philosophy Level One		3
Area Studies Course		3
Hours		16
Spring		
HSC 331	Health Sciences Research	3
Philosophy Level Two		3
PHY 102	General Physics II	3
PHY 102L	General Physics Laboratory II	1
Upper-level Psychology or Sociology		3
Fine & Performing Arts, Design & Creativity		3
Hours		16
Senior		
Fall		
P1 Courses in DPT Curriculum		15
Hours		15
Spring		
P1 Courses in DPT Curriculum		15
Hours		15
Total Hours		120-121

Direct Entry Occupational Therapy

Saint Joseph's BS in Health Science degree allows direct entry into graduate Occupational Therapy (DrOT, MOT) and prepares you to develop as a skilled practitioner with an accelerated path to graduation. Guaranteed entry into the profession phase of this program is

dependent on maintaining a grade point average minimum, completing all prerequisite classes, and meeting all requisite shadow hours. The plan of study for direct entry into the DrOT or MOT degrees from the BS degree is similar, both provide the pre-requisite courses for progression into graduate study.

The Doctor of Occupational Therapy is a doctorate degree that prepares you to become a successful OT practitioner, researcher, and leader in a variety of medical and community settings. It's the highest level of formal education available to entry-level occupational therapists. By earning your clinical doctorate degree in occupational therapy from Saint Joseph's University, you'll gain not only the knowledge and skills to make a meaningful impact on patient care, but the skills of an advanced critical thinker and innovator for the profession of occupational therapy.

The Master's of Occupational Therapy is a masters degree that provides preparation needed to become a registered occupational therapist (OTR) and earn a degree that prepares you for professional practice. Occupational Therapists help clients develop the functional capacity to live independently, care for personal needs and participate in work, school or community activities across one's lifespan.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
	Philosophy Level One	3
	Philosophy Level Two	3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
	Theology	3
	Religious Studies	3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
	Diversity	3
	INT 151 Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Diversity		
HSC 323	Social Determinants of Health	
Philosophy Level One		
PHL 250	Philosophy of Death	
Social Science		
SOC 101	Intro to Sociology	
Writing Intensive		
HSC 331	Health Sciences Research	

Major Requirements

Code	Title	Hours
HSC 110	Intro Health Prof Practice	3
HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research	3
HSC 390	Medical Terminology	1-2
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for AI Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for AI Hlth II	4

BIO 261L	Anatomy & Physiology Lab II	0
Statistics (will count for CCC: Mathematics)		3-4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
Area Studies Courses		18
At least three courses must be from the Health Science area.		
Total Hours		50-52

Summer after Junior year begins the professional curriculum for DrOT (p. 330) and MOT (p. 331) programs

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
HSC 110	Intro Health Prof Practice	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		14-15
Spring		
HSC 211	Health Care Systems	3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
Literature		3
World History		3
SOC 101	Intro to Sociology	3
Hours		16
Sophomore		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
PHL 250	Philosophy of Death	3
PSY 120	Lifespan Development	3
Area Studies		3
Mission Specific Course (Mission overlay req.)		3
Hours		16
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Philosophy Level Two		3
HSC 323	Social Determinants of Health	3
Fine & Performing Arts, Design & Creativity		3
HSC 390	Medical Terminology	1-2
Free Elective		3
Hours		17-18
Junior		
Fall		
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
Area Studies		3
Area Studies		3
Religious Studies		3
Free Elective		3
Hours		15
Spring		
HSC 331	Health Sciences Research	3
PSY 122	Psychological Disorders	3

Theology	3
Free Electives	6
Hours	15
Senior	
Fall	
P1 Courses in DPT Curriculum	15
Hours	15
Spring	
P1 Courses in DPT Curriculum	15
Hours	15
Total Hours	123-125

Physician Assistant Pathway

The health sciences physician assistant pathway provides a curriculum to prepare you for graduate programs in Physician Assistant Studies. Choose from an accelerated 3-year or traditional 4-year pathway embedded with the required prerequisites for the SJU Master’s in Physician Assistant Studies program (MSPAS). Students who meet progression and application requirements earn a guaranteed interview for the SJU MSPAS program.

Progression Standards

Health Sciences majors accepted into the Physician Assistant Pathway must meet all progression standards listed below to be guaranteed an interview by the SJU Physician Assistant (PA) Program. The granting of an interview does not guarantee admission into the PA program.

Progression Standards:

- Achieve a minimum cumulative GPA and PA prerequisite course GPA of 3.0 by the end of the first undergraduate year (completion of 30 to 36 course credits).
- Achieve a minimum cumulative GPA and PA prerequisite course GPA of 3.2 by the end of the second undergraduate year (completion of 60 to 72 credits) for the 3+ pathway or at the end of the third undergraduate year for the 4+ pathway.
- Complete all PA program prerequisite courses with a grade of “C” or better by the end of the spring term preceding enrollment into the professional phase of the program.
- GPA calculations will include the grades from all instances that a course was taken at SJU or elsewhere.
- Complete 350 hours of direct patient contact hours by the end of the spring term preceding enrollment into the professional phase of the program.
- Submit all PA program admission materials through the CASPA website in accordance with current PA program policies and deadlines.

If the above progression criteria are met, students earn an interview with the SJU MSPAS program. Admission is not guaranteed.

For students successfully completing the Accelerated 3+2 BSHS/ MSPAS pathway, a Bachelor’s degree in Health Sciences is awarded in transit to earning the MSPAS degree after the fall semester of the first professional year. Those successfully completing the 4+ pathway will earn their bachelor’s degree in Health Sciences prior to entering the MSPAS program. A Master’s degree in Physician Assistant Studies is awarded following successful completion of the professional phase of the program.

If a student does not meet progression criteria to earn a guaranteed interview or if they are denied admission after an interview, they can continue pursuing their Bachelor of Science in Health Sciences degree or request a change of major to other degree programs. Students are eligible to apply to the SJU MSPAS program while completing their Bachelor's degree, however there is no guarantee of an interview or admission.

If a student wishes to change pathways (from accelerated to traditional or vice-versa), they must request this through a change of major form prior to an interview with the SJU MSPAS program.

3+ Pathway Requirements and Typical Course Sequence

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Philosophy Level One		
PHL 250	Philosophy of Death	
Diversity		
HSC 323	Social Determinants of Health	
Social Science		
PSY 100	Introductory Psychology	
Writing Intensive		
HSC 331	Health Sciences Research	

Major Requirements

Code	Title	Hours
HSC 110	Intro Health Prof Practice	3
HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research	3
HSC 390	Medical Terminology	1-2
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for AI Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for AI Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
BIO 270	Clinical Micro	4
BIO 270L	Clinical Microbiology Lab	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1

Pick one:		4
CHM 210	Organic Chemistry I	
CHM 210L	Organic Chemistry Lab I	
BIO 404	Biochemistry	
Mathematics (will count as CCC: Mathematics)		4
MAT 118	Introduction to Statistics	
MAT 128	Applied Statistics	
Three HSC area studies courses		9
Total Hours		58-59

Summer after Junior year begins the professional curriculum for the MSPAS program (p. 354).

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
HSC 110	Intro Health Prof Practice	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
Non-Native Language		3-4
INT 151	Inequality in American Society	1
Hours		14-15
Spring		
HSC 211	Health Care Systems	3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
Literature		3
World History		3
PSY 100	Introductory Psychology	3
Hours		16
Sophomore		
Fall		
BIO 260	Anat&Physiol for Al Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
Religious Studies		3
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
HSC 390	Medical Terminology	1-2
Fine & Performing Arts, Design & Creativity		3
Hours		15-16
Spring		
BIO 261	Anat&Physiol for Al Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Theology		3
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
HSC 323	Social Determinants of Health	3
HSC Area Studies Course		3
Hours		17
Junior		
Fall		
PHL 250	Philosophy of Death	3
BIO 270	Clinical Micro	4

BIO 270L	Clinical Microbiology Lab	0
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
Hours		14
Senior		
Fall		
HSC 331	Health Sciences Research	3
HSC Area Studies Courses		6
Philosophy Level Two (Ethics)		3
Free Elective		3
Hours		15
Senior		
Fall		
P1 Courses in MSPAS Curriculum		15
Hours		15
Spring		
P1 Courses in MSPAS Curriculum		18
Hours		18
Total Hours		124-126

4+ Pathway Requirements and Typical Course Sequence

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics 3-4

Natural Science 4

Social Science Requirement 3

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement 3-4

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement 3

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement 3

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive 3

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay 3

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours 47-49

Recommended CCC Courses

Code Title Hours

Philosophy Level One

PHL 250 Philosophy of Death

Diversity

HSC 323 Social Determinants of Health

Social Science

PSY 100 Introductory Psychology

Writing Intensive

HSC 331 Health Sciences Research

Major Requirements

Code Title Hours

HSC 110 Intro Health Prof Practice 3

HSC 211 Health Care Systems 3

HSC 323 Social Determinants of Health 3

HSC 331 Health Sciences Research 3

HSC 390 Medical Terminology 1-2

HSC 495 Seminar in Health Sciences 3

BIO 101 Bio I: Cells 4

BIO 101L Bio I: Cells Lab 0

BIO 102 Bio II: Genetics 4

BIO 102L Bio II: Genetics Lab 0

BIO 260 Anat&Physiol for AI Hlth I 4

BIO 260L Anatomy & Physiology Lab I 0

BIO 261 Anat&Physiol for AI Hlth II 4

BIO 261L Anatomy & Physiology Lab II 0

BIO 270 Clinical Micro 4

BIO 270L Clinical Microbiology Lab 0

CHM 120 General Chemistry I 3

CHM 120L General Chemistry Lab I 1

CHM 125 General Chemistry II 3

CHM 125L General Chemistry Lab II 1

Pick one: 4

CHM 210 Organic Chemistry I

CHM 210L Organic Chemistry Lab I

BIO 404 Biochemistry

Mathematics (will count as CCC: Mathematics) 4

MAT 118 Introduction to Statistics

MAT 128 Applied Statistics

Three HSC area studies courses 9

Total Hours 61-62

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course Title Hours

First Year

Fall

HSC 110 Intro Health Prof Practice 3

BIO 101 Bio I: Cells 4

BIO 101L Bio I: Cells Lab 0

ENG 101 Craft of Language 3

Non-Native Language 3-4

INT 151 Inequality in American Society 1

Hours 14-15

Spring

HSC 211 Health Care Systems 3

BIO 102 Bio II: Genetics 4

BIO 102L Bio II: Genetics Lab 0

Literature 3

World History 3

PSY 100 Introductory Psychology 3

Hours 16

Sophomore

Fall

BIO 260 Anat&Physiol for AI Hlth I 4

BIO 260L Anatomy & Physiology Lab I 0

Theology 3

HSC 390 Medical Terminology 1-2

CHM 120 General Chemistry I 3

CHM 120L General Chemistry Lab I 1

Free Elective 3

Hours 15-16

Spring

BIO 261 Anat&Physiol for AI Hlth II 4

BIO 261L Anatomy & Physiology Lab II 0

Fine & Performing Arts, Design & Creativity 3

HSC 323 Social Determinants of Health 3

CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
Free Elective		3
Hours		17
Junior		
Fall		
HSC Area Studies Course		3
Free Electives		6
PHL 250	Philosophy of Death	3
MAT 118 or MAT 128	Introduction to Statistics or Applied Statistics	3
Hours		15
Spring		
HSC 331	Health Sciences Research	3
Mission-Overlay		3
Free Electives		9
Hours		15
Senior		
Fall		
BIO 270	Clinical Micro	4
BIO 270L	Clinical Microbiology Lab	0
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
HSC Area Studies Course		3
Free Elective		3
Hours		14
Spring		
HSC 495	Seminar in Health Sciences	3
HSC Area Studies Course		3
Philosophy Level Two (Ethics)		3
Religious Studies		3
Free Elective		3
Hours		15
Total Hours		121-123

Clinical Leadership Concentration

The Clinical Leadership Concentration within the Health Sciences major will prepare students to apply for and succeed in leadership positions in healthcare. The concentration is open to students at the Lancaster location who are transitioning from an Associate’s Degree in an Allied Health Field to the Bachelor of Science in Health Science (BSHS).

The concentration consists of five required courses, one of which will be of the student’s choosing from a discrete list of options. Students must also meet all general education requirements and reach a minimum of 120 credits to earn the BSHS degree.

Core Requirements: If one of these PHL/THE courses were completed as part of your Bachelor’s program @ SJU, they will apply to the core requirements; however, to meet program credit hours a student will need to take a 3 credit general elective. Please see the Block Transfer policy (p. 15) for more information.

Transfer of Associates Degree courses will transfer in under "Block" up to 60 credits

Must Be Taken at SJU

Code	Title	Hours
PHL Level 1 Core Requirement		3
THL Core Requirement		3

Mission-Overlay	3
Total Hours	9

Major Requirements

Code	Title	Hours
INT 322	Teaching and Learning	3
HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research	3
HSC 495	Seminar in Health Sciences	3
MAT 128	Applied Statistics (will count for CCC: Mathematics)	3
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
BIO 260	Anat&Physiol for AI Hlth I	4
BIO 260L	Anatomy & Physiology Lab I	0
BIO 261	Anat&Physiol for AI Hlth II	4
BIO 261L	Anatomy & Physiology Lab II	0
Clinical Leadership Concentration		
HSC 252	Health Policy	3
HSC 300	Fin Mgmt & Analysis in Hlthcr	3
HSC 329	Clinical Leadership	3
HSC 370	Special Topics Health Sciences	3
Select one:		3
HSC 244	Health Information Technology	
HSC 251	Healthcare Law and Ethics	
HSC 354	Diversity Ldrship in Hlth Care	
HSC 362	Fin Accounting for Health Sci	
HSC 458	Public Health & Epidemiology	
Total Hours		49

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
HSC 329	Clinical Leadership	3
INT 322	Teaching and Learning	3
Free Elective		3
Hours		9
Spring		
HSC 323	Social Determinants of Health	3
Philosophy Level One		3
Free Elective		3
Hours		9
Summer		
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
Hours		8

Second Year		
Fall		
HSC 252	Health Policy	3
HSC 300	Fin Mgmt & Analysis in Hlthcr	3
Free Elective		3
Hours		9
Spring		
HSC 211	Health Care Systems	3
HSC 370	Special Topics Health Sciences	3
Free Elective		3
Hours		9
Third Year		
Fall		
Theology		3
Free Electives		6
Hours		9
Spring		
HSC 331	Health Sciences Research	3
Major Elective		3
HSC 495	Seminar in Health Sciences	3
Hours		9
Total Hours		62

Health Sciences Minor

Learning Goals and Outcomes

Goal 1: Students will demonstrate literacy in the language of health professions.

Outcome 1.1: Students will effectively use the terminology and language of the health professions.

Outcome 1.2: Students will be able to analyze regional, national and global health data and to draw logical conclusions based on health data.

Goal 2: Students will follow ethical codes of conduct of the health professions.

Outcome 2.1: Graduates will follow and promote ethical conduct reflecting Jesuit values, specifically the values of honesty, respect for persons, and justice.

Outcome 2.2: Graduates will act as global citizens, holding personal and career objectives that honor and serve the beneficence of people in need.

Requirements

Code	Title	Hours
HSC 110	Intro Health Prof Practice	3
HSC 211	Health Care Systems	3
HSC 323	Social Determinants of Health	3
HSC 331	Health Sciences Research (Pharmaceutical marketing majors who have completed PMK 221, or Linguistics majors who have completed LIN 420 may substitute an additional HSC course)	3
Select two Health Sciences elective courses		6
Total Hours		18

Occupational Therapy

The Department of Occupational Therapy at Saint Joseph's University strives to impart the knowledge and skill set needed to make a meaningful impact on patient care. Through innovative teaching, we prepare you to work in a variety of medical and community settings and become a leader in this flourishing field.

Occupational therapy at Saint Joseph's University consistently delivers a solid, well-rounded and fully encompassed curriculum resulting in well-trained, competent and professional graduates who are employed in their practice setting of choice. We were third in the nation to attain occupational therapy accreditation for entry-level doctoral education and the first of its kind on the East Coast.

Our department has adapted to the ever-changing demands of the healthcare industry and remains an outstanding program of success evidenced by our exemplary National Board Certification in Occupational Therapy (NBCOT) board student pass rates. Join us and learn how to support those in need with one of our three accredited OT programs.

Both the Master of Occupational Therapy program (MOT) and the Doctor of Occupational Therapy (DrOT) programs are fully accredited by the Accreditation Council for Occupational Therapy Education (ACOTE) of the American Occupational Therapy Association (AOTA). ACOTE is recognized by the U.S. Department of Education.

More information can be obtained at:

ACOTE
c/o Accreditation Department
American Occupational Therapy Association (AOTA)
7501 Wisconsin Avenue
Suite 510E
Bethesda, MD 20852-4929
(301) 652-6611
www.acoteonline.org (<http://www.acoteonline.org/>)

Faculty

Our award-winning faculty are active practitioners who come from a variety of clinical backgrounds, allowing them to bring a wealth of practical knowledge and depth to your learning experience. Their research explores topics including technology, interventions, political action and social and occupational justice issues.

Department of Occupational Therapy Faculty (<https://www.sju.edu/departments/occupational-therapy/faculty/>)

Programs Undergraduate

- Health Sciences Direct Entry into Occupational Therapy (DrOT or MOT) (p. 322)

Graduate

- Occupational Therapy (p. 331)

Doctoral

- Occupational Therapy (p. 330)

Doctor of Occupational Therapy

A post-baccalaureate entry to the Doctor of Occupational Therapy (DrOT) is a doctorate degree that prepares you to become a successful OT practitioner, researcher or leader in a variety of medical and community settings. It's the highest level of formal education available to entry-level occupational therapists. By earning your occupational therapy degree from Saint Joseph's University, you'll gain the knowledge and skills to make a meaningful impact on patient care.

Saint Joseph's accredited DrOT program offers the opportunity to work with patients of all ages in the Greater Philadelphia area and neighboring states every semester starting in your first semester through fieldwork experiences and a doctoral capstone project. You'll also get to publish research and collaborate with noted professors (<https://www.sju.edu/departments/occupational-therapy/faculty/>) on grant-funded projects and network with students and alumni in student organizations like the Student Occupational Therapy Association.

Please note the DrOT program has two entry-pathway options. The accelerated entry is for freshman and transfer applicants who enter as a health science major for the first three years of study and then transition into the professional program curriculum to complete their combined bachelors of Health Sciences and Doctor of Occupational Therapy degrees in 6 years. There is also a post-baccalaureate Doctor of Occupational Therapy entry pathway for those who have earned a bachelor's degree and meet all program prerequisite requirements. These students complete a 3-year plan of study to earn the Doctor of Occupational Therapy degree.

Learning Goals and Outcomes

Goal 1: Graduates of the DrOT Program will be informed practitioners in current healthcare systems.

Outcome 1.1: Graduates will use advocacy and leadership principles and practices to advance the profession of occupational therapy.

Outcome 1.2: Graduates will be able to describe and integrate relevant occupational therapy historical concepts to inform current clinical practice.

Goal 2: Graduates of the DrOT Program will have the foundational knowledge of human systems, environmental contexts, and systems integration to establish good clinical reasoning and therapeutic practice for those they serve.

Outcome 2.1: Graduates will develop literacy in the language of health professions and be facile users of the Occupational Therapy Practice Framework.

Outcome 2.2: Graduates be able to evaluate diverse individuals, groups, and populations for the provision of client-centered and evidence-based practice.

Outcome 2.3: Graduates will know and understand the application of therapeutic intervention for the practice of occupational therapy.

Goal 3: Graduates of the DrOT Program will follow and promote ethical conduct reflecting Jesuit values, specifically the values of honesty, respect for persons, and justice.

Outcome 3.1: Graduates will be able to know, understand, and apply to client care and professional practice the moral and ethical principles outlined in the Occupational Therapy Code of Ethics.

Outcome 3.2: Graduates will be able to learn, grow, and develop their roles as a leaders, competent professionals, and service providers through opportunities present in the DrOT Program.

Goal 4: Graduates of the DrOT Program will be innovators and leaders within the field of occupational therapy

Outcome 4.1: Graduates will develop competency in the dissemination of scholarship for continued contribution toward evidence-based occupational therapy practice and professional longevity.

Requirements

Code	Title	Hours
OTH 405	Overview of O.T. Practice	2
OTH 500	Level I Experiences Sem	1
OTH 501	Doctoral Seminar 1	1
OTH 502	Human Development & Perform	3
OTH 502L	Human Dev & Perform Lab	0
OTH 508	Movement Analysis	3
OTH 508L	Movement Analysis Lab	0
OTH 510	Neuroscience	4
OTH 510L	Neuroscience Lab	0
OTH 519	Intro to Clinical Skills	3
OTH 519L	Intro to Clinical Skills Lab	0
OTH 531	Clinical Medicine	3
OTH 551	Human Occ: Cncpts & Prctce	3
OTH 551L	Human Occ: Cncpts & Prctce Lab	0
OTH 555	Evaluation & Assessment: OT	3
OTH 555L	Evaluation & Assessment: OTLab	0
OTH 562	Theories of OT	3
OTH 590	Fieldwork Level I: Clinical Exp	1
OTH 602	Doctoral Seminar II	1
OTH 603	Doctoral Seminar 2	2
OTH 615	Therapeutic Groups	3
OTH 615L	Therapeutic Groups Lab	0
OTH 620	Fieldwork Level I: Clinical	1
OTH 623	FWK1: Comm Service Learning	1
OTH 624	Interventions I: Contextual Ap	4
OTH 624L	Interventions I: Cntxtl Ap Lab	0
OTH 634	Interventions II: Developmenta	4
OTH 634L	Interventions II: Develop Lab	0
OTH 636	Clin Ldrshp, Mgmt, & Supervision	3
OTH 644	Interventions III: Psychosocia	4
OTH 644L	Interventions III: Psychosoc L	0
OTH 650	Applied Research Methods	3
OTH 652	OT Interventions IV: Cognitive	3
OTH 652L	OT Interventions IV: Cogni Lab	0
OTH 660	Applied Research II	3
OTH 664	Interventions V: Rehab Approach	4
OTH 664L	Interventions V: Rehab App Lab	0

OTH 665	Applied Research III	3
OTH 668	Evidence-Based Practice	3
OTH 672	OT Interventions VI:Technology	3
OTH 672L	OT Interventions V: Tech Lab	0
OTH 675	Research Independent Study	6
OTH 677	Capstone Development 2	3
OTH 681	OT: Past, Present, & Future	2
OTH 682	Fieldwork I: Community Client	1
OTH 687	FW 1f: Program Development	2
OTH 693	Capstone Development 1	2
OTH 694	Fieldwork Level IIa	9
OTH 697	Doctoral Experience Component	12
OTH 698	Fieldwork Level IIb	9
OTH 699	Special Topics in OT (or other offered electives, semester dependent)	3
OTH 703	Doctoral Seminar III	1
OTH 704	Doctoral Seminar 3	3
OTH 706	Doctoral Experiential	12
OTH 711	Doctoral Capstone Project	3
Total Hours		143

Master of Occupational Therapy

A post-baccalaureate entry to the Master of Occupational Therapy (MOT) program is an excellent option if you are seeking a career in occupational therapy. If you currently hold a bachelor's degree and have taken our prerequisite courses, you can complete the program in just two years of study, plus two 12-week fieldwork experiences. Through an established curriculum based on active learning, you'll gain the knowledge and skills to make a meaningful impact on patient care.

Please note the MOT program has two entry-pathway options. The accelerated entry is for freshman and transfer applicants who enter as a health science major for the first three years of study and then transition into the professional program curriculum to complete their combined bachelor of Health Sciences and Master of Occupational Therapy degrees in 5.5 years. There is also a post-baccalaureate Master of Occupational Therapy entry pathway for those who have earned a bachelor's degree and meet all program prerequisite requirements. These students complete a 2.5-year plan of study to earn the Master of Occupational Therapy degree.

Learning Goals and Outcomes

Goal 1: Graduates of the MOT Program will be informed practitioners in current healthcare systems.

Outcome 1.1: Graduates will use advocacy and leadership principles and practices to advance the profession of occupational therapy.

Outcome 1.2: Graduates will be able to describe and integrate relevant occupational therapy historical concepts to inform current clinical practice.

Goal 2: Graduates of the MOT Program will have the foundational knowledge of human systems, environmental contexts, and systems integration to establish good clinical reasoning and therapeutic practice for those they serve.

Outcome 2.1: Graduates will develop literacy in the language of health professions and be facile users of the Occupational Therapy Practice Framework.

Outcome 2.2: Graduates be able to evaluate diverse individuals, groups, and populations for the provision of client-centered and evidence-based practice.

Outcome 2.3: Graduates will know and understand the application of therapeutic intervention for the practice of occupational therapy.

Goal 3: Graduates of the MOT Program will follow and promote ethical conduct reflecting Jesuit values, specifically the values of honesty, respect for persons, and justice.

Outcome 3.1: Graduates will be able to know, understand, and apply to client care and professional practice the moral and ethical principles outlined in the Occupational Therapy Code of Ethics.

Outcome 3.2: Graduates will be able to learn, grow, and develop their roles as a leaders, competent professionals, and service providers through opportunities present in the MOT Program.

Requirements

Code	Title	Hours
OTH 405	Overview of O.T. Practice	2
OTH 500	Level I Experiences Sem	1
OTH 502	Human Development & Perform	3
OTH 502L	Human Dev & Perform Lab	0
OTH 508	Movement Analysis	3
OTH 508L	Movement Analysis Lab	0
OTH 510	Neuroscience	4
OTH 510L	Neuroscience Lab	0
OTH 519	Intro to Clinical Skills	3
OTH 519L	Intro to Clinical Skills Lab	0
OTH 531	Clinical Medicine	3
OTH 551	Human Occ: Cncpts & Prctce	3
OTH 551L	Human Occ: Cncpts & Prctce Lab	0
OTH 555	Evaluation & Assessment: OT	3
OTH 555L	Evaluation & Assessment: OTLab	0
OTH 562	Theories of OT	3
OTH 572	Clinical Mgmt & Supervision	3
OTH 590	Fieldwork Level I: Clinical Exp	1
OTH 615	Therapeutic Groups	3
OTH 615L	Therapeutic Groups Lab	0
OTH 620	Fieldwork Level I: Clinical	1
OTH 623	FWK1:Comm Service Learning	1
OTH 624	Interventions I: Contextual Ap	4
OTH 624L	Interventions I: Cntxtl Ap Lab	0
OTH 634	Interventions II: Developmenta	4
OTH 634L	Interventions II: Develop Lab	0
OTH 644	Interventions III: Psychosocia	4
OTH 650	Applied Research Methods	3
OTH 644L	Interventions III: Psychosoc L	0
OTH 652	OT Interventions IV: Cognitive	3
OTH 652L	OT Interventions IV: Cogni Lab	0
OTH 664	Interventions V: Rehab Approac	4

OTH 664L	Interventions V: Rehab App Lab	0
OTH 668	Evidence-Based Practice	3
OTH 672	OT Interventions VI: Technology	3
OTH 672L	OT Interventions V: Tech Lab	0
OTH 681	OT: Past, Present, & Future	2
OTH 682	Fieldwork I: Community Client	1
OTH 694	Fieldwork Level IIa	9
OTH 698	Fieldwork Level IIb	9
OTH 699	Special Topics in OT (or other offered electives, semester dependent)	3
Total Hours		89

Philadelphia College of Pharmacy

Dean: Edward Foote, PharmD, FCCP

Assistant Dean: Lisa Charneski, PharmD, BCPS

Assistant Dean: Laura Waite, PharmD, BCPS, CLS

Assistant Dean: Scott Greene, RPh, MS, PharmD

Philadelphia College of Pharmacy (<https://www.sju.edu/departments/philadelphia-college-pharmacy/faculty-staff/>) Faculty Listing (<https://www.sju.edu/departments/philadelphia-college-pharmacy/faculty-staff/?page=1>)

Home to programs in pharmacy, pharmaceutical sciences and pharmacology and toxicology, the Philadelphia College of Pharmacy (PCP) is where modern pharmacy started. Since its founding in 1821 as the first college of pharmacy in North America, names like McNeil, Lilly, Wyeth — founders of the top pharmaceutical companies in the world — and many others have launched their careers here. We continue that tradition of excellence with our hands-on approach, offering future pharmacists clinical experience — practically from day one.

Graduates play important roles in pharmacies, managed care organizations, hospitals, pharmaceutical companies, and regulatory agencies.

The mission of the PCP is to educate and develop students to become leaders and innovators in patient care, research, and business who are differentiated by their professional and ethical values.

Mission, Vision and Values

The vision of the Philadelphia College of Pharmacy (PCP) is that it will be globally recognized for developing learners who excel in innovative, compassionate, collaborative, evidence-based patient care and practice, scientific advancements, research and healthcare business.

The core values of PCP are:

PCP is an inclusive and collaborative community of students, faculty, alumni and staff who together pursue excellence in a setting focused on personal and professional growth.

PCP is a scholarly community where students, faculty, alumni and staff collaborate in advancing the profession of pharmacy.

PCP provides a student centered educational experience in which the development of students' intellectual and professional strengths and emotional intelligence are of paramount importance.

PCP equips students with the tools for critical thinking and life-long learning.

Members of the PCP community conduct their affairs in a collegial manner with a clear sense of duty, integrity, accountability and caring.

Members of the PCP community contribute to the broader communities in which they live and work.

PCP is dedicated to students' acquisition and integration of the requisite knowledge, skills, values and attitudes that enable them to become educated and responsible citizens, competent healthcare, and scientific professionals, life-long learners and leaders. Its educational philosophy is learner-centered and developmental, building knowledge, skills, and self-confidence in an incremental manner, with a focus on "learning and knowing by doing". The objectives of this approach are accomplished by the use of active learning techniques within the classroom, the development of analytical and problem solving skills through individualized and integrated application exercises, as well as extensive practice and research experiences that allow application of learned knowledge in and out of the classroom. Students are also engaged via co-curricular activities including college and professional organizations, and interactions in a formalized faculty and peer mentor program.

Philadelphia College of Pharmacy Dean's Office

The Philadelphia College of Pharmacy (PCP) at Saint Joseph's University's Bachelor of Science in Pharmaceutical and Healthcare Studies to Doctor of Pharmacy (PharmD) is a six-year program with a unique, competency-driven professional curriculum that prepares undergraduate and transfer students to emerge as leaders in the pharmacy profession. You'll enjoy a robust mix of classroom and lab learning experiences, along with experiential learning opportunities that expose you to different practice environments.

This program features a two-phase education for undergraduate students interested in early admission to PCP's accredited PharmD program — no PCAT or GRE required. You can enter this program as an incoming first-year student through our direct-entry admission pathway, earning a BS and PharmD degrees in as little as six years after graduation from high school. You may also enter the pre-professional phase (Year 1 or 2) or professional phase (Year 3) of the six-year BS/PharmD program as a transfer student depending on the prerequisites you've completed.

Housed in Saint Joseph's University's historic Philadelphia College of Pharmacy, North America's first pharmacy school, the top-ranking Doctor of Pharmacy (PharmD) program prepares students for successful careers in pharmacy. Our four-year PharmD degree features a competency-driven professional curriculum that mirrors the complex realities of modern practice. This includes a unique experiential learning component that offers the opportunity to work alongside pharmacists in real-world practice settings starting the first month of your first year.

Learning Goals and Outcomes

Philadelphia College of Pharmacy is dedicated to students' acquisition and integration of the requisite knowledge, skills, values and attitudes that enable them to become educated and responsible citizens, competent healthcare, and scientific professionals, life-long learners, and leaders. Its educational philosophy is learner-centered and

developmental, building knowledge, skills, and self-confidence in an incremental manner, with a focus on “learning and knowing by doing.” The objectives of this approach are accomplished by the use of active learning techniques within the classroom, the development of analytical and problem-solving skills through individualized and integrated application exercises, as well as extensive practice and research experiences that allow the application of learned knowledge in and out of the classroom. Students are also engaged via co-curricular activities, including college and professional organizations, and interactions in a formalized faculty and peer mentor program.

Pathways

You can enter the PharmD program in the following ways:

Direct-entry/6-Year PharmD: Enter as a first-year student to earn a BS in pharmaceutical and healthcare studies and a PharmD in just six years.

Transfer: Enter the pre-professional phase (Year 1 or 2) of the six-year BS/PharmD program or the professional phase (Year 3), depending on the prerequisites you've completed.

Post-graduate student: Enter the professional phase of the program if you have a bachelor's degree and have completed all admission requirements. — no PCAT or GRE required. We also offer pathways for students who do not hold a bachelor's degree.

Direct Entry students will transition seamlessly to the professional phase of the program and start their four years of fully integrated, competency-driven coursework by meeting all progression requirements. The curriculum builds on foundational knowledge and skills, encouraging proficiency in a range of subjects, from human disease and pharmacology to pharmaceuticals, therapeutics and pharmacoeconomics. You'll also gain hands-on experience through our more than 400 clinical affiliation partner sites across the country — including some of the most renowned hospitals, medical centers, pharmaceutical companies and regulatory agencies. Transfer students may also enter the program at this phase if they've completed all required prerequisites.

Non-Curricular Requirements PCP Program Entry and Technical Standards

The most common route for entry into either the Doctor of Pharmacy program or one of the BS programs is directly from high school. Admission evaluations are handled by the University Admissions Department in consultation with program directors and, for the PharmD program, the Assistant Dean for PCP Student Affairs and Admissions. The University Admissions Department also handles admissions of transfer students into the first undergraduate year, the second undergraduate year, or first professional year of the PharmD program, as well as into all years of the BS programs. Students who are accepted into the PharmD program must affirm that they have reviewed and agree that they are capable of meeting the College of Pharmacy's technical standards with or without accommodations. The most current technical standards can be found on the University web page (<https://www.sju.edu/departments/philadelphia-college-pharmacy/about/#technical-standardscollege-of-pharmacy/pharmacy-pharmd/technical-standardshtml>). Technical standards are reviewed and re-affirmed each academic year. Prior to matriculation into the PharmD program, students from all entry pathways must complete a PharmCAS application.

Residency Requirements

Direct-entry PharmD students have up to 8 semesters to complete pre-professional coursework (excluding summer sessions or intersessions).

Students admitted into the first professional year (P1) of the Doctor of Pharmacy Program must be enrolled for at least four years (i.e., 8 semesters of at least 12 credits/semester) in residency at PCP, regardless of the extent or nature of previous academic experience. Such students entering into P1 will receive transfer credit for those basic sciences and general education courses that are considered equivalent in content and semester credit to similar courses included in the pharmacy curriculum as long as they receive a grade of “C” or better.

To earn an undergraduate degree from PCP, per the SJU Catalog, a student must successfully complete at least 60 credits of eligible coursework offered by the University, with the final 30 credits of the degree completed at SJU. Eligible coursework results in a letter grade that contributes to a student's calculated grade point average (GPA). Catalog year for transfer students will be backdated to the Catalog Year when they would have started attending the University as a first-year student.

The maximum amount of time to complete all requirements to earn a BS degree in PCP is six years from entry as a freshman to Saint Joseph's University. If residency exceeds 6 years to earn a BS degree in PCP, then a student's educational plan may be adjusted to reflect current University educational requirements. For the PharmD program, students have a maximum of six years from entry into the first professional year (P1) of the program to complete all degree requirements. The inability to complete all degree requirements in the allotted time frame will result in the student being withdrawn from the program. Approved leaves of absence are not counted as part of the maximum time to degree.

Pharmacy Student to Student Pharmacist transition: pre-professional to professional phase

For direct entry PharmD students, automatic progression from undergraduate status into P1 (first professional year) occurs when the following criteria are met:

1. Completion of all required pre-professional and undergraduate coursework resulting in a minimum cumulative GPA of 2.70 and a minimum natural science/math GPA of 2.50. These GPA requirements must be met by the end of the spring semester prior to the fall semester in which the student expects to matriculate.
2. Successful completion of the Professional Education Readiness Competency (PERC) interview.
3. Completed PharmCAS application.

Students who do not meet these criteria will be withdrawn from the program; if their cumulative GPA is above 2.50 at the end of the spring semester prior to the fall in which the student expects to matriculate, these students will be reviewed for readmission into the program by the PCP Admissions Committee.

PERC Interview

The PERC interview is a standardized, behavioral-based interview to assess students' readiness for professional education, and is mandated for compliance with accreditation standards. It is separate and distinct

from the academic standards for automatic progression into the professional component of the Doctor of Pharmacy program. The standardized interview is a confidential, thirty-minute "conversation with a purpose", between the student and two PCP faculty/professional staff members. Candidates are required to complete a confidentiality agreement. If the student is unsuccessful in their first attempt, a success plan with suggested readings and activities to improve the student's knowledge base, confidence, and ability to communicate their perspectives will be provided to the student. A second and final opportunity to successfully complete the PERC interview will be provided in the spring semester. If, after two opportunities, the student does not successfully complete the PERC interview, the student will be withdrawn from the PharmD program even if the other criteria for progression into the professional years are met. If such an event should occur, the student may opt to apply for a change of major to other PCP or University programs. Further information about the PERC interview process is communicated to students through class meetings and through the PCP Dean's Office.

Students who are withdrawn from the PharmD program may apply to other programs at the University.

Undergraduate Curriculum Plan Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
If approved, such Social Science Requirement may count toward a student's overlay requirements.	
Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Recommended CCC Courses

Code	Title	Hours
Non Native Language		
SPA 105	Beginning Span for Healthcare	
Social Science		
ECN 101	Introductory Economics Micro	
or ECN 102	Introductory Economics Macro	
Diversity		
PRX 410	Health Eq and Pt Care in Pharm	
Writing Intensive		
PRX 435	Lit Eval & Evidence-Based Med	
Mission-Overlay: Ethics and Social Justice		
PRX 415	Fndtns Healthcare Policy/Law	

Major Requirements

Code	Title	Hours
Calculus (will count for CCC: Mathematics)		3-4
MAT 145	Precalculus: Intro to Calculus	
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0

CHM 120	General Chemistry I (will count for CCC: Natural Science)	3
CHM 120L	General Chemistry Lab I (will count for CCC: Natural Science)	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
BIO 202		3
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
BIO 270	Clinical Micro	4
BIO 270L	Clinical Microbiology Lab	0
CHM 215	Organic Chemistry II	3
PHY 121	Physics for Pharmacy	3-4
or PHY 101 & 101L	General Physics I and General Physics Laboratory I	
BIO 203		3
MAT 128	Applied Statistics	3
ECN 101	Introductory Economics Micro	3
or ECN 102	Introductory Economics Macro	
PRX 301	Extrinsic Summative AR I	1
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 410	Health Eq and Pt Care in Pharm	3
PRX 418	Pharmacy-Based Immu Delivery	1
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 440	Foundations of Pharm Sci 3	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
or PRX 490	IPPE 4: Institutional Pharmacy	

Total Hours **111-113**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1

BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
MAT 145	Precalculus: Intro to Calculus	4
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1

Hours **16**

Spring		
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
World History		3
Non-native Language (SPA 105)		3-4
Theology		3

Hours **17-18**

Second Year		
Fall		
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
BIO 270	Clinical Micro	4
BIO 270L	Clinical Microbiology Lab	0
BIO 202		3
Philosophy Level One		3
Literature		3

Hours **17**

Spring		
CHM 215	Organic Chemistry II (no lab required)	3
PHY 121	Physics for Pharmacy	3
MAT 128	Applied Statistics	3
BIO 203		3
Fine & Performing Arts, Design, & Creativity		3
Philosophy Level Two		3

Hours **18**

Third Year		
Fall		
PRX 301	Extrinsic Summative AR I (1 credit at the end of P1)	0
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
ECN 101	Introductory Economics Micro	3
or ECN 102	or Introductory Economics Macro	

Hours **20**

Spring		
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
Religious Studies		3

Hours **20**

Fourth Year		
Fall		
PRX 425	Medication Use Systems 2	3
PRX 410	Health Eq and Pt Care in Pharm	3
PRX 430	Health Info Retrieval & Eval	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 452	iPSDT 4: Cardiovascular 2	3

PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 418	Pharmacy-Based Immu Delivery	1
PRX 401	Extrinsic Summative AR 2 (required for PharmD)	0
Hours		17
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med (Writing Intensive)	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 401	Extrinsic Summative AR 2	1
Hours		16
Total Hours		141-142

PharmD Curriculum Plan

Doctor of Pharmacy (PharmD) program prepares students for successful careers in pharmacy. Our four-year PharmD degree features a competency-driven professional curriculum that mirrors the complex realities of modern practice. This includes a unique experiential learning component (<https://www.sju.edu/departments/pharmacy-practice/experiential-learning/>) that offers the opportunity to work alongside pharmacists in real-world practice settings starting the first month of your first year.

Requirements

Code	Title	Hours
PRX 301	Extrinsic Summative AR I	1
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 401	Extrinsic Summative AR 2	1
PRX 430	Health Info Retrieval & Eval	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 425	Medication Use Systems 2	3
PRX 410	Health Eq and Pt Care in Pharm	3
PRX 418	Pharmacy-Based Immu Delivery	1
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 501	Extrinsic Summative AR 3	1

PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 575	Integrated Practice 2	3
PRX 590	IPPE 6: Patient Care Elective	1
PRX 610	APPE: Community Pharmacy	5
PRX 618	Pharm Prof Dev & Enrichment	1
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
or PRX 680	APPE Research Elective	

Two courses of (2-4 credits per course) Professional Electives required by end of P3 year. Courses that have PHP, PHS, or PHT prefix designations and courses taken to satisfy a Business Certificate (automatically) fit the definition of pharmacy professional electives.

Total Hours **139-143**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 301	Extrinsic Summative AR I	0
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
Hours		17
Spring		
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
Hours		17
Second Year		
Fall		
PRX 401	Extrinsic Summative AR 2	0
PRX 430	Health Info Retrieval & Eval	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 425	Medication Use Systems 2	3
PRX 410	Health Eq and Pt Care in Pharm	3
PRX 418	Pharmacy-Based Immu Delivery	1
PRX 452	iPSDT 4: Cardiovascular 2	3

PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
Professional Elective		0-3
Hours		17-20
Spring		
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 490 or PRX 480	IPPE 4: Institutional Pharmacy or IPPE 3: Adv Comm/Ambul Care	1
Professional Elective		0-3
Hours		17-20
Third Year		
Fall		
PRX 501	Extrinsic Summative AR 3	0
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	4
PRX 580 or PRX 590	IPPE 5: Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
Professional Elective		0-3
Hours		15-18
Spring		
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 575	Integrated Practice 2	4
PRX 590 or PRX 580	IPPE 6: Patient Care Elective or IPPE 5: Adv Institutional Pharm	1
Professional Elective		0-3
Two courses of (2-4 credits per course) Professional Electives required by end of P3 year. Courses that have PHP, PHS, or PHT prefix designations and courses taken to satisfy a Business Certificate (automatically) fit the definition of pharmacy professional electives.		
Hours		18-21
Fourth Year		
PRX 610	APPE: Community Pharmacy	5
PRX 618	Pharm Prof Dev & Enrichment	1
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670 or PRX 680	APPE: Academic Elective or APPE Research Elective	5
Hours		36
Total Hours		137-149

Doctor of Pharmacy/Master of Business Administration

The addition of a Master of Business Administration (MBA) compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities including roles in the pharmaceutical industry, healthcare management, and executive positions for pharmacists. Students

will gain valuable business skills that complement clinical pharmacy knowledge, including management, marketing, and finance giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the Doctor of Pharmacy (PharmD) program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

For students in the direct entry program who have not yet earned their Bachelor of Science (BS) degree:

- Students will be issued a conditional acceptance to the dual degree program until they apply for BS graduation
- Would only be permitted to take nine credits of MBA coursework prior to obtaining the BS degree at the end of the second professional year (P2)

Learning Goals and Outcomes Doctor of Pharmacy

The Doctor of Pharmacy (PharmD) Program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Master of Business Administration

Goal 1: Leadership

Outcome 1.1: Students will demonstrate an understanding of what leadership entails, that is, to foster the motivation, inspiration, and direction skills necessary for an organization to achieve its goals.

Goal 2: Stakeholder Value/Functional

Outcome 2.1: Students will demonstrate both breadth and depth of knowledge in the major *functional* areas of the organization, including the *interpersonal skills* needed for success within organizations; students will develop an understanding of the concept of value, the role of the different business functional areas in value creation, and how the value creation activities of the organization impact company stakeholders including owners, employees, customers, local communities, interest groups and society as a whole.

Goal 3: Problem Solving/Critical Thinking

Outcome 3.1: Students will develop *critical thinking skills*, that is, the process of conceptualizing, applying, analyzing, synthesizing,

and/or evaluating information as the basis for solving problems and making decisions.

Goal 4: Ignatian Values

Outcome 4.1: Students will develop an appreciation for and ability to apply Ignatian values - an insistence upon ethical decision making and a desire for social justice – to business decisions.

Goal 5: Global/Diversity

Outcome 5.1: Global/Diversity: Students will develop a global business perspective; will understand major economic, political and cultural differences and influences in different regions of the world; and will develop an understanding of and respect for diversity in the population and in organizations related to differences across cultures, ethnic groups, socio-economic groups, gender and sexual orientation.

Requirements

Code	Title	Hours
MBA Courses		
ACC 550	Creat & Meas Shareholder Value	3
DSS 610	Business Analytics	3
FIN 550	Shareholder Value Management	3
MGT 550	Leadership and Ethics	3
MKT 550	Marketing Management	3
MGT 789	Business Strategy & Purpose	3
or MGT 795	Global Business Strategy	
Specialty Certificate Electives		9
Specialty Certificate Electives		9
PharmD Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3

PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5

Total Hours **171**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Core MBA/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Core MBA/Professional Elective		3
Hours		20
Summer		
Core MBA		6-12
Students should take 6-9 credits summer between Professional Year 2 and 3		
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3

PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	0
Core or Elective MBA/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
Core or Elective MBA/Professional Elective		3
Hours		20
Summer		
Core or Elective MBA		6-12
Students should take at least 9 credits summer between Professional Year 2 and 3		
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	0
Core or Elective MBA/Professional Elective	Students should take at least 6-9 credits in P3 year	3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580 or PRX 590	IPPE 5:Adv Institutional Pharm or IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
Core or Elective MBA/Professional Elective	Students should take at least 6-9 credits in P3 year	3-6
Hours		20-23
Summer		
Elective MBA or Capstone MBA		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Core or Elective MBA		0-3
Students should take no more than 6 credits in P4 year of MBA coursework (requires permission from PCP Dean's office)		
Hours		20-23
Spring		
PRX 650	APPE: Indir Patient Care Elec	5

PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Core or Elective MBA		0-3
Students should take no more than 6 credits in P4 year of MBA coursework (requires permission from PCP Dean's office)		
Hours		20-23
Total Hours		173-197

Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration

The addition of a business degree compliments the Doctor of Pharmacy (PharmD) degree by expanding career opportunities through the development of business acumen. Students will gain valuable business skills including leadership preparation and entrepreneurial skills that complement clinical pharmacy knowledge giving graduates a competitive advantage in the job market following graduation.

Any student that is accepted in the PharmD program may apply for acceptance if they:

- Have a minimum GPA of >3.0
- Are at the first professional year (P1) level or higher
- Have completed their general education credits or have previously earned a Bachelor's degree

Learning Goals and Outcomes

Doctor of Pharmacy

The Doctor of Pharmacy program reflects PCP's commitment to create and foster dedicated pharmacists who will have a moral commitment to improve the quality of life of individual patients and positively impact society by being an integral part of the healthcare team. Thus, our graduates will be compassionate, knowledgeable, skilled and innovative, job-ready pharmacy practitioners, who will become trusted and respected leaders of the pharmacy profession. They will be able to adapt to the dynamic nature of the healthcare system and changing technology and serve as positive role models in the community. The program will foster these ideals by providing a strong scientific education and the skills and attitudes needed in entry-level pharmacists roles now and in the future.

Dual degrees offered through the Erivan K. Haub School of Business include (students should refer to the individual programs for additional details):

- Business Intelligence and Analytics MS
- Finance MS
- Food Marketing MS
- Health Administration MHA
- Health Informatics MHI
- Human Resource Management MS
- Marketing MS
- Organization Development and Leadership (ODL) MS

Requirements

Eligible Haub School of Business Degrees and their requirements:

- Business Intelligence and Analytics MS (p. 206)
- Finance MS (p. 222)
- Food Marketing MS (p. 233)
- Health Administration MHA (p. 236)
- Health Informatics MHI (p. 238)
- Human Resource Management MS (p. 248)
- Marketing MS (p. 266)
- Organization Development and Leadership (ODL) MS (p. 257)
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Code	Title	Hours
PharmD Required Courses		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	1
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480	IPPE 3: Adv Comm/Ambul Care	1
PRX 490	IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	1
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
PRX 590	IPPE 6: Patient Care Elective	1
PRX 501	Extrinsic Summative AR 3	1
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Musskel/Skin/Eye	3

PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Total Hours		140

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PRX 302	Found of Pharmacy Practice	2
PRX 316	Practice Skills/Prof Behavior1	4
PRX 330	Foundations of Biomedical Sci	4
PRX 340	Foundations of Pharm Sci 1	3
PRX 350	iPSDT 1:DiseasePrev & SelfCare	3
PRX 380	IPPE-1: Service Learning 1	1
PRX 301	Extrinsic Summative AR I	0
Haub course/Professional Elective		3
Hours		20
Spring		
PRX 325	Medication Use Systems 1	3
PRX 305	Foundations of Clinical Immuno	3
PRX 345	Foundations of Pharm Sci 2	3
PRX 355	iPSDT 2: Cardiovascular 1	3
PRX 365	iPSDT 3: Pulmonary	3
PRX 390	IPPE-2: Service Learning 2	1
PRX 301	Extrinsic Summative AR I	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Second Year		
Fall		
PRX 420	Practice Skills/Prof Behavior2	3
PRX 425	Medication Use Systems 2	3
PRX 430	Health Info Retrieval & Eval	3
PRX 415	Fndtns Healthcare Policy/Law	3
PRX 452	iPSDT 4: Cardiovascular 2	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1
PRX 401	Extrinsic Summative AR 2	0
Haub course/Professional Elective		3
Hours		19
Spring		
PRX 440	Foundations of Pharm Sci 3	3
PRX 435	Lit Eval & Evidence-Based Med	3
PRX 454	iPSDT 5: Renal/Hepatic	3
PRX 455	iPSDT 6: Endocrine/Reproductiv	3
PRX 457	iPSDT 7: Infectious Disease 1	3
PRX 480 or PRX 490	IPPE 3: Adv Comm/Ambul Care or IPPE 4: Institutional Pharmacy	1

PRX 401	Extrinsic Summative AR 2	1
Haub course/Professional Elective		3
Hours		20
Summer		
Haub course/Professional Elective		6-12
Hours		6-12
Third Year		
Fall		
PRX 510	Applied Prof Behavior & Comm	2
PRX 520	Innovation & Entrepreneurship	1
PRX 530	iPSDT 8: Infectious Disease 2	3
PRX 534	iPSDT 9: Central Nervous Sys 1	3
PRX 538	iPSDT 10: Central Nervous Sys2	3
PRX 570	Integrated Practice 1	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	0
Haub course/Professional Elective		3-6
Hours		19-22
Spring		
PRX 543	iPSDT 11: GI/Nutrition	3
PRX 545	iPSDT 12: Imm/Muskel/Skin/Eye	3
PRX 553	iPSDT 13: Hematology/Oncology	3
PRX 555	iPSDT 14: Infectious Disease 3	3
PRX 575	Integrated Practice 2	3
PRX 580	IPPE 5:Adv Institutional Pharm	1
or PRX 590	or IPPE 6: Patient Care Elective	
PRX 501	Extrinsic Summative AR 3	1
Haub course/Professional Elective		3-6
Hours		20-23
Summer		
Haub course/Professional Elective		3
Hours		3
Fourth Year		
Fall		
PRX 610	APPE: Community Pharmacy	5
PRX 620	APPE: Ambulatory Care Pharm	5
PRX 630	APPE: Institutional Pharmacy	5
PRX 640	APPE: Acute Patient Care	5
Hours		20
Spring		
PRX 650	APPE: Indir Patient Care Elec	5
PRX 660	APPE: Patient Care Elective	5
PRX 670	APPE: Academic Elective	5
PRX 680	APPE Research Elective	5
Hours		20
Total Hours		173-191

Pharmaceutical Sciences

Pharmaceutical sciences is the translational branch of chemistry, biochemistry, physiology and pharmacology. Basic science discoveries that identify disease processes and targets for intervention are translated by pharmaceutical scientists into therapies that directly impact patient care. This field includes drug discovery, development, and manufacturing. The research conducted by pharmaceutical scientists determines a new drug's effectiveness, optimal dosage, administration frequency, and potential complications – often leading to new inventions and therapeutic advancements.

The strength of our program lies in students from the undergraduate BS, MS, and PhD interacting across disciplines. This approach offers

guidance and mentoring opportunities for students, allowing them to develop mentoring skills early in their careers. Graduates frequently express their appreciation for the nurturing environment and emphasis on peer mentoring, which is an integral part of the curriculum. Our department's mission revolves around student-centricity, interdisciplinary integration, and fostering diversity, equity, and inclusion. Guided by dedicated research advisors, our curriculum is crafted to the individual needs of students, preparing them for successful careers in the biomedical field, graduate studies, or health professions. Many of our students place in highly sought after internships in the pharmaceutical industry. The faculty members deliver innovative and interactive courses, ensuring academic excellence.

Diverse expertise within the Department of Pharmaceutical Sciences forms the core of our research philosophy and drives our success. Our department fosters groundbreaking research in pharmacology, toxicology, medicinal chemistry, and drug formulation and delivery. Many faculty members engage in preclinical studies focusing on precision medicine, bridging the gap between benchside research and clinical applications. Several faculty members have founded companies and hold multiple patents, reflecting our commitment to innovation. Many of our labs have sponsored research from state, federal, & private sectors, which exposes students to cutting-edge research and real word experiences of the type of work needed by professionals. Our students serve as pioneers in our laboratories and contribute directly to our research success. In both our labs and classrooms, innovation propels us towards breakthroughs in medical science.

Faculty

Our department of Pharmaceutical Sciences, under the Philadelphia College of Pharmacy, has trained pharmaceutical scientists for over 200 years, and our esteemed faculty continues this tradition, educating and mentoring students as they advance in this dynamic field.

Department of Pharmaceutical Sciences Faculty (<https://www.sju.edu/departments/pharmaceutical-sciences/faculty/>)

Programs Undergraduate Majors

- Pharmaceutical Sciences & Drug Development (p. 343)
- Pharmacology & Toxicology (p. 347)

Undergraduate Minors

- Pharmaceutical Sciences & Drug Development (p. 345)
- Pharmacology (p. 350)
- Toxicology (p. 350)

Graduate

- Drug Development & Industrial Pharmacy (p. 342)
- Drug Discovery & Cell Gene Therapy (p. 342)
- Pharmacology & Toxicology (p. 349)
- Pharmaceutics (p. 346)

Graduate Certificate

- Drug Discovery & Development (p. 343)

Doctoral

- Pharmacology & Toxicology (p. 350)
- Pharmaceutics (p. 346)

Drug Development & Industrial Pharmacy MS

The Master of Science (MS) program in Drug Development and Industrial Pharmacy (DDIP) at the historic Philadelphia College of Pharmacy (PCP) at Saint Joseph's University provides you with the experience necessary to learn the science and practice of how drug delivery systems are developed. An advanced degree such as MS in DDIP at PCP provides the knowledge and network for rewarding careers in the pharmaceutical and healthcare industry. The Philadelphia College of Pharmacy is in the heart of the biotechnology and health science industry, surrounded by 250 medical facilities and within two hours of 75% of all U.S. pharmaceutical and biotechnology companies, with strong foundations in pharmaceutical training to prepare students on day 1 when they join the industry. The city's diverse population and variety of health science employers offers the unique opportunity to gain experience in pharmaceutical research. This program provides the graduates with a strong foundation in pharmaceutics during the first half of the study. The second half of the program is focused on industrial pharmacy, with a strong laboratory component and hands-on experience in all areas. The program enables the graduates to have strong communication skills, professional training and will prepare them for a career in pharmaceutical industry in a variety of roles.

Learning Goals and Outcomes

- Goal 1:** Solid knowledge foundation and critical evaluation of scientific literature
- Goal 2:** Effective and accurate oral communication of scientific research
- Goal 3:** Critical data analysis with appropriate statistical methods
- Goal 4:** Demonstrate and acquire good laboratory practices
- Goal 5:** Acquires solid pharmaceutics principles and hands on to be work ready day 1
- Goal 6:** Personal development/leadership/teamwork

Requirements

Code	Title	Hours
PHS 714	Advanced Pharma Analysis	1
PHT 750	Research Ethics and Conduct	2
PHS 750	Manufacturing Pharmacy	2
PHS 751	Advanced Pharmaceutics	3
PHS 760	Regulatory Issues in Pharma	3
PHS 762	Pre-formulation and Phys Pharm	3
PHS 763	Res Proj in Drug Dev & Ind Pha (Intro)	3
PHS 763	Res Proj in Drug Dev & Ind Pha (Adv)	3
PHS 890	Pharmaceutics Seminar	1
Choose nine credits below		9
PHS 703	Pharma & Biopharmaceutics I (3 credits)	
PHS 709	Pharm-Biopharmaceutics II (3 credits)	
PHS 714L	Advanced Pharma Analysis Lab (2 credits)	

PHS 750L	Manufacturing Pharmacy Lab (1 credit)	
PHT 752	Intro Scientific Data Analysis (1 credit)	
PHS 800	Biopharmaceutical Foundatn II (2 credits)	
PHS 895	Analysis of Current Literature (2 credits)	
Total Hours		30

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PHS 703	Pharma & Biopharmaceutics I (Elective #1)	3
PHT 750	Research Ethics and Conduct (Required)	2
PHS 750	Manufacturing Pharmacy (Required)	2
PHS 750L	Manufacturing Pharmacy Lab (Elective #2**)	1
PHS 890	Pharmaceutics Seminar (Required)	1
Hours		9
Spring		
PHS 709	Pharm-Biopharmaceutics II (Elective #3)	3
PHS 714	Advanced Pharma Analysis (Required)	1
PHS 714L	Advanced Pharma Analysis Lab (Elective #4**)	2
PHS 762	Pre-formulation and Phys Pharm (Required) *	3
PHS 763	Res Proj in Drug Dev & Ind Pha (Required) *	3
PHS 890 Pharmaceutics Seminar (Register in the spring semester for 0 credit (section G02))		0
* = Typically this MS is done in 3 semester but if the student wishes to complete in 4 semesters, PHS 762 & PHS 763 will be taken Year 2 Spring Semester.		
** = Working professional will meet with their advisors to select electives 2 & 4.		
Hours		12
Second Year		
Fall		
PHS 751	Advanced Pharmaceutics (Required)	3
PHS 760	Regulatory Issues in Pharma (Required)	3
PHS 763	Res Proj in Drug Dev & Ind Pha (Required)	3
PHS 890 Pharmaceutics Seminar (Register in the spring semester for 0 credit (section G02))		0
Hours		9
Total Hours		30

Drug Discovery & Cell Gene Therapy MS

Students completing the Drug Discovery and Cell Gene Therapy MS will build an advanced mastery in understanding pharmacological and toxicities aspects of drugs/medications and be in the front lines of drug innovation (drug discovery) by also building an integrated skills set in cell gene therapy through the Philadelphia College of Pharmacy's curriculum and advanced labs.

Learning Goals and Outcomes

- Goal 1:** Students will demonstrate knowledge foundation and critical evaluation of scientific literature
- Goal 2:** Student will demonstrate effective and accurate oral communication skills relates to scientific research
- Goal 3:** Students will integrate pharmacology to toxicology concepts to gene and targeted therapies (in class and in lab)

Goal 4: Students will learn through hands on laboratory advanced course techniques in cell gene and drug targeted therapy

Goal 5: Students will engage in personal development/leadership/ teamwork

Requirements

Code	Title	Hours
PHT 702	Advanced Pharmacology	3
PHT 703	Advanced Toxicology	3
PHT 705	Pharmacology in Drug Discovery	3
PHS 760	Regulatory Issues in Pharma	3
PHT 709	Research Project Drug Discov	3
PHS 714 & 714L	Advanced Pharma Analysis and Advanced Pharma Analysis Lab	3
PHT 750	Research Ethics and Conduct	3
PHT 752	Intro Scientific Data Analysis	1
PHT 801	Research Lit in Pharm/Tox	1
PHT 880	Pharm Tox Seminar	1
PHT 821	Molecular Pharmacology	3
One 700/800 level elective (PHS or PHT)		3
Total Hours		30

Drug Discovery & Development Graduate Certificate

Students can enhance their learning and career at Saint-Joseph's University by selecting to enroll in a Drug Discovery & Development (DDD) Graduate Certificate which can be obtained with 12 credits of graduate classes offered by the Department of Pharmaceutical Sciences. Students electing to add this certificate to their education will be working closely with faculty from the Department of Pharmaceutical Sciences (Philadelphia College of Pharmacy) to advance their knowledge of Drug Discovery and Development by gaining a specialized and advanced skillset that include graduate level biopharmaceutics (formulation and delivery), pharmacology, toxicology, and medicinal chemistry. Students can add several electives offered with partners in the Pharmaceutical industry which focus on regulatory affairs, cell gene therapy, drug development process with a backdrop of preclinical and clinical applications. This certificate prepared students to join the pharmaceutical industry and other specialized organizations leading and contributing to innovation in medicine.

Learning Goals and Outcomes

Outcome #1: Students will demonstrate knowledge in the field of Drug Discovery and Development by applying and integrating concepts in molecular pharmacology, clinical toxicology, medicinal chemistry and drug discovery and drug development to real life and clinically applicable problems.

Outcome #2: Students will gain insight into the process of drug discovery and development with hands on training validation, screening of potential candidates, ADME, biopharmaceutics, virtual reality technology (VR) to experience receptor-ligand.

Outcome #3: Students will engage in written and communications related to Drug Discovery and Development through engaging discussions with faculty and guest lecturers in the Pharmaceutical Sciences Industry.

Requirements

Code	Title	Hours
Choose 12 credits:		12
PHT 750	Research Ethics and Conduct (This 2 credit course can be combined with PHT 752 1 credit course to complete a 3 credit course load)	
PHT 752	Intro Scientific Data Analysis	
PHT 720	Intro to Neuropsychopharmacology	
PHS 760	Regulatory Issues in Pharma	
PHT 821	Molecular Pharmacology	
PHT 851	Drug Discovery & Development	
PHT 707	Tox Subst Use Disorder (Appld)	
PHS 762	Pre-formulation and Phys Pharm	
PHT 740	Drug Disc Neurodegenerative	
PHS 895	Analysis of Current Literature (This 2 credit journal club needs to be combined with Pharmaceutics seminar PHS 890-1 credit to complete a 3 credit load)	
PHS 890	Pharmaceutics Seminar (Choose section G01 for 1 credit)	
Total Hours		12

Pharmaceutical Sciences & Drug Development Major

Saint Joseph's is one of the few universities in the US to offer a Bachelor of Science in Pharmaceutical Sciences program. This unique undergraduate program provides students with the theoretical understanding and laboratory-based skills to develop, formulate, manufacture and test drugs and cosmetics. Students sharpen their technical skills through laboratory-based courses and faculty-directed undergraduate research projects.

Students will sharpen their skills in the discipline of pharmaceutics that specializes at determining feasible dosage form, route and time of administration (formulation and delivery). This discipline is often referred to as Drug Development branch of the field of Pharmaceutical Sciences. Pharmaceutical Scientists are masters of design and leverage their creativity to get just the right amount of therapeutic at just the right place for the right amount of time. Many new inventions are linked to such creativity of design and our discipline of Pharmaceutics has proven very successful in the issuance of patents. Students with a BS in pharmaceutical sciences join careers in medicine, health-related fields, pharmaceutical companies (scientists or pharmaceutical representative), and regulatory affairs (drug approvals) to name a few.

Learning Goals and Outcomes

Goal 1: Students demonstrate ability to plan and conduct experiments according to a designated protocol or to modify a procedure if necessary.

Goal 2: Students demonstrate ability to analyze and interpret data, formulate and execute Standard Operating Procedures (SOPs), apply appropriate Good Laboratory Practices (GLPs), and demonstrate strong familiarity with computer programs or software for data analysis.

Goal 3: Student apply scientific theory and methodology, demonstrate critical thinking and problem solving skills to solve scientific questions and demonstrate the ability to perform online literature searches.

Goal 4: Students demonstrate effective verbal and written communication skills in order to present scientific findings and knowledge to individuals and groups, demonstrate proficiency in electronic communications, and competency in the use of office software used in research.

Goal 5: Students Identify strengths and weaknesses, demonstrate professional behavior by exhibiting initiative, accountability and timeliness for action, demonstrate ethical behavior, set goals and develop plans including steps to achieve these goals and demonstrate ability to work independently and as a team.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
	World History Course Area	3
Philosophy Requirements		
Either Level One or Level Two (but not both) – must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		
A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		

Non-Native Language Requirement	3-4
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.	
Literature Requirement	3
If approved, Literature courses may count toward a student's overlay requirements.	
Fine and Performing Arts, Creativity, and Design Requirement	3
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.	
Overlay Requirements	
Writing-Intensive	3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).	
Mission-Overlay	3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.	
Total Hours	47-49

Major Requirements

Code	Title	Hours
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
PHY 101	General Physics I	3
PHY 101L	General Physics Laboratory I	1
PHS 151	Science Talk	1
PHS 241	History Drug Discovery&Medicin	1
PHS 141	Intro Pharmaceutical Sciences	1
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
PHS 251	Science Talk	1
PHS 310	Biopharmaceutical Foundation I	3
PHS 304	Intro Drug Discovery & Dev	3
PHS 308 & 308L	Pharma and Biopharmaceutics I and Pharma &Biopharmaceutics I Lab	3
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	3
PHS 311	Biopharmaceutical Foundatn II	2
PHS 309	Pharm-Biopharmaceutics II	3

PHS 306	Advanced Biomedical Methods	3
PHS 411 & 411L	Drug Development I and Drug Development I Lab	3
PHS 413	Drug Development II	3
PHS 312	Systems Physiology	3
PHT 305	Fundamentals of Pharmacology	3
PHS 414 & 414L	Advanced Pharmaceutical Analysis and Advanced Pharma Analysis Lab	3
PHS 400 & 400L	Cosmetic Science and Cosmetic Science Lab	3
PHS 404	Seminar Pharmaceutical Science	1
Calculus (will count for CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	
Total Hours		78-79

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 120 & 120L	General Chemistry I and General Chemistry Lab I	4
MAT 120 or MAT 155	Precalculus Based on placement or Fundamentals of Calculus	3
BIO 101 & 101L	Bio I: Cells and Bio I: Cells Lab	4
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
PHS 141	Intro Pharmaceutical Sciences	1
Hours		16
Spring		
CHM 125 & 125L	General Chemistry II and General Chemistry Lab II	4
MAT 155	Fundamentals of Calculus (or above depending on initial placement)	3
BIO 102 & 102L	Bio II: Genetics and Bio II: Genetics Lab	4
World History		3
Diversity		3
PHS 151	Science Talk	1
Hours		18
Sophomore		
Fall		
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
Non-Native Language	based on placement	3
Social/Behavioral Science		3
Theology		3
PHS 241	History Drug Discovery&Medicin	1
Hours		18
Spring		
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4

PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Literature		3
Fine & Performing Arts, Design, & Creativity		3
Philosophy Level 1		3
PHS 251 Science Talk		1
Hours		18
Junior		
Fall		
PHS 310	Biopharmaceutical Foundation I	3
PHS 304	Intro Drug Discovery & Dev	3
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	3
PHS 308	Pharma and Biopharmaceutics I	3
PHS 308L	Pharma &Biopharmaceutics I Lab	0
Hours		12
Spring		
PHS 311	Biopharmaceutical Foundatn II	2
PHS 306 & 306L	Advanced Biomedical Methods and Adv Biomedical Methods Lab	3
PHS 309	Pharm-Biopharmaceutics II	3
Philosophy Level 2		3
Elective		3
Hours		14
Senior		
Fall		
PHS 411 & 411L	Drug Development I and Drug Development I Lab	3
PHS 413	Drug Development II (Drug Development II: Formulation)	3
Elective		3
PHS 312	Systems Physiology	3
Hours		12
Spring		
PHT 305	Fundamentals of Pharmacology	3
PHS 414 & 414L	Advanced Pharmaceutical Analysis and Advanced Pharma Analysis Lab	3
PHS 400 & 400L	Cosmetic Science and Cosmetic Science Lab	3
PHS 404	Seminar Pharmaceutical Science	1
Elective		2
Hours		12
Total Hours		120

Pharmaceutical Sciences & Drug Development Minor

The minor in Pharmaceutical Sciences will provide students with a foundation in the interdisciplinary pharmaceutical sciences field. Students will learn the core concepts and practices of the science of pharmaceuticals, including dosage formulation, manufacturing, quality assurance, and regulatory compliance. Students will understand the principles and approaches of drug discovery, development, and delivery.

Requirements

Code	Title	Hours
Required Courses		9
PHS 309	Pharm-Biopharmaceutics II	
PHS 308 & 308L	Pharma and Biopharmaceutics I and Pharma &Biopharmaceutics I Lab	

PHS 450 & 450L	Manufacturing Pharmacy and Manufacturing Pharmacy Lab	Pick 1 course from the following: 2-4
CHM 340 & 340L	Biochemistry and Biochemistry Lab	
BIO 404	Biochemistry	
PHS 200	Biopharmaceutical Foundation I	
PHS 300	Biopharmaceutical Foundatn II	
BIO 411	Molecular Genetics	Elective Courses. Pick 2 courses from the following: 6
CHM 310	Physical Chemistry I	
CHM 330	Instrumental Analysis	
CHM 318	Essentials of Physical Chem	
CHM 361	Analytical Chemistry	
CHM 411	Medicinal Chemistry	
PHS 400 & 400L	Cosmetic Science and Cosmetic Science Lab	
PHS 411 & 411L	Drug Development I and Drug Development I Lab	
PHS 413	Drug Development II	
PHS 304	Intro Drug Discovery & Dev	
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	
PHS 306	Advanced Biomedical Methods	
PHT 305	Fundamentals of Pharmacology	
PHS 414 & 414L	Advanced Pharmaceutical Analys and Advanced Pharma Analysis Lab	
PHT 307	Introduction to Toxicology	
MAT 128	Applied Statistics	
PHS 301	Biopharmaceutical Foundatn III	
PHS 304	Intro Drug Discovery & Dev	
PHS 306 & 306L	Advanced Biomedical Methods and Adv Biomedical Methods Lab	
PHS 400	Cosmetic Science	
PHT 305	Fundamentals of Pharmacology	
PHT 307	Introduction to Toxicology	
PHT 450	Analysis of Publications	
PHT 495	Independent Research Project	
Total Hours		17-19

Pharmaceuticals MS

A MS in pharmaceuticals at Saint Joseph's University provides you the experience necessary to understand how drugs are developed, formulated and delivered. Working one-on-one with expert faculty, you'll gain insight and foresight as you progress through the course work and curriculum that will lead to the preparation of thesis-based work. With this advanced graduate degree, your knowledge and network will help you begin a rewarding career in the healthcare industry, pharmaceutical industry and help prepare students to also continue to pursue a PhD degree.

Learning Goals and Outcomes

Goal 1: Solid knowledge foundation and critical evaluation of scientific literature

Goal 2: Effective and accurate oral communication of scientific research

Goal 3: Ability to identify scientific questions or formulate hypotheses

Goal 4: Design and perform experiments to answer scientific questions or test hypotheses

Goal 5: Critical data analysis with appropriate statistical methods

Goal 6: Ability to draw evidence-based conclusions

Goal 7: Clear and accurate presentation of research results in writing

Goal 8: Personal development/leadership/teamwork

Goal 9: Solid knowledge foundation and critical evaluation of scientific literature

Requirements

Code	Title	Hours
PHS 702	Controlled-Release Dosage Form	2
PHS 750	Manufacturing Pharmacy	2
PHS 750L	Manufacturing Pharmacy Lab	1
PHS 751	Advanced Pharmaceuticals	3
PHT 750	Research Ethics and Conduct	2
PHT 811	Research Techniques Laboratory	1
PHS 890	Pharmaceuticals Seminar	1
PHS 895	Analysis of Current Literature	2
Choose 6 credits of the following PHT or PHS courses		6
PHS 703	Pharma & Biopharmaceuticals I	
PHS 709	Pharm-Biopharmaceuticals II	
PHS 714	Advanced Pharma Analysis	
PHS 714L	Advanced Pharma Analysis Lab	
PHT 752	Intro Scientific Data Analysis	
PHS 760	Regulatory Issues in Pharma	
PHS 762	Pre-formulation and Phys Pharm	
PHS 802	Intro Lab Tech and Biomedicine	
PHT 851	Drug Discovery & Development	
PHS 799	Master's Research	10
Total Hours		30

Pharmaceuticals PhD

Saint Joseph's University's PhD in pharmaceuticals program explores how drugs are developed, formulated and delivered while engaging in a stimulating curriculum that combines course, hands on laboratory work and research. By learning how to improve the way drugs interact with the human body, you will advance to the forefront of medical progress and enable modern medical breakthroughs. With a doctoral degree, your knowledge and network will help you continue a rewarding career in the healthcare industry as a researcher and innovator with advanced skills in formulation and delivery of medicine (drug development).

Learning Goals and Outcomes

Goal 1: Solid knowledge foundation and critical evaluation of scientific literature

Goal 2: Effective and accurate oral communication of scientific research

Goal 3: Ability to identify scientific questions or formulate hypotheses

Goal 4: Design and perform experiments to answer scientific questions or test hypotheses

Goal 5: Critical data analysis with appropriate statistical methods

Goal 6: Ability to draw evidence-based conclusions

Goal 7: Clear and accurate presentation of research results in writing

Goal 8: Personal development/leadership/teamwork

Goal 9: Solid knowledge foundation and critical evaluation of scientific literature

Requirements

Code	Title	Hours
PHS 751	Advanced Pharmaceutics	3
PHT 750	Research Ethics and Conduct	2
PHT 752	Intro Scientific Data Analysis	1
PHS 760	Regulatory Issues in Pharma	3
PHT 811	Research Techniques Laboratory	2
PHS 890	Pharmaceutics Seminar	1
PHS 895	Analysis of Current Literature	2
Choose 6 credits of PHS, PHT below		6
PHS 702	Controlled-Release Dosage Form	
PHS 714	Advanced Pharma Analysis	
PHS 714L	Advanced Pharma Analysis Lab	
PHS 762	Pre-formulation and Phys Pharm	
PHS 703	Pharma & Biopharmaceutics I	
PHS 709	Pharm-Biopharmaceutics II	
PHS 851	Advanced Pharmaceutics	
PHT 851	Drug Discovery & Development	
PHS 860	Regulatory Issues in Pharma	
PHS 899	Doctoral Research	10
PHS 899	Doctoral Research	10
Total Hours		40

Pharmacology & Toxicology Major

Many breakthroughs in medicine and science and technology have occurred as a result of research in pharmacology and toxicology, including advancements in drug therapy. Saint Joseph's Bachelor of Science in Pharmacology and Toxicology program is one of the few undergraduate programs of its kind in the country that prepares you to enter this cutting-edge field. Pharmacology is the study of the mechanisms by which drugs alter living organisms, while toxicology focuses on understanding the adverse effects of chemical and physical agents on human health. Through a combination of molecular and cell biology, as well as chemistry and genetics, pharmacologists and toxicologists are keenly aware of biological systems and physiology and how they can be manipulated to cure and prevent disease with medications. Much of pharmacology and toxicology also focuses on drug discovery, leading to new designs of molecules that can best and more effectively treat a disease state, thus also focused on intellectual property, inventions and patents. Students conduct independent research in our state-of-the-art labs under the guidance of expert faculty.

Students with a BS in pharmacology and toxicology join careers in medicine, health-related fields, pharmaceutical companies (scientists or pharmaceutical representative), forensic sciences and regulatory affairs (drug approvals) to name a few.

Learning Goals and Outcomes

Goal 1: Students demonstrate ability to plan and conduct experiments according to a designated protocol or to modify a procedure if necessary.

Goal 2: Students demonstrate ability to analyze and interpret data, formulate and execute Standard Operating Procedures (SOPs), apply appropriate Good Laboratory Practices (GLPs), and demonstrate strong familiarity with computer programs or software for data analysis.

Goal 3: Student apply scientific theory and methodology, demonstrate critical thinking and problem solving skills to solve scientific questions and demonstrate the ability to perform online literature searches.

Goal 4: Students demonstrate effective verbal and written communication skills in order to present scientific findings and knowledge to individuals and groups, demonstrate proficiency in electronic communications, and competency in the use of office software used in research.

Goal 5: Students identify strengths and weaknesses, demonstrate professional behavior by exhibiting initiative, accountability and timeliness for action, demonstrate ethical behavior, set goals and develop plans including steps to achieve these goals and demonstrate ability to work independently and as a team.

Requirements

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years		
Diversity		3
INT 151	Inequality in American Society	1
Math & Natural Science Requirements		
If approved, Math & Natural Science Requirements may count toward overlay requirements.		
Mathematics		3-4
Natural Science		4
Social Science Requirement		
If approved, such Social Science Requirement may count toward a student's overlay requirements.		
Non-Native Language Requirement		
A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.		
Literature Requirement		
If approved, Literature courses may count toward a student's overlay requirements.		
Fine and Performing Arts, Creativity, and Design Requirement		
If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.		
Overlay Requirements		
Writing-Intensive		3
If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).		
Mission-Overlay		3
Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.		
Total Hours		47-49

Major Requirements

Code	Title	Hours
BIO 101	Bio I: Cells (will count for CCC: Natural Science)	4
BIO 101L	Bio I: Cells Lab (will count for CCC: Natural Science)	0
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
CHM 210	Organic Chemistry I	3
CHM 210L	Organic Chemistry Lab I	1
CHM 215	Organic Chemistry II	3
CHM 215L	Organic Chemistry Lab II	1
PHY 101	General Physics I	3

PHY 101L	General Physics Laboratory I	1
PHY 102	General Physics II	3
PHY 102L	General Physics Laboratory II	1
PHS 141	Intro Pharmaceutical Sciences	1
PHS 151	Science Talk	1
PHS 241	History Drug Discovery&Medicin	1
PHS 251		1
PHS 310	Biopharmaceutical Foundation I	3
PHS 304	Intro Drug Discovery & Dev	3
PHS 312	Systems Physiology	3
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	3
PHS 308 & 308L	Pharma and Biopharmaceutics I and Pharma &Biopharmaceutics I Lab	3
PHS 311	Biopharmaceutical Foundatn II	2
PHT 305	Fundamentals of Pharmacology	3
PHS 306 & 306L	Advanced Biomedical Methods and Adv Biomedical Methods Lab	3
PHT 307	Introduction to Toxicology	2
PHT 402	Advanced Pharmacology	3
PHT 403	Advanced Toxicology	3
PHT 405	Pharmacology in Drug Discovery	3
PHT 407	Tox Subst Use Disorder (Appld)	3
PHS 404	Seminar Pharmaceutical Science	1
Calculus (will count for CCC: Mathematics)		3-4
MAT 155	Fundamentals of Calculus	
MAT 161	Calculus I	

Total Hours 77-78

Free Electives

Graduation requires 120 credits. Any credits necessary to reach that number outside of the CCC and major requirements are considered free electives.

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
CHM 120	General Chemistry I	3
CHM 120L	General Chemistry Lab I	1
MAT 120	Precalculus	3
BIO 101	Bio I: Cells	4
BIO 101L	Bio I: Cells Lab	0
ENG 101	Craft of Language	3
INT 151	Inequality in American Society	1
PHS 141	Intro Pharmaceutical Sciences	1
Hours		16
Spring		
CHM 125	General Chemistry II	3
CHM 125L	General Chemistry Lab II	1
MAT 155	Fundamentals of Calculus	3
BIO 102	Bio II: Genetics	4
BIO 102L	Bio II: Genetics Lab	0
World History		3
Diversity		3

PHS 151	Science Talk	1
Hours		18
Sophomore		
Fall		
CHM 210 & 210L	Organic Chemistry I and Organic Chemistry Lab I	4
PHY 101 & 101L	General Physics I and General Physics Laboratory I	4
Non-Native Language	based on placement	3-4
Social/Behavioral Science		3
Theology Signature		3
PHS 241	History Drug Discovery&Medicin	1
Hours		18-19
Spring		
CHM 215 & 215L	Organic Chemistry II and Organic Chemistry Lab II	4
PHY 102 & 102L	General Physics II and General Physics Laboratory II	4
Literature		3
Fine & Performing Arts, Design, & Creativity		3
Philosophy Level 1		3
PHS 251		1
Hours		18
Junior		
Fall		
PHS 304	Intro Drug Discovery & Dev	3
PHS 302	Intro Lab Tech in Biomedicine	3
PHS 302L	Intro Lab Tech in Biomed Lab	0
PHS 310	Biopharmaceutical Foundation I	3
PHS 312	Systems Physiology	3
Religious Studies		3
Hours		15
Spring		
PHT 305	Fundamentals of Pharmacology	3
PHS 306	Advanced Biomedical Methods	3
PHS 306L	Adv Biomedical Methods Lab	0
PHT 307	Introduction to Toxicology	2
PHS 311	Biopharmaceutical Foundatn II	2
Philosophy Level 2		3
Hours		13
Senior		
Fall		
PHT 402	Advanced Pharmacology	3
PHT 403	Advanced Toxicology	3
Elective	Overlay if needed	3
PHS 308	Pharma and Biopharmaceutics I	3
PHS 308L	Pharma &Biopharmaceutics I Lab	0
Hours		12
Spring		
PHT 405	Pharmacology in Drug Discovery	3
PHT 407	Tox Subst Use Disorder (Appld)	3
Elective		3
Elective		2
PHS 404	Seminar Pharmaceutical Science	1
Hours		12
Total Hours		122-123

Pharmacology & Toxicology MS

Build your mastery of how drugs and chemicals work and be in the front lines of drug innovation with a pharmacology and toxicology MS graduate degree. Saint Joseph's Master of Science in Pharmacology

and Toxicology program combines didactic course study with hands on laboratory research. This thesis-based curriculum (offered as either part time or full time) emphasizes the integration of pharmacology and toxicology with biochemistry, biomedical sciences, cell and molecular biology, physiology, statistics and experimental design. This MS degree will help student gain the foundation and hands-on research skills to pursue pharmacology and toxicology careers in academia, industry (pharmaceutical and biotech) or government. The student will conduct independent research under the guidance of faculty advisor in a lab, defend a master's thesis and also take the opportunity to present their research findings at local and national scientific conferences. This program can also prepare students to pursue a PhD degree and sets the foundational skills to become a strong candidate.

Learning Goals and Outcomes

Goal 1: Students will demonstrate knowledge foundation and critical evaluation of scientific literature

Goal 2: Students will demonstrate effective and accurate oral communication skills relates to scientific research

Goal 3: Students will demonstrate ability to identify scientific questions and formulate hypotheses

Goal 4: Students will design and perform experiments to answer scientific questions or test hypotheses

Goal 5: Students will present critical data analysis with appropriate statistical methods

Goal 6: Students will demonstrate the ability to draw evidence-based conclusions

Goal 7: Students will clearly and accurately present research results in writing

Goal 8: Students will engage in personal development/leadership/ teamwork

Requirements

Code	Title	Hours
PHT 703	Advanced Toxicology	3
PHT 721	Advanced Medicinal Chem/Pharm	4
PHT 752	Intro Scientific Data Analysis	1
PHT 801	Research Lit in Pharm/Tox	1
PHT 811	Research Techniques Laboratory	1
PHT 821	Molecular Pharmacology	3
PHT 880	Pharm Tox Seminar	1
Choose 6 credits of the following PHT or PHS		6
PHT 705	Pharmacology in Drug Discovery	
PHT 707	Tox Subst Use Disorder (Appld)	
PHS 714 & 714L	Advanced Pharma Analysis and Advanced Pharma Analysis Lab	
PHT 720	Intro to Neuropsychopharmacolo	
PHT 740	Drug Disc Neurodegenerative	
PHT 750	Research Ethics and Conduct	
PHT 770	Special Topics in Pharmacology	
PHT 851	Drug Discovery & Development	

PHT 799	Master's Research	10
Total Hours		30

Pharmacology & Toxicology PhD

Pharmacology and toxicology PhD program incorporates cutting edge research and a stimulating curriculum towards a doctoral thesis. Housed in the historic Philadelphia College of Pharmacy at Saint Joseph's University, the Pharmacology and Toxicology PhD program trains students to contribute to a growing body of scientific and medical research with a curriculum that combines theory with hands on in lab research experience. This PhD degree in pharmacology and toxicology (offered as part time or full-time options) offers the opportunity to conduct doctoral-level research, defend a PhD thesis and publish and present your research. With a PhD, you'll gain a competitive edge to advance your career in academia, government or the pharmaceutical industry.

Learning Goals and Outcomes

Goal 1: Students will demonstrate knowledge foundation and critical evaluation of scientific literature

Goal 2: Student will demonstrate effective and accurate oral communication skills relates to scientific research

Goal 3: Students will demonstrate ability to identify scientific questions and formulate hypotheses

Goal 4: Students will design and perform experiments to answer scientific questions or test hypotheses

Goal 5: Students will present critical data analysis with appropriate statistical methods

Goal 6: Students will demonstrate the ability to draw evidence-based conclusions

Goal 7: Students will clearly and accurately present research results in writing

Goal 8: Students will engage in personal development/leadership/teamwork

Requirements

Code	Title	Hours
PHT 703	Advanced Toxicology	3
PHT 721	Advanced Medicinal Chem/Pharm	4
PHT 752	Intro Scientific Data Analysis	1
PHT 801	Research Lit in Pharm/Tox	1
PHT 811	Research Techniques Laboratory	1
PHT 821	Molecular Pharmacology	3
PHT 880	Pharm Tox Seminar	1
Electives: Choose 6 credits of the following PHT, PHS courses		6
PHT 707	Tox Subst Use Disorder (Appld)	
PHS 712	Systems Physiology	
PHS 714	Advanced Pharma Analysis	
PHS 714L	Advanced Pharma Analysis Lab	
PHT 720	Intro to Neuropsychopharmacolo	
PHT 750	Research Ethics and Conduct	

PHT 770	Special Topics in Pharmacology	
PHT 840	Drug Disc Neurodegenerative	
PHT 851	Drug Discovery & Development	
PHT 804	Intro Drug Discovery and Dev	
PHT 899	Doctoral Research	10
PHT 899	Doctoral Research	10
Total Hours		40

Pharmacology Minor

The minor in Pharmacology will provide students with a foundation in the interdisciplinary pharmacology field. Students will learn the core concepts of pharmacology, including fundamental methods of pharmacological studies, mechanisms of action drugs to treat varieties of diseases, and toxicity and safety assessment in drug development. Pharmacology benefits students who will pursue degrees in health professions including medicine and who are interested in drug discovery.

Requirements

Code	Title	Hours
Required Courses: 3 courses below are required		12
PHT 305	Fundamentals of Pharmacology	
PHT 307	Introduction to Toxicology	
PHT 402	Advanced Pharmacology	
Pick 1 course from the following:		
CHM 340	Biochemistry	
PHS 200	Biopharmaceutical Foundation I	
BIO 404	Biochemistry	
PHS 300	Biopharmaceutical Foundatn II	
BIO 411	Molecular Genetics	
Elective Courses. Pick 2 courses from the following:		6
CHM 330	Instrumental Analysis	
CHM 361	Analytical Chemistry	
PHS 302	Intro Lab Tech in Biomedicine & 302L	
PHS 306	Advanced Biomedical Methods & 306L	
PHS 301	Biopharmaceutical Foundatn III	
PHT 403	Advanced Toxicology	
PHT 405	Pharmacology in Drug Discovery	
PHT 407	Tox Subst Use Disorder (Appld)	
PHT 495	Independent Research Project	
PHT 450	Analysis of Publications	
MAT 128	Applied Statistics	
PHT 440	Drug Disc Neurodegenerative	
CHM 361	Analytical Chemistry	
PHT 340	Intro Neuropsychopharmacology	
PHT 421	Advanced Medicinal Chem/Pharm	
PHT 440	Drug Disc Neurodegenerative	
Total Hours		18

Toxicology Minor

The minor in Toxicology will provide students with a foundation in the interdisciplinary toxicology field. Students will learn the core concepts of

the science of toxicology, including fundamental methods of toxicology studies, and toxicity and safety assessment in preclinical, environmental, and forensic studies and practices. Students will understand the mechanisms of action and effects of toxicants at multiple levels of biological organization.

Requirements

Code	Title	Hours
Required Courses: the 3 courses below are required		12
PHT 305	Fundamentals of Pharmacology	
PHT 307	Introduction to Toxicology	
PHT 403	Advanced Toxicology	
Pick 1 course from the following:		
CHM 340 & 340L	Biochemistry and Biochemistry Lab	
PHS 200	Biopharmaceutical Foundation I	
BIO 404	Biochemistry	
PHS 300	Biopharmaceutical Foundatn II	
BIO 411	Molecular Genetics	
Elective Courses. Pick 2 courses from the following:		6
CHM 330	Instrumental Analysis	
CHM 361	Analytical Chemistry	
PHS 302 & 302L	Intro Lab Tech in Biomedicine and Intro Lab Tech in Biomed Lab	
PHS 306 & 306L	Advanced Biomedical Methods and Adv Biomedical Methods Lab	
PHS 301	Biopharmaceutical Foundatn III	
PHT 405	Pharmacology in Drug Discovery	
PHT 407	Tox Subst Use Disorder (Appld)	
PHT 495	Independent Research Project	
PHT 450	Analysis of Publications	
MAT 128	Applied Statistics	
PHT 440	Drug Disc Neurodegenerative	
CHM 361	Analytical Chemistry	
PHT 340	Intro Neuropsychopharmacology	
PHT 402	Advanced Pharmacology	
Total Hours		18

Pharmacy Practice

The mission of the Department of Pharmacy Practice is to educate future pharmacy leaders to advance the practice of pharmacy. We accomplish this in an innovative, supportive, equitable, inclusive and collaborative environment where we value professionalism, teaching excellence, scholarship and research, and service. The overarching aim is to prepare and cultivate students, faculty and future practitioners to improve patient care and societal health.

Faculty

Full time faculty members in the Department of Pharmacy Practice are dedicated to continually improving drug therapy and team-based patient-centered care through research into the discovery, application and dissemination of knowledge about drugs and drug use.

Department of Pharmacy Practice Faculty & Staff (<https://www.sju.edu/departments/pharmacy-practice/faculty/>)

Physical Therapy

Saint Joseph's University's Doctor of Physical Therapy (DPT) is an accredited doctoral program that prepares you for a fulfilling career in physical [therapy \(PT\)](#). [PT was named one of the best healthcare professions and best jobs overall by U.S. News & World Report](#). With an accelerated curriculum focused on experiential learning (<https://www.sju.edu/departments/physical-therapy/experiential-learning/>), our 31-month physical therapy program will teach you evidence-based techniques and empower you to practice collaboratively in diverse healthcare environments. You'll have access to 350+ full-time clinical practice sites in Philadelphia and beyond and [gain skills to treat a wide swath of](#) patients in [a variety of](#) healthcare settings.

Faculty

Saint Joseph's physical therapy faculty are skilled practitioners, many of whom are ABPTS certified in a variety of practice areas, such as orthopedics, pediatrics, geriatrics, neurology, cardiopulmonary, sports and more. Faculty apply their expertise in the classroom and in collaborative student-faculty research.

Department of Physical Therapy Faculty (<https://www.sju.edu/departments/physical-therapy/faculty/>)

Programs Undergraduate Majors

Health Sciences Direct Entry into DPT (p. 321)

Exercise Physiology Direct Entry into DPT (p. 316)

Doctoral

Doctor of Physical Therapy (DPT) (p. 352)

Pathways

BS to Doctor of Physical Therapy (DPT)

Physical therapy is a thriving area of healthcare and one of its most rewarding and fulfilling careers. Saint Joseph's BS in Exercise Physiology/Health Science to Doctor of Physical Therapy (DPT) prepares you to develop as a skilled practitioner with a fast path to graduation. The curriculum includes a wealth of clinical experiences, including pro-bono clinics and full-time clinical education rotations. Earn two degrees — a BS in exercise physiology or health science and a Doctor of Physical Therapy — in under six years without having to re-apply by meeting all academic criteria and program requirements.

You can enter this accelerated PT program as an incoming first-year student through our direct-entry admission pathway or as a transfer student.

If you already hold a bachelor's degree or higher and have completed all requisites, you can enter the DPT program as a graduate student.

Doctor of Physical Therapy Overview

Saint Joseph's University's Doctor of Physical Therapy (DPT) is an accredited doctoral program that prepares you for a fulfilling career in physical therapy, which was named one of the best healthcare professions and best jobs overall by US News & World Report. With an accelerated curriculum focused on experiential learning, our 31-month physical therapy program will teach you evidence-based techniques and empower you to practice independently and work collaboratively in diverse healthcare environments. You'll have access to 350+ full-time clinical practice sites in Philadelphia and beyond and treat patients in different healthcare settings.

You can enter this program if you already hold a bachelor's degree or higher and have completed all prerequisites. We also offer a BS to DPT program for incoming first-year students (through our direct-entry admission pathway) and transfer students.

Requirements

Code	Title	Hours
DPT 501 & 501L	Anatomy I and Anatomy I Lab	3
DPT 502 & 502L	Anatomy II and Anatomy II Lab	3
DPT 511 & 511L	Biomechanics/Kinesiology I and Biomechanics/Kinesiology Lab	2
DPT 512 & 512L	Biomechanics/Kinesiology II and Biomechanics/Kinesiology II Lab	2
DPT 521	PT Exam/Interventions I	2
DPT 522	PT Exam/Interventions II	2
DPT 531 & 531L	Clinical Practice I and Clinical practice I Lab	2
DPT 532 & 532L	Clinical practice II and Clinical Practice II Lab	2
DPT 533	Clinical Practice III	2
DPT 541 & 541L	Exercise Physiology and Exercise Physiology Lab	3
DPT 542 & 542L	Functional Neuroscience and Functional Neuroscience Lab	3
DPT 550	Research I	2
DPT 551	Research II	2
DPT 560	Psychosoc Issues Health/Well	3
DPT 561	Ethics in Healthcare	2
DPT 571	Mvmnt Science Across Lifespan	2
DPT 581	Medical Management I	3
DPT 601 & 601L	Musculoskeletal Rehab I and Musculoskeletal Rehab I Lab	5
DPT 602 & 602L	Musculoskeletal Rehab II and Musculoskeletal Rehab II Lab	4
DPT 611 & 611L	Cardiovascular Rehabilitation and Cardiovascular Rehab Lab	2
DPT 612 & 612L	Pulmonary Rehabilitation and Pulmonary Rehabilitation Lab	2
DPT 620	Leadership	2

DPT 621 & 621L	Neurorehabilitation I and Neurorehabilitation I Lab	4
DPT 622 & 622L	Neurorehabilitation II and Neurorehabilitation II Lab	5
DPT 631	Clinical Practice IV	1
DPT 632 & 632L	Clinical Practice V and Clinical Practice V Lab	2
DPT 633	Clinical Practice VI	1
DPT 634	Clinical Practice VII	1
DPT 641	Integumentary PT	3
DPT 650	Research III	1
DPT 651	Research IV	1
DPT 652	Research V	1
DPT 661	Acute Care PT	2
DPT 671 & 671L	Rehab across the lifespan and Rehab Across the Life Lab	2
DPT 672	Integrative Management I	2
DPT 673	Integrative Management II	3
DPT 681	Medical Management II	2
DPT 690	Clinical Educa. Experience I	12
DPT 691	Clinical Educ. Experience II	12
DPT 692	Clinical Educ. Experience III	12
Total Hours		122

Physician Assistant Overview

The Mission of the Saint Joseph's University Physician Assistant Program is to educate future physician assistants with a foundation in equitable, person-centered, evidence-based care, with a focus on primary care (family medicine), interprofessional healthcare, and an exposure to underserved and diverse populations.

To see a complete list of mission and goals, go to <https://www.sju.edu/departments/physician-assistant-studies/mission-goals> (<https://www.sju.edu/departments/physician-assistant-studies/mission-goals/>).

Faculty

Our faculty have clinical experience in psychiatry, surgery, emergency medicine, urgent care, family practice, neurology, research and more and provide guidance and mentorship to PA students. All faculty members are former or current practicing physician assistants and bring their hands-on knowledge to the classroom.

Department of Physician Assistant Studies Faculty (<https://www.sju.edu/departments/physician-assistant-studies/faculty/>)

Programs Graduate

- Master of Science in Physician Assistant Studies (p. 352)

Master of Science in Physician Assistant Studies

Make a direct impact on the lives of patients as a physician assistant (PA) by obtaining a Master of Science in Physician Assistant Studies

from Saint Joseph's University. Our 24-month MSPAS program prepares you to deliver a broad range of medical services as a physician assistant, including acute patient care, research, and education.

You'll become a leader and innovator in this fast-growing and rewarding medical profession through this physician assistant graduate program. You'll learn how to take a medical history, complete physical exams, interpret diagnostic tests, develop treatment plans, and provide health counseling. You'll also work with diverse patients of all ages in the Greater Philadelphia area and neighboring states through nine clinical rotations over 45 weeks during the second year. During the clinical year, you'll learn under the supervision of a physician or a licensed PA, putting your knowledge into practice.

Learning Goals and Outcomes

In accordance with ARC-PA Standards, the Program defined five areas in which students will be competent ("Competencies") prior to entering clinical practice. These Competencies will be assessed within the final four months of the Program to verify that each student meets the Program requirements.

At the completion of the Program, the student will be able to:

1. Demonstrate proficiency of the clinical and technical skills necessary to enter clinical practice with a focus on those skills beneficial to a family practice provider.
2. Integrate clinical reasoning skills, medical decision-making, and problem-solving abilities through all aspects of patient care. Formulate robust differential diagnoses and determine appropriate next steps, assessments, prognoses, and develop well-reasoned acute and chronic treatment plans.
3. Develop strong interpersonal and interprofessional communication skills with an emphasis on a person/patient-centered approach to medicine. Demonstrate competency in written, oral, and electronic forms of communication. Identify when a referral is indicated to physicians and other healthcare professionals as a member of an interprofessional patient-centered health care team.
4. Possess and apply a thorough biomedical, and clinical science knowledge along with a core medical knowledge via a person/patient-centered approach that focuses on the understanding, analyzing, and evaluation of acute and/or chronic diseases/conditions that occur throughout the lifespan; distinguishing the definitions, etiologies, risk factors, epidemiology, pathophysiology, signs and symptoms, diagnostics, treatments (pharmacotherapies and non-pharmacotherapies), assessments, plans, complications, health promotion/counseling, disease prevention/monitoring, and prognoses of these diseases/conditions that are essential for practice and patient care.
5. Demonstrate professional behaviors in all aspects of patient care and have a robust knowledge of cultural awareness and humility, diversity equity and inclusion, social and physical determinants of health, bioethics, healthcare policy, reimbursement, coding/billing, end of life care, health policy and legal issues as they relate to patient care.

Academic Standing & Progression

Academic Standing

Reflecting the level of professionalism and expertise needed to practice as a physician assistant, Program students are held to the high academic standards needed to satisfy the Program Competencies.

At all times while enrolled in the Program, students must meet the following academic standards ("Academic Standards"):

- 3.00 cumulative GPA at the end of each semester;
- Passing each and every course, meaning:
 - Obtaining a grade of 70.00%; and
 - Completing any other criteria required for passing, as outlined in each individual course syllabus.

Failure to meet the above Academic Standards will result in the following:

- At the end of any semester, a student who does not achieve a cumulative 3.00 GPA or does not pass a course will be put on Academic Probation.
- A student who fails to achieve a 3.00 cumulative GPA and fails a course in the same semester will be dismissed from the Program.
- A student who fails more than one course in the same semester will be dismissed from the Program.
- A student already on Academic Probation who does not achieve a cumulative 3.00 or does not pass a course will be dismissed from the program.

In addition, as further described below, to complete and graduate from the Program, students must:

- Complete the Curricular Requirements in succession;
- Meet the Progression Requirements for each of the Didactic and Clinical Phases of the Program; and
- Complete all Graduation Requirements

Academic Grade Appeals

I. Grades on individual assessments within courses

SJU's Student Complaint Policy (<https://www.sju.edu/offices/academic-admin/registrar/resources/student-complaint-policy-contact-information/>) applies to course-related issues, other than final course grades (addressed below).

II. Final course grades

SJU's Grade Appeal (<https://academiccatalog.sju.edu/programs/#gradestext>) policy applies to the final course grades in the Program.

Requirements for Progression within the Didactic Phase

In addition to maintaining the academic and curricular requirements above, progression requirements and deadlines for completion are outlined below.

To complete Year 1 of the Program and move on to the Clinical Phase, students must:

1. Pass each course in the Didactic Phase.
2. Successfully remediate any assessments or courses as described in the Remediation Policy, below.
3. Complete PACKRAT Examination (subject to Remediation)
4. Demonstrate the required skills necessary for clinical practice, as determined by the Program.
5. Actively participate in required advising activities.
6. Obtain BLS/ACLS certification.
7. Complete all performance improvement plans, as required by the Program.

Deadline for completion of all Didactic Phase requirements: the end of each semester in which they occur.

Requirements for Progression within the Clinical Phase

Requirements for Progression within the Clinical Phase

In addition to maintaining the academic and curricular requirements above, progression requirements and deadlines for completion are outlined below.

To complete Year 2 of the Program, students must:

1. Pass each course in the Clinical Phase.
2. Complete PAEA End of Rotation exams ("EOR exams") with a minimum grade of 65.00%.
3. Obtain an 80.00% (i) on all Preceptor Final Evaluations and (ii) in the professionalism section of each Preceptor Final Evaluation Form.
4. Successfully remediate any assessments or courses as described in the Remediation Policy, below.
5. Complete PACKRAT Examination (subject to Remediation)
6. Demonstrate the required skills necessary for clinical practice, as determined by the Program.
7. Actively participate in required advising activities.
8. Complete all performance improvement plans, as required by the Program.

Deadline for completion of all Clinical Phase requirements: the end of each semester in which they occur (unless subject to applicable Remediation or Academic Probation requirements).

Requirements for Graduation

Students must fulfill all Program and SJU requirements before being awarded a diploma. In addition to meeting the Program's Academic Standards, to fulfill Program graduation requirements, students must:

1. Have a cumulative 3.00 GPA
2. Complete the Didactic Phase progression requirements
3. Complete the Clinical Phase progression requirements

Deadline for completion of all graduation requirements: the end of each semester in which they occur (unless subject to applicable Remediation or Academic Probation requirements).

Deceleration Policy

Students must advance sequentially through the Program within their cohort. Students are allowed to join a later cohort, or "decelerate," only if they qualify for a leave under the SJU Temporary Separation policy. If

temporary separation is approved by the University, a student may join a new cohort in a subsequent academic year, beginning at the start of the semester in which the temporary separation began. If the subsequent cohort is at capacity, the student will be offered the next available seat in a following cohort.

To support a successful return to the Program, a student will be required to pass a re-entry examination (cumulative of their completed coursework up to the date of temporary separation) as a condition of matriculating into a subsequent cohort. Therefore, it is strongly recommended that students commit to self-study and review of materials during their leave. The Program will provide reasonable guidance on a course of study to prepare the student for the re-entry examination until the student successfully passes the exam.

Requirements

Code	Title	Hours
PHA 501	Advanced Human Anatomy	4
PHA 502	Advanced Human Physiology	3
PHA 503	History/Physical I	3
PHA 505	PA History	1
PHA 508	Human Pathophysiology	3
PHA 509	Medical Sciences Foundations	1
PHA 507	Psychosocial Medicine	2
PHA 522	Hist/Phys II & Clinical Skills	3
PHA 523	Clinical Medicine I	5
PHA 525	Diagnostics I	2
PHA 528	Pharmacological Therapy I	3
PHA 529	Clinical Research & Evidence	1
PHA 547	Women's Health	2
PHA 541	Clinical Medicine II	5
PHA 542	Diagnostics II	2
PHA 543	Research Design & Methods	1
PHA 544	Pediatrics	2
PHA 545	Emergency Medicine	3
PHA 546	Surgery	2
PHA 548	Pharmacological Therapy II	3
PHA 601	Professional Practice I	1
PHA 602	Geriatrics I	1
PHA 603	Professional Practice II	1
PHA 604	Capstone	2
PHA 605	Geriatrics II	1
PHA 606	Professional Practice III	1
PHA 651	Family Medicine Rotation I	5
PHA 652	Family Medicine Rotation II	5
PHA 653	Internal Med Clinical Rotation	5
PHA 654	Pediatrics Clinical Rotation	5
PHA 655	Women's Health Rotation	5
PHA 656	Behav/Mental Health Rotation	5
PHA 657	Surgery Rotation	5
PHA 658	Emergency Medicine Rotation	5
PHA 660	Elective Rotation	5
Total Hours		103

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
PHA 501	Advanced Human Anatomy	4
PHA 502	Advanced Human Physiology	3
PHA 503	History/Physical I	3
PHA 505	PA History	1
PHA 508	Human Pathophysiology	3
PHA 509	Medical Sciences Foundations	1
Hours		15
Spring		
PHA 507	Psychosocial Medicine	2
PHA 522	Hist/Phys II & Clinical Skills	3
PHA 523	Clinical Medicine I	5
PHA 525	Diagnostics I	2
PHA 528	Pharmacological Therapy I	3
PHA 529	Clinical Research & Evidence	1
PHA 547	Women's Health	2
Hours		18
Summer		
PHA 541	Clinical Medicine II	5
PHA 542	Diagnostics II	2
PHA 548	Pharmacological Therapy II	3
PHA 543	Research Design & Methods	1
PHA 544	Pediatrics	2
PHA 545	Emergency Medicine	3
PHA 546	Surgery	2
Hours		18
Second Year		
Fall		
PHA 601	Professional Practice I	1
PHA 602	Geriatrics I	1
PHA 651	Family Medicine Rotation I	5
PHA 652	Family Medicine Rotation II	5
PHA 653	Internal Med Clinical Rotation	5
Hours		17
Spring		
PHA 603	Professional Practice II	1
PHA 605	Geriatrics II	1
PHA 655	Women's Health Rotation	5
PHA 656	Behav/Mental Health Rotation	5
PHA 657	Surgery Rotation	5
Hours		17
Summer		
PHA 604	Capstone	2
PHA 606	Professional Practice III	1
PHA 654	Pediatrics Clinical Rotation	5
PHA 658	Emergency Medicine Rotation	5
PHA 660	Elective Rotation	5
Hours		18
Total Hours		103

SCHOOL OF NURSING & ALLIED HEALTH

Leadership

Dean: Melissa Snyder, D.Ed., FNP, CNE

Associate Dean: Marie Wood, EdD, MS, MLS(ASCP)

Assistant Dean: Evelyn Potoka

Faculty Listing: School of Nursing and Allied Health Faculty (<https://directory.sju.edu/nursing-allied-health/faculty/>)

Mission

Educate for excellence in health care practice, leadership and the continuous acquisition of knowledge.

Allied Health

Located at Saint Joseph's University's Lancaster location, the Department of Allied Health is led by faculty members specializing in sonography, cardiovascular and surgical technology, nuclear medicine technology, radiography and respiratory care. Our department aims to educate future leaders in healthcare by providing certificate and associate degree programs in the allied health field.

Faculty

The faculty in the Department of Allied Health brings extensive experience in healthcare specializing in sonography, cardiovascular and surgical technology, nuclear medicine technology, radiography and respiratory care. They are dedicated to helping students learn and grow into competent health professionals.

Department of Allied Health Faculty (<https://www.sju.edu/departments/allied-health/faculty/>)

Programs

Associate Degrees

- Cardiac Sonography (p. 358)
- Cardiovascular Technology (p. 360)
- Diagnostic Medical Sonography (p. 363)
- Nuclear Medicine Technology (p. 365)
- Radiography (p. 366)
- Respiratory Care (p. 368)
- Surgical Technology (p. 372)
- Vascular Sonography (p. 374)

Undergraduate Certificates

- Cardiac Sonography (p. 358)
- Cardiovascular Technology (p. 360)
- Diagnostic Medical Sonography (p. 363)
- Nuclear Medicine Technology (p. 365)
- Surgical Technology (p. 372)
- Vascular Sonography (p. 375)

Cardiac Sonography

Program Description

Saint Joseph's University offers a two-year curriculum of full-time study in cardiac sonography leading to an Associate in Applied Science degree. The program also offers an academic certificate program in cardiac sonography to students who hold an academic degree. Students receive theoretical and clinical instructions in all aspects of cardiac ultrasound in preparation for entry-level positions as cardiac sonographers. Upon satisfactory completion of program requirements and one year of cardiac sonography employment, graduates are eligible to take the American Registry for Diagnostic Medical Sonography (ARDMS) examinations in sonography physics & instrumentation (SPI) and adult echocardiography (AE). Students are also eligible to take the Cardiovascular Credentialing International (CCI) examination registered adult cardiac sonography (RCS) with 800 clinical hours after program completion and upon satisfactory completion of program requirements.

The field of cardiac sonography utilizes high frequency sound waves to image the heart. The faculty of the Cardiac Sonography program believe in the potential for the individual to grow in knowledge as well as in professional importance. The profession of cardiac sonography is recognized as an integral part of the diagnostic medical team.

Program Mission

The mission of the Cardiac Sonography program is to meet the needs of the health care community by providing qualified individuals to become competent entry level cardiac sonographers.

Learning Goals and Objectives

Goal 1: To provide all students with didactic and clinical education, including hands-on, practical scanning experience.

Goal 2: To prepare competent entry-level sonographers in the cognitive (knowledge), psychomotor (skills), and affective (behavior) learning domains for the Adult Cardiac Sonography concentration.

Goal 3: Obtain, review, and integrate pertinent patient history and supporting clinical information to facilitate optimum diagnostic results.

Goal 4: Function as an integral part of the diagnostic medical imaging team, providing patient services efficiently and in a professional, sensitive manner.

Goal 5: Incorporate concepts learned through classroom instruction and clinical practice, ensuring accurate, meaningful sonographic evaluations.

Goal 6: Demonstrate appropriate communication skills with patients and colleagues.

Goal 7: Provide patient education related to cardiac ultrasound and/or other diagnostic techniques.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the CAS program, students must complete all CAS prefix courses with a grade of C (74%) or higher. Additionally, the following courses must be completed with a grade of C (74%) or higher: CVT 203, DMS 111 and DMS 221.

If a student earns less than the required grade, they are dismissed from the program, regardless of GPA. Students receive one attempt at a course. An 'attempt' is defined as earning a grade in a course or late-dropping the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

Applicants and students for the Sonography program are expected to possess the skills and abilities identified in the Technical Standards below in order to successfully complete the program. The Technical Standards include physical, mental, emotional, motor, and cognitive skills and abilities. These standards identify the requirements for admission, progression, and graduation. Students are expected to adhere to these standards throughout the program.

The Technical Standards apply to the University's classrooms and laboratories. The Sonography program has arrangements with independent third-party clinical sites. Students will be subject to the clinical sites' policies, procedures and technical requirements while completing clinical experiential programs.

Applicants or students with disabilities are strongly advised to contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>). It is the student's responsibility to follow the University's registration and accommodation request process. Please contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>) (610)-660-1774 or sds@sju.edu. For clinical experiential programs, students with disabilities will be required to submit accommodation requests to the clinical site.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Discriminate among black, gray, white, and various color combinations on display devices, film, and paper.
- Distinguish audible sounds and adequately view sonograms.
- Inspect and recognize minute details and small objects.
- Observe patients accurately and completely.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff, and patients in order to

receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.

- Follow verbal or written instructions in order to correctly and independently perform procedures.
- Clearly instruct patients prior to and during procedures.
- Respond to emergency situations.

Motor Function

- Use gross and fine motor function, manual dexterity, and physical strength to:
 - Apply general care and emergency treatment to patients;
 - Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa;
 - Lift and move objects (50 pounds or more routinely); and
 - Manipulate ultrasound equipment, computers, and peripherals.
- Capacity to perform diagnostic maneuvers as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Comprehend multi-dimensional relationships and the spatial relationships of anatomic structures.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop a mature, sensitive, and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Physical Requirements

Sonography students are required to be able to perform the following standards of performance: Additional Core Performance Standards in Sonography:

1. Stand, sit, walk, push, pull, squat, bend and climb stairs.
2. Lift and/or carry up to 50 pounds short distances.
3. Reach in forward, lateral, and overhead motions.
4. Distinguish distance, colors, objects, persons.
5. Communicate effectively, both verbally and in writing, using appropriate grammar, spelling, and vocabulary.
6. Process and communicate information on the patient's status with accuracy in a timely manner
7. Think clearly and act calmly in stressful situations.
8. Perform up to a 12-hour clinical experience in a single 24-hour period.

9. Think critically, with sound judgment, emotional stability, maturity, empathy, and physical and mental stamina.
10. Able to retain a long list of procedural steps, medication detail and medical information.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
Philosophy Level One Ethics or Theology		3
Math & Natural Science Requirements		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
Diversity		3
Total Hours		19-20

Major Requirements

Code	Title	Hours
BIO 175	A&P for Nursing &Allied Health	4
BIO 175L	A&P Nursing& Allied Health Lab	0
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing&Allied Hlth II Lab	0
CVT 203	Rhythm & 12 Lead ECG Analysis	3
DMS 111	Intro to Sonography	1
DMS 221	Ultrasound Physics	3
CAS 113L	Echo Lab I	1
CAS 206	Ultrasound Cardiac Anat & Phys	3
CAS 222	Echo Hemodynamics	1
CAS 220	Cardiac Pathophysiology I	3
CAS 223	Cardiac Pathophysiology II	3
CAS 227	Introduction to Pediatric Echo	2
CAS 233L	Echo Lab II	2
CAS 224C	Echo Clinical I	3
CAS 228C	Echo Clinical II	3
CAS 232	Echo Clinical III	4
CAS 226	Adv Echo & Therapeutic Techniq	2
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1
Total Hours		44

Certificate Requirements

Code	Title	Hours
DMS 111	Intro to Sonography	1
CVT 203	Rhythm & 12 Lead ECG Analysis	3
CAS 113L	Echo Lab I	1

DMS 221	Ultrasound Physics	3
CAS 206	Ultrasound Cardiac Anat & Phys	3
CAS 220	Cardiac Pathophysiology I	3
CAS 222	Echo Hemodynamics	1
CAS 223	Cardiac Pathophysiology II	3
CAS 227	Introduction to Pediatric Echo	2
CAS 233L	Echo Lab II	2
CAS 224C	Echo Clinical I	3
CAS 228C	Echo Clinical II	3
CAS 232	Echo Clinical III	4
CAS 226	Adv Echo & Therapeutic Techniq	2
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
PHL 104	Ethics in Health Care	3

Total Hours	39
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Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Associate Degree Only		
BIO 175	A&P for Nursing &Allied Health	4
BIO 175L	A&P Nursing& Allied Health Lab	0
ENG 101	Craft of Language	3
PSY 100	Introductory Psychology	3
MAT 112	College Algebra	3
Hours		13
Spring		
Associate Degree Only		
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing&Allied Hlth II Lab	0
SOC 101 or SOC 270	Intro to Sociology or Special Topics	3
PHY 200	Survey of Physics	3
PHY 200L	Survey of Physics Laboratory	1
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1
Hours		13
Summer		
Associate Degree and Certificate Program		
CVT 203	Rhythm & 12 Lead ECG Analysis	3
DMS 111	Intro to Sonography	1
Hours		4
Second Year		
Fall		
Associate Degree and Certificate Program		
DMS 221	Ultrasound Physics	3
CAS 206	Ultrasound Cardiac Anat & Phys	3
CAS 222	Echo Hemodynamics	1
CAS 220	Cardiac Pathophysiology I	3
CAS 113L	Echo Lab I	1
Hours		11
Spring		
Associate Degree and Certificate Program		
CAS 223	Cardiac Pathophysiology II	3
CAS 233L	Echo Lab II	2
CAS 227	Introduction to Pediatric Echo	2

PHL 104	Ethics in Health Care	3
Hours		10
Summer		
Associate Degree and Certificate Program		
CAS 224C	Echo Clinical I	3
CAS 228C	Echo Clinical II	3
Hours		6
Third Year		
Fall		
CAS 226	Adv Echo & Therapeutic Techniq	2
CAS 232	Echo Clinical III	4
Hours		6
Total Hours		63

Cardiovascular Technology

The cardiovascular technologist assists physicians in the invasive cardiovascular laboratory. Procedures in the cardiovascular lab include coronary angiography and intervention, ventriculography, atherectomy, peripheral vascular angiography and intervention, structural heart, and electrophysiology, as well as other heart and vascular diagnostic and therapeutic studies.

The cardiovascular technologist also provides extensive personal care to the patient before, during and after a cardiovascular procedure. Cardiovascular technology is a rapidly expanding field and has become an essential and integral component of the health care continuum.

Program Description

The Cardiovascular Technology program offers a two-year Associate in Applied Science degree or a 14-month academic certificate program for qualified students. The program provides the student with classroom and online theory courses and supervised clinical experiences. Clinical instruction offers a variety of experiences whereby students apply theoretical knowledge to develop clinical skills in the treatment of cardiovascular disease, peripheral disease and cardiac electrophysiology.

Prospective students who have completed a two-year, post-secondary allied health program; have earned an associate or baccalaureate degree; or will have met the degree requirements from their primary educational institution upon completion of this program are eligible to enter the 14-month Academic Certificate program. Prerequisite coursework includes Human Anatomy & Physiology I and II.

Students are required to take the Registered Cardiovascular Invasive Specialist credentialing examination offered by Cardiovascular Credentialing International prior to graduation.

Program Mission

The mission of the Cardiovascular Technology program is to create a compassionate, competent and professional cardiovascular technologist. The program will provide an education that encompasses theory, professionalism and ethical concepts relating to clinical practice. The program facilitates independent learning and critical thinking and promotes technical skill development, enabling graduates to function effectively as team members who provide quality client care in the cardiovascular environment.

Learning Goals and Objectives

Goal 1: Be prepared as a competent entry-level cardiovascular technologist in the cognitive (knowledge), psychomotor (skills) and affective (behavior) learning domains for cardiovascular technology.

Goal 2: Utilize theoretical knowledge and critical thinking as the basis for professional practice.

Goal 3: Practice responsibly within the ethical and legal realm of cardiovascular technology.

Goal 4: Assume responsibility for lifelong personal learning and professional growth.

Goal 5: Provide quality care as a competent and compassionate professional in the dynamic cardiovascular environment.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the Cardiovascular Technology program, students must complete the following courses with a B (84%) or higher: CVT 204L, CVT 212C, CVT 222C, and CVT 232C. All other courses with the CVT prefix require a grade of C (74%) or higher.

CVT students are required to obtain Advanced Cardiac Life Support certification during their clinical year. Proof of course completion and ACLS certification must be presented as a condition of graduation.

If a student earns less than the required grade in a program specific course, they are dismissed from the program, regardless of GPA. Students receive one attempt at a program specific course. An 'attempt' is defined as earning a grade in a course or withdrawing from the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

All candidates for the Cardiovascular Technology (CVT) program must possess the physical and mental skills and abilities to successfully complete the program. The program requires students to possess minimal physical, mental, emotional, motor, and cognitive abilities. These technical standards are required for admission, promotion, and graduation.

Although these technical standards identify the required physical and mental abilities of all candidates, the technical standards are not intended to deter any prospective student for whom reasonable accommodation will allow the prospective student to access the curriculum.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Inspect and recognize minute details and small objects.
- Ability to quickly detect and react to slight motions and/or the ability to accurately distinguish colors.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Ability to monitor the condition of patients and medical equipment.
- Ability to recognize alarms and alert others of emergency situations.

Motor Function

- Use gross and fine motor function, manual dexterity, and physical strength to:
- Apply general care and emergency treatment to patients;
- Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa;
- Lift and move objects (50 pounds or more routinely); and
- Capacity to perform diagnostic maneuvers and manipulate equipment and instruments as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop a mature, sensitive, and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
	Philosophy Level One Ethics or Theology	3
Math & Natural Science Requirements		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
	Diversity	3
Total Hours		19-20

Major Requirements

Code	Title	Hours
CVT 203	Rhythm & 12 Lead ECG Analysis	3
CVT 204L	Cardiovascular Simulation Lab	1
CVT 205	Cardiac Invasive Procedures	3
CVT 202	Intro to Rad Physics & Safety	1
CVT 206	Cardiac A&P	3
CVT 207	Advanced Procedures	3
CVT 217	Cardiovascular Hemodynamics	3
CVT 212C	Cardiovascular Clinical I	6
CVT 216	Cardiac Device Theory	3
CVT 219	Cardiac Arrhythmia Therapies	3
CVT 225	Cardiac Pharmacology	3
CVT 222C	Cardiovascular Clinical II	6
CVT 200	Advanced Cardiac Life Support	1
CVT 228	Radiation Biology	1
CVT 232C	Cardiovascular Clinical III	3
Total Hours		43

Certificate Requirements

Code	Title	Hours
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
CVT 203	Rhythm & 12 Lead ECG Analysis	3
CVT 204L	Cardiovascular Simulation Lab	1
CVT 205	Cardiac Invasive Procedures	3
CVT 202	Intro to Rad Physics & Safety	1
CVT 206	Cardiac A&P	3
CVT 207	Advanced Procedures	3
CVT 217	Cardiovascular Hemodynamics	3
CVT 216	Cardiac Device Theory	3
CVT 212C	Cardiovascular Clinical I	6
CVT 219	Cardiac Arrhythmia Therapies	3

CVT 225	Cardiac Pharmacology	3
CVT 222C	Cardiovascular Clinical II	6
CVT 200	Advanced Cardiac Life Support	1
CVT 228	Radiation Biology	1
CVT 232C	Cardiovascular Clinical III	3
Total Hours		45

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Associate Degree Only		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
ENG 101	Craft of Language	3
MAT 112	College Algebra	3
PHL 104	Ethics in Health Care	3
Hours		13
Spring		
Associate Degree Only		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health Lab	4
PHY 200 & 200L	Survey of Physics and Survey of Physics Laboratory	4
SOC 101 or SOC 270	Intro to Sociology or Special Topics	3
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
Hours		13
Summer		
Associate Degree and Certificate Program		
CVT 204L	Cardiovascular Simulation Lab	1
CVT 203	Rhythm & 12 Lead ECG Analysis	3
CVT 205	Cardiac Invasive Procedures	3
CVT 202	Intro to Rad Physics & Safety	1
Hours		8
Second Year		
Fall		
Associate Degree and Certificate Program		
CVT 206	Cardiac A&P	3
CVT 207	Advanced Procedures	3
CVT 217	Cardiovascular Hemodynamics	3
CVT 212C	Cardiovascular Clinical I	6
Hours		15
Spring		
Associate Degree and Certificate Program		
CVT 219	Cardiac Arrhythmia Therapies	3
CVT 222C	Cardiovascular Clinical II	6
CVT 225	Cardiac Pharmacology	3
CVT 216	Cardiac Device Theory	3
Hours		15
Summer		
Associate Degree and Certificate Program		
CVT 228	Radiation Biology	1
CVT 232C	Cardiovascular Clinical III	3
CVT 200	Advanced Cardiac Life Support	1
Hours		5
Total Hours		69

Diagnostic Medical Sonography

Program Description

Saint Joseph's University offers a two-year curriculum of full-time study in diagnostic medical sonography (DMS) leading to an Associate in Applied Science degree. The program also offers an academic certificate program in diagnostic medical sonography for those who already have a degree. Students receive theoretical and clinical instruction in all aspects of diagnostic ultrasound in preparation for entry-level positions as diagnostic medical sonographers. Upon satisfactory completion of program requirements, graduates are eligible to take the American Registry for Diagnostic Medical Sonography (ARDMS) examinations in physics, abdomen, and obstetrics/gynecology.

The field of diagnostic medical sonography utilizes high frequency sound waves to image and evaluate organs and soft tissue structures of the body. The sonographer performs a variety of diagnostic examinations, including evaluations of the abdomen, superficial structures, peripheral blood vessels, as well as studies of the pregnant and non-pregnant female patient. The faculty of the DMS program believe in the potential for the individual to grow in knowledge as well as in professional importance. The profession of DMS is recognized as an integral part of the diagnostic medical team.

Program Mission

The mission of the Diagnostic Medical Sonography program is to meet the needs of the health care community by providing qualified, competent entry level diagnostic medical sonographers.

Learning Goals and Objectives

Goal 1: To provide all students with didactic and clinical education, including hands-on, practical scanning experience.

Goal 2: To prepare competent entry-level sonographers in the cognitive (knowledge), psychomotor (skills), and affective (behavior) learning domains for the Abdominal Sonography-Extended and Obstetrics and Gynecology Sonography concentrations.

Goal 3: Function as an integral part of the diagnostic medical imaging team, providing patient services efficiently and in a professional, sensitive manner.

Goal 4: Incorporate concepts learned through classroom instruction and clinical practice, ensuring accurate, meaningful sonographic evaluations.

Goal 5: Serve as a resource and an advocate for the use of ultrasound in medicine.

Goal 6: Demonstrate a commitment to the professional role through lifelong learning.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned

cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the DMS program, students must complete all DMS prefix courses with a grade of C (74%) or higher.

If a student earns less than the required grade, they are dismissed from the program, regardless of GPA. Students receive one attempt at a course. An 'attempt' is defined as earning a grade in a course or late-dropping the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

Applicants and students for the Sonography program are expected to possess the skills and abilities identified in the Technical Standards below in order to successfully complete the program. The Technical Standards include physical, mental, emotional, motor, and cognitive skills and abilities. These standards identify the requirements for admission, progression, and graduation. Students are expected to adhere to these standards throughout the program.

The Technical Standards apply to the University's classrooms and laboratories. The Sonography program has arrangements with independent third-party clinical sites. Students will be subject to the clinical sites' policies, procedures and technical requirements while completing clinical experiential programs.

Applicants or students with disabilities are strongly advised to contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>). It is the student's responsibility to follow the University's registration and accommodation request process. Please contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>) (610)-660-1774 or sds@sju.edu. For clinical experiential programs, students with disabilities will be required to submit accommodation requests to the clinical site.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Discriminate among black, gray, white, and various color combinations on display devices, film, and paper.
- Distinguish audible sounds and adequately view sonograms.
- Inspect and recognize minute details and small objects.
- Observe patients accurately and completely.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff, and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.

- Follow verbal or written instructions in order to correctly and independently perform procedures.
- Clearly instruct patients prior to and during procedures.
- Respond to emergency situations.

Motor Function

Use gross and fine motor function, manual dexterity, and physical strength to:

- Apply general care and emergency treatment to patients;
- Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa;
- Lift and move objects (50 pounds or more routinely); and
- Manipulate ultrasound equipment, computers, and peripherals.
- Capacity to perform diagnostic maneuvers as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Comprehend multi-dimensional relationships and the spatial relationships of anatomic structures.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop a mature, sensitive, and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Physical Requirements

Sonography students are required to be able to perform the following standards of performance: Additional Core Performance Standards in Sonography:

1. Stand, sit, walk, push, pull, squat, bend and climb stairs.
2. Lift and/or carry up to 50 pounds short distances.
3. Reach in forward, lateral, and overhead motions.
4. Distinguish distance, colors, objects, persons.
5. Communicate effectively, both verbally and in writing, using appropriate grammar, spelling, and vocabulary.
6. Process and communicate information on the patient's status with accuracy in a timely manner
7. Think clearly and act calmly in stressful situations.
8. Perform up to a 12-hour clinical experience in a single 24-hour period.
9. Think critically, with sound judgment, emotional stability, maturity, empathy, and physical and mental stamina.

10. Able to retain a long list of procedural steps, medication detail and medical information.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
	Philosophy Level One Ethics or Theology	3
Math & Natural Science Requirements		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
		3
Diversity		
		3
Total Hours		19-20

Major Requirements

Code	Title	Hours
BIO 175	A&P for Nursing & Allied Health	4
BIO 175L	A&P Nursing & Allied Health Lab	0
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing & Allied Health II Lab	0
DMS 111	Intro to Sonography	1
DMS 112	Abdominal Sonography I	3
DMS 113L	Ultrasound Lab I	1
DMS 221	Ultrasound Physics	3
DMS 222	Abdominal Sonography II	3
DMS 223	Ob/Gyn Sonography I	3
DMS 226	Ob/Gyn Sonography II	3
DMS 227	Common Vascular Procedures	1
DMS 235L	Ultrasound Lab II	2
DMS 230	Superficial Structures	2
DMS 224C	Ultrasound Clinical I	3
DMS 233C	Ultrasound Clinical II	3
DMS 234C	Ultrasound Clinical III	8
DMS 231	Ultrasound Seminar	2
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1
Total Hours		48

Certificate Requirements

Code	Title	Hours
DMS 111	Intro to Sonography	1
DMS 113L	Ultrasound Lab I	1
DMS 112	Abdominal Sonography I	3
DMS 221	Ultrasound Physics	3
DMS 227	Common Vascular Procedures	1

DMS 223	Ob/Gyn Sonography I	3
DMS 222	Abdominal Sonography II	3
DMS 226	Ob/Gyn Sonography II	3
DMS 230	Superficial Structures	2
DMS 235L	Ultrasound Lab II	2
DMS 224C	Ultrasound Clinical I	3
DMS 233C	Ultrasound Clinical II	3
DMS 234C	Ultrasound Clinical III	8
DMS 231	Ultrasound Seminar	2
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
PHL 104	Ethics in Health Care	3

Total Hours **43**

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Associate Degree Only		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
ENG 101	Craft of Language	3
MAT 112	College Algebra	3
PSY 100	Introductory Psychology	3
Hours		13
Spring		
Associate Degree Only		
BIO 176 & BIO 175L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health Lab	4
PHY 200	Survey of Physics	3
PHY 200L	Survey of Physics Laboratory	1
SOC 101 or SOC 270	Intro to Sociology or Special Topics	3
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1
Hours		13
Summer		
Associate Degree and Certificate Program		
DMS 111	Intro to Sonography	1
Hours		1
Second Year		
Fall		
Associate Degree and Certificate Program		
DMS 221	Ultrasound Physics	3
DMS 227	Common Vascular Procedures	1
DMS 112	Abdominal Sonography I	3
DMS 113L	Ultrasound Lab I	1
DMS 223	Ob/Gyn Sonography I	3
Hours		11
Spring		
Associate Degree and Certificate Program		
DMS 226	Ob/Gyn Sonography II	3
DMS 230	Superficial Structures	2
DMS 235L	Ultrasound Lab II	2
DMS 222	Abdominal Sonography II	3
PHL 104	Ethics in Health Care	3
Hours		13
Summer		
Associate Degree and Certificate Program		

DMS 224C	Ultrasound Clinical I	3
DMS 233C	Ultrasound Clinical II	3
Hours		6
Third Year		
Fall		
DMS 231	Ultrasound Seminar	2
DMS 234C	Ultrasound Clinical III	8
Hours		10
Total Hours		67

Nuclear Medicine Technology

Nuclear medicine is the medical specialty that utilizes the nuclear properties of radioactive substances and stable nuclides to make diagnostic evaluations of the physiologic and/or anatomic conditions of the body and to provide therapy with unsealed radioactive sources. The nuclear medicine technologist is an allied health professional who, under the direction of an authorized user, is committed to applying the art and skill of diagnostic evaluation and therapeutics through the safe and effective use of radiopharmaceuticals and pharmaceuticals.

The nuclear medicine technologist exhibits professionalism in the performance of duties, demonstrates an empathetic and instructional approach to patient care, and maintains confidentiality of information as required. Responsibilities include but are not limited to preparation, quality control testing and administration of radioactive and non-radioactive compounds; execution of patient imaging procedures including computer processing and image enhancement; laboratory testing; patient interviews; instruction and preparation for administration of prescribed radioactive compounds for therapy; quality control; and radiation safety. The nuclear medicine technologist applies knowledge of radiation physics and safety regulations to limit the radiation exposure to the general public, patients, fellow workers and self to as low as reasonably achievable. Professional growth and development are achieved through appropriate utilization of new technologies, participation in continuing education and involvement in research to enhance the quality of patient care.

Program Description

Saint Joseph's University offers a two-year curriculum of full-time study in nuclear medicine leading to an Associate in Applied Science degree. The University also offers a 13.5-month academic certificate program in nuclear medicine technology to students who have completed college-level courses in Human Anatomy & Physiology I and II, Physics, Mathematics (a minimum of college algebra), Chemistry, and English composition. Clinical education offers a variety of supervised experiences through which students gain competency-based, entry-level nuclear medicine technology skills. Class size is limited in order to provide the learner with individual attention in a wide variety of clinical areas. Upon completion of the program, the graduate is eligible for the Nuclear Medicine Technology Certification Board (NMTCB) and/or The American Registry of Radiologic Technologists (ARRT) certification exam in nuclear medicine technology.

Mission

The mission of the Nuclear Medicine Technology program is to provide didactic and clinical education to persons who wish to serve the community as competent, entry-level nuclear medicine technologists.

Learning Goals and Objectives

Goal 1: Work effectively with members of the health care team.

Goal 2: Demonstrate competency in the performance of nuclear medicine procedures.

Goal 3: Show ability to think critically by applying didactic knowledge to clinical situations.

Goal 4: Assume responsibility for continuous learning, professional growth and service to the community.

Goal 5: Respect the ethical, legal, moral and cultural issues that impact the care of patients.

Academic Progression

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the Nuclear Medicine program, students must complete the following courses with a B (84%) or higher: NMT 211C, NMT 212C, and NMT 213. All other courses with the NMT prefix require a grade of C (74%) or higher.

If a student earns less than the required grade in a program specific course, they are dismissed from the program, regardless of GPA. Students receive one attempt at a program specific course. An 'attempt' is defined as earning a grade in a course or withdrawing from the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

All candidates for the Nuclear Medical Technology (NMT) program must possess the physical and mental skills and abilities to successfully complete the program. The program requires students to possess minimal physical, mental, emotional, motor, and cognitive abilities. These technical standards are required for admission, promotion, and graduation.

Although these technical standards identify the required physical and mental abilities of all candidates, the technical standards are not intended to deter any prospective student for whom reasonable accommodation will allow the prospective student to access the curriculum.

Observation

- Observe materials presented in the learning environment, including clinical experiences, audiovisual presentations, experiments, and written documents.

- Possess the visual acuity necessary to monitor patient vital signs.
- Distinguish audible sounds and adequately view sonograms.
- Inspect and recognize minute details and small objects.
- Observe patients accurately and completely.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Respond to emergency situations.

Motor Function

- Use gross and fine motor function, manual dexterity, and physical strength to:
- Apply general care and emergency treatment to patients;
- Position patients and operate nuclear medicine equipment;
- Inject radiopharmaceuticals and pharmaceuticals required for Nuclear Medicine diagnostic and therapeutic scans.
- Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa;
- Lift and move objects (50 pounds or more routinely); and
- Push mobile gamma camera and computer system and maneuver the equipment into patient rooms;
- Capacity to perform diagnostic maneuvers as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Comprehend multi-dimensional relationships and the spatial relationships of anatomic structures.
- Recognize potentially hazardous materials, equipment and situations and proceed safely to reduce risk of injury to patient or self.
- Minimize radiation exposure to patients, self, and others.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop a mature, sensitive and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
	Philosophy Level One Ethics or Theology	3
Math & Natural Science Requirements		
	Mathematics	3-4
	Natural Science	4
Social Science Requirement		
	Diversity	3
Total Hours		19-20

Major Requirements

Code	Title	Hours
NMT 221	Nuclear Medicine Theory I	2
NMT 211C	Nuclear Med Clin I	5
NMT 212C	Nuclear Med Clin II	5
NMT 213	Nuclear Med Internship	7
HSC 390	Medical Terminology	1-2
PHL 104	Ethics in Health Care	3

* Students will also be required to take NMT 222, NMT 223, NMT 224, NMT 225, NMT 226, NMT 227 and NMT 228. These courses will be offered beginning in Fall 2026.

Certificate Requirements

Students already holding an associate or baccalaureate degree, or who will have met the degree requirements from their primary educational program upon completion of the certificate program, may apply for the 13.5- month academic certificate program. Admission is given on a space available basis. Academic affiliates include Millersville University, Cedar Crest College, York College, and Indiana University of Pennsylvania.

Code	Title	Hours
NMT 201	Nuclear Medicine Theory I	4
NMT 202	Nuclear Med Theory II	6
NMT 211C	Nuclear Med Clin I	5
NMT 212C	Nuclear Med Clin II	5
NMT 203	Nuclear Med Theory III	2
NMT 213	Nuclear Med Internship	6
NMT 195	Cross-Sectional Anatomy	1
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1-2
PHL 104	Ethics in Health Care	3
Total Hours		34-35

Typical Course Sequence Certificate Students

Course	Title	Hours
First Year		
Fall		
NMT 201	Nuclear Medicine Theory I	4
HSC 390	Medical Terminology	1-2
NMT 211C	Nuclear Med Clin I	5
INT 103	Methods of Patient Care	1
PHL 104	Ethics in Health Care	3
Hours		14-15
Spring		
NMT 202	Nuclear Med Theory II	6
NMT 195	Cross-Sectional Anatomy	1
NMT 212C	Nuclear Med Clin II	5
Hours		12
Summer		
NMT 213	Nuclear Med Internship	6
NMT 203	Nuclear Med Theory III	2
Hours		8
Total Hours		34-35

Radiography

Radiographers perform a variety of radiographic (X-ray) examinations on nearly every organ or body region utilizing radiographic and digital imaging equipment and computers. The radiographer comes in contact with patients of all ages and various levels of health, ranging from the patient requiring a routine check-up to the severely injured trauma patient. The radiographer must meet the health care needs of the patient while providing them with excellent service to meet the physician's diagnostic needs. Radiographers also have the opportunity to expand their careers through additional education and clinical experience in subspecialty areas such as vascular imaging, mammography, radiation therapy, computed tomography and magnetic resonance imaging. The radiographer is an integral part of the health care team, utilizing skills, talents and education to meet the patient's needs in an efficient and professional manner.

Program Description

The Radiography program is designed to educate students in the science of radiography. Students are instructed in the classroom and at multiple clinical facilities. Upon completion of the program, graduates are awarded an Associate in Applied Science degree and are eligible to take the American Registry of Radiologic Technologists registry examination.

Mission

The Radiography program provides the health care community with educated, professionally competent, entry-level radiographers.

Learning Goals and Objectives

Goal 1. To prepare competent, entry-level radiographers in the cognitive (knowledge) and psychomotor (skills) learning domains.

Outcome 1.1: Student is able to apply knowledge in anatomical technique selection and EI evaluation.

Outcome 1.2: Student will demonstrate positioning skills for a given examination.

Outcome 1.3: Student is able to recognize imaging errors and describe corrective action.

Goal 2. Demonstrate a commitment to professional ethics, attitudes, and behaviors.

Outcome 2.1: Student explains the importance of ethics in the Radiography profession.

Outcome 2.2: Student models professional ethics, behaviors and attitudes when in the clinical setting.

Goal 3. Apply theoretical knowledge and critical thinking to clinical practice.

Outcome 3.1: Student will apply critical thinking skills to classroom and lab applications.

Outcome 3.2: Student exhibits synthesis of coursework, clinical skills, and experiential learning to demonstrate proficiency in the health care setting.

Goal 4. Communicate effectively and respectfully with the patient and members of the healthcare team.

Outcome 4.1: Student will effectively utilize oral communication with patients and other members of the healthcare team in the lab and clinical setting.

Outcome 4.2: Student will utilize effective written communication.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the Radiography program, students must complete the following courses with a B (84%) or higher: RAD 104C, RAD 122C, RAD 222C and RAD 224C. All other courses with the RAD prefix require a grade of C (74%) or higher.

If a student earns less than the required grade in a program specific course, they are dismissed from the program, regardless of GPA. Students receive one attempt at a program specific course. An 'attempt' is defined as earning a grade in a course or withdrawing from the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student

re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

Applicants and students for the radiography program are expected to possess the skills and abilities identified in the Technical Standards below in order to successfully complete the program. The Technical Standards include physical, mental, emotional, motor, and cognitive skills and abilities. These standards identify the requirements for admission, progression, and graduation. Students are expected to adhere to these standards throughout the program.

The Technical Standards apply to the University's classrooms and laboratories. The radiography program has arrangements with independent third-party clinical sites. Students will be subject to the clinical sites' policies, procedures and technical requirements while completing clinical experiential programs.

Applicants or students with disabilities are strongly advised to contact the Office of Student Disability Services. It is the student's responsibility to follow the University's registration and accommodation request process. Please contact the Office of Student Disability Services (610)-660-1774 or sds@sju.edu. For clinical experiential programs, students with disabilities will be required to submit accommodation requests to the clinical site.

Technical Standards: Specifics

All candidates for the Radiography program must possess the physical and mental skills and abilities to successfully complete the program. The program requires students to possess minimal physical, mental, emotional, motor, and cognitive abilities. These technical standards are required for admission, promotion, and graduation.

Although these technical standards identify the required physical and mental abilities of all candidates, the technical standards are not intended to deter any prospective student for whom reasonable accommodation will allow the prospective student to access the curriculum.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Distinguish gray-scale changes for the purpose of radiographic image quality.
- Inspect and recognize minute details and small objects.
- Observe patients accurately and completely.

Communication

- Effectively converse and communicate with faculty members, fellow students, clinical staff and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Follow verbal or written instructions in order to correctly and independently perform procedures.
- Clearly instruct patients prior to and during procedures.
- Respond to emergency situations.

Motor Function

Use gross and fine motor function, manual dexterity, and physical strength to:

- Apply general care and emergency treatment to patients
- Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa
- Lift and carry an image receptor plate that can weigh approximately 8-12 pounds at an extended arm's length from the body with relative ease
- Reach and adjust x-ray tube and equipment approximately 72-80 inches above the floor.
- Lift and move objects up to 50 lbs.
- Manipulate and move radiography equipment, including portable fluoroscopic machines, computers, and peripherals.
- Capacity to perform diagnostic maneuvers as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Comprehend multi-dimensional relationships and the spatial relationships of anatomic structures.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize it effectively for recall.
- Sustain concentration to a task over an extended period of time.
- Perform diagnostic maneuvers as required to meet curricular goals.
- Function effectively as a student in both online and in-person learning-environment, including procuring all necessary equipment and services to access course information.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop mature, sensitive, and effective relationships with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
	Philosophy Level One Ethics or Theology	3

Math & Natural Science Requirements

Mathematics	3-4
Natural Science	4
Social Science Requirement	3
Diversity	3
Total Hours	19-20

Major Requirements

Code	Title	Hours
RAD 101	Radiographic Procedures I	4
RAD 122L & RAD 122C	Clinical Practice I Lab and Clinical Practice I Clinical	3
RAD 131	Radiologic Science I	2
RAD 123	Radiographic Procedures II	4
RAD 132	Radiologic Science II	3
RAD 104C & RAD 104L	Clinical Practice II Clinical and Clinical Practice II Lab	3
RAD 221	Adv Radiographic Procedures I	4
RAD 222L & RAD 222C	Clinical Practice III Lab and Clinical Practice III Clinical	5
RAD 233	Radiologic Science III	1
RAD 223	Adv Radiographic Procedures II	4
RAD 240	Radiation Biology	1
NMT 195	Cross-Sectional Anatomy	1
RAD 224C & RAD 224L	Clinical Practice IV and Clinical Practice IV Lab	5
Total Hours		40

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
RAD 101	Radiographic Procedures I	4
RAD 131	Radiologic Science I	2
RAD 122L & RAD 122C	Clinical Practice I Lab and Clinical Practice I Clinical	3
INT 103	Methods of Patient Care	1
HSC 390	Medical Terminology	1
PHL 104	Ethics in Health Care	3
Hours		18
Spring		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health II Lab	4
ENG 101	Craft of Language	3
RAD 123	Radiographic Procedures II	4
RAD 104L & RAD 104C	Clinical Practice II Lab and Clinical Practice II Clinical	3
RAD 132	Radiologic Science II	3
Hours		17
Second Year		
Fall		
PSY 100	Introductory Psychology	3
RAD 221	Adv Radiographic Procedures I	4
RAD 233	Radiologic Science III	1

RAD 222L & RAD 222C	Clinical Practice III Lab and Clinical Practice III Clinical	5
MAT 112	College Algebra	3
Hours		16
Spring		
Elective		
RAD 223	Adv Radiographic Procedures II	4
SOC 204	Cultural Diversity	3
RAD 240	Radiation Biology	1
RAD 224L & RAD 224C	Clinical Practice IV Lab and Clinical Practice IV	5
NMT 195	Cross-Sectional Anatomy	1
Hours		17
Total Hours		68

Respiratory Care

The Respiratory Care program educates students to become registered respiratory therapists. Respiratory therapists are health care professionals that work at the bedside of patients with respiratory or breathing problems. Using patient interviews and chest exams, respiratory therapists assist in diagnosing pulmonary conditions and recommending treatment. Respiratory therapists consult with physicians and recommend changes in therapy based on evaluations of the patient. They analyze breathing, tissue and blood specimens to determine levels of oxygen and other gases. Respiratory therapists manage ventilators and artificial airway devices of patients in the neonatal, pediatric, or adult ICU who can't breathe normally on their own. They respond to cardiac arrests, traumas, and other urgent calls for care in the ER and critical care units. Respiratory therapists also educate patients and families about lung disease to maximize their recovery. Additionally, respiratory therapists may also be found in home care, long-term ventilator-dependent, pulmonary rehabilitation, or pulmonary function facilities.

Program Description

The Respiratory Care program is a 24-month, six-semester program that begins in the fall semester. The Respiratory Care program is unique from other programs because students have clinical bedside experiences with their respiratory faculty every semester beginning in the first spring semester. Additionally, Respiratory Care students develop decision-making and critical thinking skills with the use of clinical simulation. Upon successful completion of the program, students earn an Associate in Applied Science degree and are eligible to take the National Board of Respiratory Care credentialing exams.

The AAS Degree Respiratory Therapy program located in Lancaster, PA, program number 200558, is accredited by the Commission on Accreditation for Respiratory Care (www.coarc.com). For more information, contact the Commission on Accreditation for Respiratory Care at 264 Precision Boulevard, Telford, TN 37690 or (817) 283-2835.

Mission

The mission of the Respiratory Care program is to create a dynamic learning environment that educates its students to be compassionate, competent professionals that obtain the registered respiratory therapist credential. The program will facilitate critical thinking and independent learning as well as development of therapeutic skills to enable graduates to function effectively as part of the health care team.

Learning Goals and Objectives

Goal 1: Demonstrate competence in the cognitive (knowledge), psychomotor (skills) and affective (behavior) learning domains of respiratory care practice as performed by registered respiratory therapists.

Goal 2: Function as an integral part of the health care team.

Goal 3: Provide patients with competent, efficient and professional cardiopulmonary care.

Goal 4: Utilize theoretical knowledge, clinical experience and critical thinking as the basis for professional practice.

Goal 5: Practice responsibly within the ethical and legal realm of the respiratory therapist.

Goal 6: Demonstrate compassionate and culturally sensitive patient care.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the Respiratory Care program, students must complete the following courses with a B (84%) or higher: RCP 240C and RCP 290. All other courses with the RCP prefix require a grade of C (74%) or higher.

If a student earns less than the required grade in a program specific course, they are dismissed from the program, regardless of GPA. Students receive one attempt at a program specific course. An 'attempt' is defined as earning a grade in a course or withdrawing from the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements Technical Standards

All candidates for the Respiratory Care program must possess the physical and mental skills and abilities to successfully complete the program. The program requires students to possess minimal physical, mental, emotional, motor, and cognitive abilities. These technical standards are required for admission, promotion, and graduation.

Although these technical standards identify the required physical and mental abilities of all candidates, the technical standards are

not intended to deter any prospective student for whom reasonable accommodation will allow the prospective student to access the curriculum.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Identify sounds related to bodily functions using stethoscope.
- Observe and collect data from recording equipment and measuring devices.
- Recognize odors from patients (e.g., foul smelling drainage, infections, etc.)

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Monitor the condition of patients and medical equipment.
- Recognize alarms and alert others of emergency situations.
- Read analog and digital displays, patients' condition charts, and information systems.

Motor Function

- Use gross and fine motor function, manual dexterity, and physical strength to:
- Apply general care and emergency treatment to patients;
- Move and reposition patients and equipment;
- Perform physical assessment accurately (e.g. auscultation, physical inspection, palpation, etc.);
- Reach hospital equipment and electrical outlets, including oxygen administering systems.
- Maneuver in small areas;
- Manipulate small equipment and containers; and
- Move objects (50 pounds or more routinely).
- Capacity to perform diagnostic maneuvers and manipulate equipment and instruments as required to meet curricular goals, including cardiopulmonary resuscitation (CPR).

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Demonstrate emotional stability to function effectively under stress and adapt to changing environments.
- Develop a mature, sensitive and effective relationship with patients and colleagues.

- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
Philosophy Level One Ethics or Theology		3
Math & Natural Science Requirements		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
Diversity		3
Total Hours		19-20

Major Requirements

Code	Title	Hours
RCP 110 & 110L	Respiratory Care Proc I and Respiratory Care Lab I	6
RCP 130	Respiratory Care Theory I	2
RCP 140 & 140L	Respiratory Care Proc II and Respiratory Care Lab II	3
RCP 160	Respiratory Care Theory II	2
RCP 201	Entry Level Review	2
RCP 230	Respiratory Care Theory III	2
RCP 210 & 210L	Respiratory Care Proc III and Respiratory Care Lab III	5
RCP 240C	RC Clinical Level I	2
RCP 260L & RCP 260C	Respiratory Care Lab IV and Resp Care Lab IV Clinical	3
RCP 271	RC Theory & Applic IV	3
RCP 280	Adv Level Resp Care Review	2
RCP 290	RC Clinical Level II	4
RCP 251	RC Proc & Diagnostics IV	3
Total Hours		39

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 175	A&P for Nursing & Allied Health	4
BIO 175L	A&P Nursing & Allied Health Lab	0
ENG 101	Craft of Language	3
PHL 104	Ethics in Health Care	3
MAT 112	College Algebra	3

HSC 390	Medical Terminology	1
Hours		14
Spring		
RCP 110	Respiratory Care Proc I	3
RCP 110L	Respiratory Care Lab I	3
RCP 130	Respiratory Care Theory I	2
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing & Allied Hlth II Lab	0
INT 103	Methods of Patient Care	1
CHM 101	Chemistry for Allied Health	3
CHM 101L	Chemistry Allied Health Lab	0
Hours		16
Summer		
RCP 140	Respiratory Care Proc II	2
RCP 140L	Respiratory Care Lab II	1
RCP 160	Respiratory Care Theory II	2
Hours		5
Second Year		
Fall		
RCP 201	Entry Level Review	2
RCP 210	Respiratory Care Proc III	3
RCP 210L	Respiratory Care Lab III	2
RCP 230	Respiratory Care Theory III	2
PSY 100	Introductory Psychology	3
RCP 240C	RC Clinical Level I	2
Hours		14
Spring		
RCP 251	RC Proc & Diagnostics IV	3
RCP 260L	Respiratory Care Lab IV	3
RCP 260C	Resp Care Lab IV Clinical	0
RCP 271	RC Theory & Applic IV	3
PHL 490	Ethical & Legal Dimen Hlth Sci	1
SOC 101 or SOC 270	Intro to Sociology or Special Topics	3
Hours		13
Summer		
RCP 280	Adv Level Resp Care Review	2
RCP 290	RC Clinical Level II	4
Hours		6
Total Hours		68

Surgical Technology

Surgical Technology is a health science discipline in which the practitioner is specifically educated to be a member of the surgical team. The surgical technologist works under the supervision of a surgeon to ensure the operating room environment is safe, all equipment functions properly, and the operative procedure is conducted under conditions that maximize patient safety.

A surgical technologist possesses expertise in the theory and application of sterile and aseptic technique. As a respected and highly skilled member of the surgical team, this individual utilizes knowledge of human anatomy and physiology, microbiology, pharmacology, surgical procedures and instrumentation to facilitate surgically performed invasive and diagnostic procedures. Students of the Surgical Technology program are required to take the national Certified Surgical Technology examination provided by the National Board for Surgical Technology and Surgical Assisting prior to graduation.

Program Description

The Surgical Technology program provides the student with classroom theory and supervised clinical and laboratory experience. Classroom instruction includes medical ethics, terminology, communication skills, anatomy, pathophysiology, microbiology and pharmacology. During the two-year program, students gain knowledge related to the principles of client care, asepsis and surgical procedures. In addition, the clinical practice component allows the student to build the skills and understanding necessary to become an integral member of the surgical team. Upon completion of the program, the Surgical Technology graduate is ready to assume entry-level responsibilities in a variety of surgical settings.

Class size is limited in order to provide the learner with individualized attention in a wide variety of surgical specialties. The student participates in surgical procedures that may include obstetrics and gynecological surgery, genitourinary surgery, general surgery, plastic and reconstructive surgery, otorhinolaryngologic surgery, ophthalmic surgery, oral and maxillofacial surgery, orthopedic surgery, neurosurgery, peripheral vascular surgery, cardiothoracic surgery, and endoscopic surgery in the acute care setting.

Students in the Surgical Technology program earn an Associate in Applied Science degree. Prospective students who already hold an Associate or Baccalaureate degree and meet the program entry requirements may opt to complete the Academic Certificate program.

Mission

The mission of the Surgical Technology program is to provide quality didactic and clinical education in the cognitive, affective and psychomotor domains to a diverse student population and to provide well-educated, competent, entry-level Surgical Technologists to the community.

Learning Goals and Objectives

Goal 1: Function as a competent entry-level surgical technologist in the cognitive (knowledge), psychomotor (skills) and affective (behavior) learning domains.

Goal 2: Apply principles of liberal arts and sciences to the care of the perioperative client.

Goal 3: Prepare the intraoperative environment with attention to quality and cost effectiveness.

Goal 4: Respect the ethical, legal, moral and cultural issues that impact the care of the perioperative client.

Goal 5: Formulate a plan for personal and professional growth.

Goal 6: Demonstrate a commitment to lifelong knowledge and skill enhancement.

Goal 7: Utilize effective communication skills and interactions with patients, members of the surgical team and other health care practitioners.

Goal 8: Function as an integral member of the surgical team by performing perioperative technical skills in a safe, efficient and cost-effective manner.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the Surgical Technology program, students must complete all SUR prefix courses with a grade of C (74%) or higher.

Students must attempt the NBSTSA certification exam prior to graduation.

If a student earns less than the required grade in a program specific course, they are dismissed from the program, regardless of GPA. Students receive one attempt at a program specific course. An 'attempt' is defined as earning a grade in a course or withdrawing from the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

All candidates for the Surgical Technology program must possess the physical and mental skills and abilities to successfully complete the program. The program requires students to possess minimal physical, mental, emotional, motor, and cognitive abilities. These technical standards are required for admission, promotion, and graduation.

Although these technical standards identify the required physical and mental abilities of all candidates, the technical standards are not intended to deter any prospective student for whom reasonable accommodation will allow the prospective student to access the curriculum.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Understand muffled communications without visualization of the communicator's mouth/lips within 20 feet. Observe activation/warning signals on equipment and devices.
- Sufficient peripheral vision to anticipate and function while in a sterile surgical environment.
- Detect odors sufficient to maintain environmental safety and patient needs.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Ability to alert others of emergency situations.

Motor Function

Use gross and fine motor function, manual dexterity, and physical strength to:

- Bend and stoop
- Stand and/or sit for long periods of time in one location
- Assist lifting and moving patients who may be unconscious
- Load a fine (10-0) suture onto needle holder
- Manipulate instruments, supplies and equipment
- Maneuver in small areas
- Refrain from nourishment or restroom breaks for periods of 6 hours or more.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall. Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Demonstrate emotional stability to function effectively under stress and adapt to changing environments.
- Develop a mature, sensitive and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
	Philosophy Level One Ethics or Theology	3
Math & Natural Science Requirements		
	Mathematics	3-4

Natural Science	4
Social Science Requirement	3
Diversity	3
Total Hours	19-20

Major Requirements

Code	Title	Hours
SUR 100	Perioperative Services	2
SUR 102	Perioperative Pharmacology	2
SUR 103	Surgical Armamentarium	2
SUR 110	Intraoperative Patient Care	4
SUR 115L	Perioperative Svcs Lab	3
SUR 230	Surgical Proc & Patho I	4
SUR 215L & SUR 215C	Periop Serv I Lab and Periop Serv I Clinical	4
SUR 212	Professionalism	1
SUR 225C	Periop Serv II Clinical	6
SUR 240	Surgical Proc & Patho II	4
SUR 299	Certification Exam Review	1
Total Hours		33

Certificate Requirements

Students already holding an associate or baccalaureate degree, or who will have met the baccalaureate degree requirements from their primary educational program upon completion of the certificate program, may apply for the 18-month academic certificate program on a space available basis.

Code	Title	Hours
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health II Lab	4
PHL 490	Ethical & Legal Dimen Hlth Sci	1
BIO 185 & 185L	Microbio Nursing & Allied Health and Microbio Nursing & Allied Lab	4
SUR 100	Perioperative Services	2
SUR 102	Perioperative Pharmacology	2
SUR 103	Surgical Armamentarium	2
SUR 115L	Perioperative Svcs Lab	3
SUR 110	Intraoperative Patient Care	4
SUR 215L & SUR 215C	Periop Serv I Lab and Periop Serv I Clinical	4
SUR 230	Surgical Proc & Patho I	4
SUR 212	Professionalism	1
SUR 225C	Periop Serv II Clinical	6
SUR 240	Surgical Proc & Patho II	4
SUR 299	Certification Exam Review	1
Total Hours		48

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Associate Degree Only		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
ENG 101	Craft of Language	3
Sociology Elective		3
INT 103	Methods of Patient Care	1
MAT 109	Quantitative Reasoning & Skill	3
HSC 390	Medical Terminology	1
Hours		15
Spring		
Associate Degree Only		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health II Lab	4
SUR 100	Perioperative Services	2
SUR 102	Perioperative Pharmacology	2
SUR 103	Surgical Armamentarium	2
SUR 115L	Perioperative Svcs Lab	3
Elective		3
Hours		16
Second Year		
Fall		
Associate Degree and Certificate Program		
BIO 185 & 185L	Microbio Nursing & Allied Health and Microbio Nursing & Allied Lab	4
SUR 110	Intraoperative Patient Care	4
SUR 230	Surgical Proc & Patho I	4
SUR 212	Professionalism	1
SUR 215L & SUR 215C	Periop Serv I Lab and Periop Serv I Clinical	4
Hours		17
Spring		
Associate Degree and Certificate Program		
PSY 100	Introductory Psychology	3
PHL 104	Ethics in Health Care	3
SUR 240	Surgical Proc & Patho II	4
SUR 299	Certification Exam Review	1
SUR 225C	Periop Serv II Clinical	6
Hours		17
Total Hours		65

Vascular Sonography

Program Description

Saint Joseph's University offers a two-year curriculum of full-time study in vascular sonography (VAS) leading to an Associate in Applied Science degree. The program also offers an academic certificate program in vascular sonography for those who already have a degree. Students receive theoretical and clinical instruction in all aspects of vascular ultrasound in preparation for entry-level positions as vascular sonographers. Upon satisfactory completion of program requirements, graduates are eligible to take the American Registry for Diagnostic Medical Sonography (ARDMS) examinations in physics and vascular technology. Students are also eligible to sit for the Cardiovascular Credentialing International (CCI) in vascular.

The field of vascular sonography utilizes high frequency sound waves to image and evaluate arteries and veins of the body. The faculty of

the VAS program believe in the potential for the individual to grow in knowledge as well as in professional importance. The profession of vascular sonography is recognized as an integral part of the diagnostic medical team.

Program Mission

The mission of the Vascular Sonography program is to meet the needs of the health care community by providing qualified, competent entry level vascular sonographers.

Learning Goals and Objectives

Goal 1: To provide all students with didactic and clinical education, including hands-on, practical scanning experience.

Goal 2: To prepare competent entry-level sonographers in the cognitive (knowledge), psychomotor (skills), and affective (behavior) learning domains for the Vascular Sonography concentration.

Goal 3: Obtain, review, and integrate pertinent patient history and supporting clinical information to facilitate optimum diagnostic results.

Goal 4: Function as an integral part of the diagnostic medical imaging team, providing patient services efficiently and in a professional and ethical manner.

Goal 5: Incorporate concepts learned through classroom instruction and clinical practice, ensuring accurate, meaningful sonographic evaluation

Goal 6: Demonstrate appropriate communication skills with patients and colleagues.

Goal 7: Provide patient education related to medical ultrasound and/or other diagnostic vascular techniques.

Academic Progression

A student must maintain a cumulative GPA of 2.5. It is recommended that students get a C or better, according to the University grading scale, in all non-program specific courses.

A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.

A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the program specific courses. Any student with an earned cumulative GPA lower than 2.5 will be provided with Academic Advising relative to other majors/options.

To meet requirements for successful completion of the VAS program, students must complete all VAS prefix courses with a grade of C (74%) or higher. Additionally, the following courses must be completed with a grade of C (74%) or higher: CAS 206, DMS 111, DMS 221 and DMS 227.

If a student earns less than the required grade, they are dismissed from the program, regardless of GPA. Students receive one attempt at a course. An 'attempt' is defined as earning a grade in a course or late-dropping the course.

Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the program or University will follow the re-enrollment policies (<https://www.sju.edu/lancaster/offices/advising/forms/>) of the University. This process requires the student to reapply for program admission. Acceptance will be based on factors such as clinical space available and the student's statement relative to changes in

their current situation that will support their success. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.

Non-Curricular Requirements

Applicants and students for the Sonography program are expected to possess the skills and abilities identified in the Technical Standards below in order to successfully complete the program. The Technical Standards include physical, mental, emotional, motor, and cognitive skills and abilities. These standards identify the requirements for admission, progression, and graduation. Students are expected to adhere to these standards throughout the program.

The Technical Standards apply to the University's classrooms and laboratories. The Sonography program has arrangements with independent third-party clinical sites. Students will be subject to the clinical sites' policies, procedures and technical requirements while completing clinical experiential programs.

Applicants or students with disabilities are strongly advised to contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>). It is the student's responsibility to follow the University's registration and accommodation request process. Please contact the Office of Student Disability Services (<https://www.sju.edu/offices/student-life/sds/>) (610)-660-1774 or sds@sju.edu. For clinical experiential programs, students with disabilities will be required to submit accommodation requests to the clinical site.

Observation

- Observe materials presented in the learning environment including audiovisual presentations, experiments, and written documents.
- Discriminate among black, gray, white, and various color combinations on display devices, film, and paper.
- Distinguish audible sounds and adequately view sonograms.
- Inspect and recognize minute details and small objects.
- Observe patients accurately and completely.

Communication

- Capacity to effectively converse and communicate with faculty members, fellow students, clinical staff, and patients in order to receive information, respond to nonverbal communication, and describe changes in mood, activity, and posture.
- Follow verbal or written instructions in order to correctly and independently perform procedures.
- Clearly instruct patients prior to and during procedures.
- Respond to emergency situations.

Motor Function

Use gross and fine motor function, manual dexterity, and physical strength to:

- Apply general care and emergency treatment to patients;
- Help lift patients who may be unable to move themselves in wheelchairs or beds to the examination table and vice versa;
- Lift and move objects (50 pounds or more routinely); and
- Manipulate ultrasound equipment, computers, and peripherals.
- Capacity to perform diagnostic maneuvers as required to meet curricular goals.

Cognitive

- Apply knowledge and reasoning to solve problems as required by the curriculum.
- Comprehend multi-dimensional relationships and the spatial relationships of anatomic structures.
- Efficiently process verbal information, either in written or spoken form.
- Attend and process information simultaneously and categorize this information effectively for recall.
- Sustain concentration to a task over an extended period of time.

Behavioral and Social

- Possess the emotional health to apply intellectual skill, exercise good judgment, and to complete all responsibilities attendant to the diagnosis and care of patients.
- Develop a mature, sensitive, and effective relationship with patients and colleagues.
- Behave in an ethical manner consistent with professional values and standards.
- Exhibit sufficient interpersonal skills, knowledge, and attitude to interact positively and sensitively with others.

Physical Requirements

Sonography students are required to be able to perform the following standards of performance: Additional Core Performance Standards in Sonography:

1. Stand, sit, walk, push, pull, squat, bend and climb stairs.
2. Lift and/or carry up to 50 pounds short distances.
3. Reach in forward, lateral, and overhead motions.
4. Distinguish distance, colors, objects, persons.
5. Communicate effectively, both verbally and in writing, using appropriate grammar, spelling, and vocabulary.
6. Process and communicate information on the patient's status with accuracy in a timely manner
7. Think clearly and act calmly in stressful situations.
8. Perform up to a 12-hour clinical experience in a single 24-hour period.
9. Think critically, with sound judgment, emotional stability, maturity, empathy, and physical and mental stamina.
10. Able to retain a long list of procedural steps, medication detail and medical information.

Associate Requirements Cornerstone Core Curriculum Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
Philosophy Level One Ethics or Theology		3
Math & Natural Science Requirements		
Mathematics		3-4

Natural Science	4
Social Science Requirement	3
Diversity	3
Total Hours	19-20

Major Requirements

Code	Title	Hours
BIO 175	A&P for Nursing & Allied Health	4
BIO 175L	A&P Nursing & Allied Health Lab	0
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing & Allied Health II Lab	0
DMS 111	Intro to Sonography	1
VAS 112	Vasc Sonography Procedures I	3
VAS 237L	Vascular Lab I	1
DMS 221	Ultrasound Physics	3
CAS 206	Ultrasound Cardiac Anat & Phys	3
DMS 227	Common Vascular Procedures	1
VAS 227	Vascular Sonography Proc II	3
VAS 238L	Vascular Lab II	2
VAS 230	Vascular Sonography Adv Topics	3
VAS 231	Vascular Sonography Review	3
VAS 239	Vascular Seminar	1
VAS 224C	Vascular Clinical I	3
VAS 233C	Vascular Clinical II	3
VAS 234C	Vascular Clinical III	8
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
Total Hours		48

Certificate Requirements

Students already holding an associate or baccalaureate degree, or who will have met the baccalaureate requirements from their primary educational program upon completion of the certificate program, may apply for the 13-month academic certificate program on a space available basis.

Code	Title	Hours
DMS 111	Intro to Sonography	1
VAS 112	Vasc Sonography Procedures I	3
DMS 221	Ultrasound Physics	3
VAS 237L	Vascular Lab I	1
CAS 206	Ultrasound Cardiac Anat & Phys	3
DMS 227	Common Vascular Procedures	1
VAS 227	Vascular Sonography Proc II	3
VAS 230	Vascular Sonography Adv Topics	3
VAS 238L	Vascular Lab II	2
VAS 224C	Vascular Clinical I	3
VAS 233C	Vascular Clinical II	3
VAS 234C	Vascular Clinical III	8
VAS 239	Vascular Seminar	1
VAS 231	Vascular Sonography Review	3
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1

PHL 104	Ethics in Health Care	3
Total Hours		43

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
Associate Degree Only		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
ENG 101	Craft of Language	3
PSY 100	Introductory Psychology	3
MAT 112	College Algebra	3
Hours		13
Spring		
Associate Degree Only		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health II Lab	4
HSC 390	Medical Terminology	1
INT 103	Methods of Patient Care	1
PHY 200 & 200L	Survey of Physics and Survey of Physics Laboratory	4
SOC 101 or SOC 270	Intro to Sociology or Special Topics	3
PHL 104	Ethics in Health Care	3
Hours		16
Summer		
Associate Degree and Certificate Program		
DMS 111	Intro to Sonography	1
Hours		1
Second Year		
Fall		
Associate Degree and Certificate Program		
CAS 206	Ultrasound Cardiac Anat & Phys	3
DMS 221	Ultrasound Physics	3
DMS 227	Common Vascular Procedures	1
VAS 237L	Vascular Lab I	1
VAS 112	Vasc Sonography Procedures I	3
Hours		11
Spring		
Associate Degree and Certificate Program		
VAS 238L	Vascular Lab II	2
VAS 230	Vascular Sonography Adv Topics	3
VAS 227	Vascular Sonography Proc II	3
Hours		8
Summer		
Associate Degree and Certificate Program		
VAS 224C	Vascular Clinical I	3
VAS 233C	Vascular Clinical II	3
Hours		6
Third Year		
Fall		
VAS 239	Vascular Seminar	1
VAS 234C	Vascular Clinical III	8
VAS 231	Vascular Sonography Review	3
Hours		12
Total Hours		67

Nursing

Saint Joseph's University's Department of Nursing is led by faculty members who maintain a clinical practice in the specialty areas they teach. Our department is proud to offer an Associate Degree in Nursing, Nursing BSN, Nursing RN to BSN and MSN Nurse Practitioner program.

Mission

The mission of the Department of Nursing is to prepare nurses at the associate, baccalaureate and graduate levels who are competent, caring, and socially responsive to current and future health care needs of individuals, groups, and communities. This mission is accomplished through nursing, education, scholarship, and service.

Philosophy

Nursing students learn the art and science of the profession through the acquisition of theoretical knowledge, socialization into the profession, and clinical and life experiences. The nursing curricula integrate knowledge from the liberal education and other health care disciplines. Learning activities are designed to cultivate critical and creative thinking, problem-solving, and clinical decision making. Students utilize technologies and acquire information literacy skills to inform health related decisions and improve health care outcomes.

Faculty

Faculty in the Department of Nursing bring extensive experience in healthcare from previous and current roles as nurse practitioners. They are dedicated to helping students learn and grow into competent health professionals.

Department of Nursing Faculty (<https://www.sju.edu/departments/nursing/faculty/>)

Programs

Associate Degree in Nursing (p. 376)

Bachelor of Science in Nursing (p. 379)

Master of Science in Nursing (p. 384)

Post Masters Certificates (p. 388)

Nursing ASN

An Associate of Science in Nursing (ASN) is an undergraduate degree program that encompasses general education courses, nursing theory and clinical practice. Classes cover subjects such as anatomy, physiology and pharmacology. This concept-based associate program gives you flexible options for class and clinical scheduling over five semesters and sets you on a course for a rewarding career as a competent and compassionate professional nurse. The curriculum is presented conceptually and allows students to develop their nursing knowledge, critical thinking skills and clinical judgment through a combination of classroom and clinical experiences. Additionally, concept-based learning leads to higher levels of critical thinking and reasoning skills necessary for competent clinical judgment in the care of clients throughout the lifespan and in a variety of settings in today's dynamic and complex health care system.

The ASN program is accredited by the Accreditation Commission for Education in Nursing (ACEN). Graduates of the program receive an

Associate of Science in Nursing degree and are eligible to take the National Council Licensure Examination (NCLEX – RN).

Learning Goals and Objectives

Goal 1: Integrate theoretical and experiential knowledge from the general education curriculum into nursing practice.

Goal 2: Utilize clinical judgment and clinical reasoning as a basis for safe and competent nursing practice.

Goal 3: Provide holistic care which promotes health with respect for dignity, diversity, and the inherent rights of clients.

Goal 4: Practice within the legal and ethical framework of nursing.

Goal 5: Demonstrate inter and intra professional communication and collaboration to improve client outcomes.

Goal 6: Integrate principles of quality and safety in nursing practice.

Goal 7: Assume accountability for intellectual growth, professional development, and competent practice.

Clinical Attendance

1. Clinical attendance is mandatory. Students must be punctual and prepared for all clinical experiences regardless of type (client care, simulation, observational experience, seminar, virtual, etc.). Time missed for dismissal from any clinical experience is considered clinical absence.
2. Clinical experiences are a vital component of the learning experience, and students are expected to attend all clinical hours as scheduled. Faculty recognize that extenuating circumstances occur; thus, any student exceeding two absences per course may be dismissed from the course delaying progression. All students are required to make-up missed clinical hours, incomplete clinical hours will result in course failure, with a grade of (F) submitted for the course.
3. All clinical absence time and unplanned SNAH closure on clinical days will be made up as allocated by the course faculty. Make-up days will be designated on a monthly basis. Students missing a clinical prior to the designated day are expected to make it up on the designated day unless otherwise directed by the course coordinator. Weekend students will be assigned a weekend make-up as designated on the clinical schedule. For NUR 115 and NUR 265, students will be required to complete clinical make-up as allocated and scheduled per syllabus. No changes will be made to scheduled clinical make-up days.
4. A grade of incomplete would be earned if an absence is incurred within the last two weeks of the semester with the make-up scheduled at the discretion of the program.
5. The first clinical make-up day will not incur a fee. Additional make-up days will incur a fee of \$200 per absence per course, which will be billed to the student's account.
6. Students are responsible for reporting a clinical absence at least 30 minutes before each day of their assigned clinical time or as otherwise directed by the course faculty.
7. Students are responsible for reporting clinical tardiness as soon as possible or as otherwise directed by the course faculty.

8. Students not properly reporting a clinical absence or tardiness will receive a warning from the course faculty. A second offense may result in failure of the course.
9. Students are granted one excused late arrival for up to 30 minutes. This late arrival will not count toward the course hour limit and the student will be permitted to complete the clinical day. Subsequent tardiness shall result in the student being dismissed from the clinical setting and clinical absence time will be accrued for that clinical day.

Academic Progression & Grading Standards

Academic Progression Policy

The Nursing curriculum is designed to move the student from a fundamental understanding of basic concepts to complex critical thinking and application in clinical settings. Academic progression is designed to support educational success, licensure and transition to practice.

This policy delineates the academic standards required of students admitted to the pre-licensure undergraduate nursing program.

Definitions

A course attempt in one pre-licensure nursing program applies to all pre-licensure programs.

A leave of absence does not negate previously attempted nursing courses.

An attempt is defined as earning a grade in a course or late-dropping the course.

Progression Requirements

1. A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the required Nursing courses beginning with NUR 115. Students are expected to maintain a 2.5 minimum cumulative GPA while in the nursing program. Students with less than a GPA of 2.50 will be placed on Academic Probation. Students who are on Academic Probation for 2 consecutive semesters will be dismissed from the program.
2. Successful completion of required Nursing courses is defined as a 77% or better according to the School of Nursing and Allied Health Grading Scale. Required Nursing (NUR) Courses are:
 - NUR 115 Introductory Concepts of Health & Illness
 - NUR 265 Health Assessment
 - NUR 135 Foundational Concepts of Health & Illness
 - NUR 280 Concepts of Pathophysiology
 - NUR 210 Concepts of Health & Illness V
 - NUR 220 Concepts of Health & Illness VI
 - NUR 230 Concepts of Health & Illness VII
 - NUR 240 Concepts of Health & Illness VIII
 - NUR 250 Concepts of Health & Illness IX
 - NUR 290 Transitions to Practice
3. A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.
4. A student who attempts (see definition above) any required Nursing courses (NUR) in the nursing program or earns less than a 77% in the same required Nursing course for a second time will be dismissed

from the Nursing major. Academic advising relative to other majors/options will be provided.

5. A student may attempt a maximum of two required nursing courses (NUR) in the program. Students exceeding this requirement will be dismissed from the Nursing major. Academic advising relative to other majors/options will be provided.
6. Students who successfully complete NUR 010 LPN Assessment Module:
 - Are exempt from taking NUR 115 and NUR 265.
 - Must have worked a minimum of 1,000 hours as an LPN in the two years prior to beginning the 010 LPN Assessment Module.
 - May not have more than one semester of non-clinical time prior to enrolling in NUR 135. Failure to begin coursework within this time frame will require the student to begin the program with NUR 115.
 - May not repeat the NUR 010 Assessment Module.
 - May repeat a maximum of two courses if starting with NUR 135 after successfully completing the NUR 010 LPN Assessment Module. Students exceeding this criterion will be dismissed from the program.
7. Students who wish to return to the University after a leave of absence or re-enroll after withdrawing from the University will follow the re-enrollment policies of the University. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities.
8. Any exceptions to the two-attempt limit must be approved by the Dean of the School of Nursing and Allied Health.
9. If a student is enrolled in more than 1 NUR course in a semester and is unable to remain in one of the NUR courses due to circumstances (such as withdrawal) a student may remain in the other co-requisite NUR courses (if appropriate) if the semester is beyond the 4th week. Otherwise, students must be removed from all NUR courses.
10. Once a student begins to take an NUR clinical course, the maximum time students may be out of NUR clinical courses is "12 consecutive months from the time the student exited the program". Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities. If a student exceeds the 12 consecutive month limit, the student must restart the program's clinical courses from beginning and will adhere to the current policies and plan in place for the program of study
11. Students dismissed from the ASN program may not transfer into the 3 year BSN or 4 year BSN program.
12. Successful completion of Assessment Technologies Incorporated (ATI) assessments and learning modules is required for academic progression. Refer to the School of Nursing and Allied Health Undergraduate Nursing Student Handbook for detailed information.
13. The following courses may be taken to supplement the ASN curriculum, if the Cornerstone Core Curriculum (CCC) requirements are completed: Theology/Philosophy, Statistics, Narrative Medicine, General Elective and Humanities Elective. These courses are part of the RN to BSN program requirements.

Grading Standards

Purpose: To explain the grading standards.

1. Grades on quizzes, exams (tests) and other forms of evaluation are carried out to two decimal places and not rounded.

2. Rounding occurs at the end of the semester only with final course grades. Final course grades ending with 0.5 or greater are rounded upward unless the final course grade is less than required, in which case no rounding occurs.

Example:

79.47 = 79%. It does not round up.

79.74 = 80%.

76.99 = 76.99%. It does not round up.

3. In any course, all course outcomes and/or additional course requirements must be met, or a course grade of “F” will be assigned regardless of points earned.

Example:

If a student earns a passing course grade but does not meet course or clinical outcomes, a grade of “F” will be awarded

4. A course grade of “C+” (77%) or higher is required in all NUR courses.

5. A grade of “C” (74%) or higher is required for all other courses.

Minimum Examination Grade Policy

Students must achieve a weighted examination average grade of 77% in all nursing (NUR) clinical courses to successfully complete the course. If a weighted examination average of 77% is achieved, the other course points such as extra credit, quizzes, assignments, and ATI will be added into the final grade calculation and this grade will be entered as the student’s overall average. If a student does not earn the weighted examination average of 77%, the weighted examination average will be entered as the student’s overall course grade. A minimum grade of 77% is required to pass this course.

Curricular Requirements
Cornerstone Core Curriculum
Requirements

Consist of five core and one overlay requirements. See below for additional detailed information for each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
Philosophy Requirements		
Philosophy Level One Ethics or Theology		3
Math & Natural Science Requirements		
Mathematics		3-4
Natural Science		4
Social Science Requirement		3
Diversity		3
Total Hours		19-20

Recommended CCC Courses

Code	Title	Hours
Diversity		
SOC 101	Intro to Sociology	

Philosophy

PHL 104	Ethics in Health Care
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Social Science

PSY 101	Intro Psychology Seminar
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Major Requirements

Code	Title	Hours
BIO 175 & 175L	A&P for Nursing &Allied Health and A&P Nursing& Allied Health Lab	4
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing&Allied Hlth II Lab	4
NUR 115	Intro Concepts Health &Illness	4
NUR 115C	Intro Cncpts Hlth &Illnss Clncl	0
NUR 265	Health Assessment	3
MAT 115	Clinical Mathematics (will count for CCC: Mathematics)	3
BIO 185 & 185L	Microbio Nursing&Allied Health and Microbio Nursing & Allied Lab (will count for CCC: Natural Science)	4
NUR 280	Concepts of Pathophysiology	3
NUR 135	Found Concepts Health& Illness	6
NUR 135C	Fnd Cncpts Hlth& Illnss Clncl	0
NUR 210	Concepts of Health & Illness V	4
NUR 210C	Cncpts Health & Illness V Clncl	0
NUR 220	Concepts of Hlth & Illness VI	4
NUR 220C	Cncpts Hlth & Illness VI Clncl	0
NUR 230	Concepts of Hlth & Illness VII	5
NUR 230C	Cncpts Hlth & Illnss VII Clncl	0
NUR 240	Concept of Hlth & Illness VIII	5
NUR 240C	Cncpt Hlth & Illnss VIII Clncl	0
NUR 250	Concepts of Hlth & Illness IX	3
NUR 250C	Cncpts Hlth & Illnss IX Clncl	0
NUR 290	Transitions to Practice	3
Optional Electives Final Semester		0-3
PHL, THE, MAT 128, Narrative Medicine, general elective, or humanities elective		
Total Hours		55-58

Typical Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 175 & 175L	A&P for Nursing &Allied Health and A&P Nursing& Allied Health Lab	4
ENG 101	Craft of Language	3
PHL 104	Ethics in Health Care (or Theology)	3
Hours		10
Spring		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing&Allied Hlth II Lab	4
NUR 115 & 115C	Intro Concepts Health &Illness and Intro Cncpts Hlth &Illnss Clncl	4
NUR 265	Health Assessment	3
PSY 100	Introductory Psychology	3
Hours		14

Second Year		
Fall		
BIO 185 & 185L	Microbio Nursing&Allied Health and Microbio Nursing & Allied Lab	4
NUR 280	Concepts of Pathophysiology	3
NUR 135 & 135C	Found Concepts Health& Illness and Fnd Cncpts Hlth& Illnss Clncl	6
MAT 115	Clinical Mathematics	3
Hours		16
Spring		
SOC 101	Intro to Sociology	3
NUR 210	Concepts of Health & Illness V	4
NUR 220	Concepts of Hlth & Illness VI	4
NUR 230	Concepts of Hlth & Illness VII	5
Hours		16
Third Year		
Fall		
NUR 240	Concept of Hlth & Illness VIII	5
NUR 250	Concepts of Hlth & Illness IX	3
NUR 290	Transitions to Practice	3
Optional Electives Final Semester ^{PHL, THE, MAT 128, Narrative Medicine, general elective, or humanities elective}		0-3
Hours		11-14
Total Hours		67-70

Nursing BSN

Pre-licensure BSN

The three- and four-year pre-licensure concentrations are paths to a BSN degree for highly motivated students. These concentrations are designed using a concept-based approach. Through the use of concepts and exemplars, students become active learners who engage in both classroom and clinical learning activities. Concept-based learning prepares graduates to gain a deep understanding of health care concepts and application of evidence-based practice, and the aptitude to transfer knowledge, skills and abilities to other concepts and contexts. Additionally, concept-based learning leads to higher levels of critical thinking and reasoning skills necessary for competent clinical judgment in the care of clients throughout the lifespan and in a variety of settings in today's dynamic and complex health care system.

The BSN program is accredited by the Commission on Collegiate Nursing Education (CCNE).

RN to BSN

The RN to BSN concentration provides students an opportunity to synthesize liberal education and nursing education which contributes to advanced critical thinking and professional autonomy in the delivery of holistic, competent nursing care. Students strengthen their ability to communicate and build on their existing knowledge of nursing practice preparing them for both interdisciplinary collaboration and leadership roles. Students are introduced to the importance of incorporating evidence-based findings as well as managing information to ensure quality outcomes and patient safety. Students are challenged to consider diverse theories and perspectives to provide culturally competent care to a variety of populations. The program endeavors to create an enduring appreciation of learning in the RN to BSN student.

The BSN program is accredited by the Commission on Collegiate Nursing Education (CCNE).

Learning Goals and Objectives

At the completion of the program, the graduate will:

- Integrate theoretical and empirical knowledge from the sciences and humanities curriculum into the practice of nursing.
- Provide holistic and competent care that promotes health and disease prevention to diverse individuals and populations.
- Utilize evidence to enhance quality and safety in nursing practice.
- Demonstrate inter- and intra-professional communication and collaboration to improve client outcomes.
- Utilize information management and technology in the provision of client care.
- Model civic engagement and fiscal responsibility in the delivery of health care.
- Demonstrate ethical values, leadership and professionalism in the practice of nursing.
- Assume accountability for intellectual growth, professional development and competent practice.

Clinical Attendance

1. Clinical attendance is mandatory. Students must be punctual and prepared for all clinical experiences regardless of type (client care, simulation, observational experience, seminar, virtual, etc.). Time missed for dismissal from any clinical experience is considered clinical absence.
2. Clinical experiences are a vital component of the learning experience, and students are expected to attend all clinical hours as scheduled. Faculty recognize that extenuating circumstances occur; thus, any student exceeding two absences per course may be dismissed from the course delaying progression. All students are required to make-up missed clinical hours, incomplete clinical hours will result in course failure, with a grade of (F) submitted for the course.
3. All clinical absence time and unplanned SNAH closure on clinical days will be made up as allocated by the course faculty. Make-up days will be designated on a monthly basis. Students missing a clinical prior to the designated day are expected to make it up on the designated day unless otherwise directed by the course coordinator. Weekend students will be assigned a weekend make-up as designated on the clinical schedule. For NUR 170 and NUR 265, students will be required to complete clinical make-up as allocated and scheduled per syllabus. No changes will be made to scheduled clinical make-up days
4. A grade of incomplete would be earned if an absence is incurred within the last two weeks of the semester with the make-up scheduled at the discretion of the program.
5. The first clinical make-up day will not incur a fee. Additional make-up days will incur a fee of \$200 per absence per course, which will be billed to the student's account.
6. Students are responsible for reporting a clinical absence at least 30 minutes before each day of their assigned clinical time or as otherwise directed by the course faculty.
7. A satisfactory level of mental and physical health is important to support learning and assure student and patient safety. It is the student's responsibility to notify the Course Coordinator of any significant changes in health status that might impact their ability

to fully participate in class or clinical, etc. Any student unable to participate for medical reasons will need to submit a letter from their provider documenting the student's fitness to return to class and/or clinical.

8. Students are responsible for reporting clinical tardiness as soon as possible or as otherwise directed by the course faculty.
9. Students not properly reporting a clinical absence or tardiness will receive a warning from the course faculty. A second offense may result in failure of the course.
10. Students are granted one excused late arrival for up to 30 minutes. This late arrival will not count toward the course hour limit and the student will be permitted to complete the clinical day. Subsequent tardiness shall result in the student being dismissed from the clinical setting and clinical absence time will be accrued for that clinical day.

Academic Progression & Grading Standards

Pre-licensure BSN Progression Policy

This policy delineates the academic standards required of students admitted to the pre-licensure undergraduate nursing program.

The nursing curriculum is designed to move the student from a fundamental understanding of basic concepts to complex critical thinking and application in clinical settings. Academic progression is designed to support educational success, licensure and transition to practice.

A course attempt in one pre-licensure nursing program applies to all pre-licensure programs. A leave of absence does not negate previously attempted nursing courses. An attempt is defined as earning a grade in a course or withdrawing from the course.

Progression Requirements:

1. A student must have a minimum earned cumulative GPA of 2.5 or higher to enter into the required Nursing courses beginning with NUR 160. Students are expected to maintain a 2.5 minimum cumulative GPA while in the nursing program. Students earning less than a GPA of 2.50 in their first semester will receive a warning. Students earning less than a GPA of 2.5 after their first semester will be placed on Academic Probation. Students who are on Academic Probation for 2 consecutive semesters will be dismissed from the program.
2. Successful completion of required nursing (NUR) courses and INT 450: Capstone is defined as a 77% or better according to the School of Nursing and Allied Health Grading Scale. Refer to the Undergraduate Nursing Grading Policy. A student can view the required nursing (NUR) courses in the academic catalog.
3. A grade of 77% or higher for the Capstone Paper is required to successfully complete INT 450.
4. A student who attempts (see definition above) any required nursing (NUR) courses and Capstone in the nursing program or earns less than a 77% in the same required nursing (NUR) course and Capstone for a second time will be dismissed from the nursing major. Academic advising relative to other majors/options will be provided.

5. A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.
6. A student may have no more than two unsuccessful attempts across all of the required nursing (NUR) courses and Capstone in the program. Students exceeding this requirement will be dismissed from the nursing major. Academic advising relative to other majors/options will be provided.
7. Any exceptions to the two-attempt limit must be approved by the Dean of the School of Nursing and Allied Health.
8. If a student is enrolled in co-requisite NUR courses in a semester and withdraws from one co-requisite, a student may remain in the other co-requisite NUR courses if the date of the withdrawal is after the fourth week of the semester and with the discretion of the program director. Otherwise, students must be removed from all NUR courses.
9. Once a student begins NUR clinical courses, the maximum time a student may be out of NUR clinical courses is 12 consecutive months from the time the student exited the program. Prior to a student re-entering the program of study, faculty reserve the right to assign placement in the curriculum and to require remedial activities. If a student exceeds the 12 consecutive month limit, the student must restart the program's clinical courses from the beginning and will adhere to the current policies and plan in place for the program of study.
10. Students dismissed from the 3 year or 4 year BSN program may not transfer into the ASN, 3 year BSN, or 4 year BSN program.

RN to BSN Progression Policy

The nursing curriculum is designed to move the student from a fundamental understanding of basic concepts to complex critical thinking and incorporation of evidence-based findings to practice settings. Academic progression is designed to support educational success, the development of leadership qualities, and the delivery of holistic, safe, and competent nursing care.

This policy delineates the academic standards required of students admitted to the RN-to-BSN nursing program.

A leave of absence does not negate previously attempted nursing courses. An attempt is defined as earning a grade in a course or late-dropping the course.

Progression Requirements:

1. All students must have an active RN license on file in order to be enrolled in any RN-to-BSN required nursing (NUR) courses and INT 450: Capstone with the exception of general education requirements. A student can view the required nursing courses in the academic catalog.
2. Students must secure employment or volunteer in a health care setting for eight (8) hours weekly by the beginning of the second semester of enrollment in order to continue in the RN-to-BSN core courses. Students must maintain employment or volunteering in a health care setting for eight (8) hours weekly throughout the program.
3. A student must have a minimum earned cumulative grade point average (GPA) of 2.5 or higher to enter into the required nursing courses. Students are expected to maintain a 2.5 minimum cumulative GPA while in the nursing program. Students earning

less than a GPA of 2.50 in their first semester will receive a warning. Students earning less than a GPA of 2.5 after their first semester will be placed on Academic Probation. Students who are on Academic Probation for 2 consecutive semesters will be dismissed from the program. A student can view the required nursing (NUR) courses in the academic catalog.

4. A student must earn a C or better in any Mathematics or Natural Science courses that are required for the major.
5. Successful completion of required nursing (NUR) courses and INT 450: Capstone is defined as 77% or better according to the Undergraduate Nursing Policy Grading Policy. A student can view the required nursing (NUR) courses in the academic catalog.
6. A student who attempts (see definition above) any required nursing (NUR) courses and Capstone in the nursing program or earns less than a 77% in the same required nursing (NUR) course and Capstone for a second time will be dismissed from the nursing major. Academic advising relative to other majors/options will be provided.
7. A student may have no more than two unsuccessful attempts across all of the required (NUR) nursing courses and Capstone in the program. Students exceeding this requirement will be dismissed from the Nursing major. Academic advising relative to other majors/options will be provided.
8. Students are expected to complete all required courses for program completion prior to registering for INT 450. INT 450 must be taken in the last semester of the program.
9. A grade of 77% or higher for the Capstone Paper is required to successfully complete INT 450.
10. Any student who steps out of the program must return within two years and will need to meet the curricular requirements at the time of program re-entry. Additionally, any person wanting to return after more than 2 years from the last course completion will need to be reviewed and approved for return by the Program Director.

Grading Standards

Explanation of Grading Standards

1. Grades on quizzes, exams (tests) and other forms of evaluation are carried out to two decimal places and not rounded.
2. Rounding occurs at the end of the semester only with final course grades. Final course grades ending with 0.5 or greater are rounded upward unless the final course grade is less than required, in which case no rounding occurs.

Example:

79.47 = 79%. It does not round up.

79.74 = 80%.

76.99 = 76.99%. It does not round up.

3. In any course, all course outcomes and/or additional course requirements must be met, or a course grade of "F" will be assigned regardless of points earned.

Example: If a student earns a passing course grade but does not meet course or clinical outcomes, a grade of "F" will be awarded

Students Enrolled in the Pre-licensure BSN Track

1. A course grade of "C+" (77%) or higher is required in all NUR, INT courses.
2. A grade of "C" (74%) or higher is required for all other courses.
3. INT 450: A student must achieve a grade of "C" (77%) or higher on the Capstone Paper to pass the course. If not achieved, the grade on the paper will be the grade of record.

Minimum Examination Grade Policy for Students Enrolled in the Pre-licensure BSN Track

Students must achieve a weighted examination average grade of 77% in all nursing (NUR) clinical courses to successfully complete the course. If a weighted examination average of 77% is achieved, the other course points such as extra credit, quizzes, assignments, and ATI will be added into the final grade calculation and this grade will be entered as the student's overall average. If a student does not earn the weighted examination average of 77%, the weighted examination average will be entered as the student's overall course grade. A minimum grade of 77% is required to pass this course.

Students Enrolled in the RN to BSN Track

1. A grade of "C+" (77%) or higher is required for all RN to BSN NUR, INT, Core Courses.
2. All course outcomes and/or additional course requirements must be met to successfully complete the course as outlined in the course syllabus.
3. INT 450: A student must achieve a grade of "C+" (77%) or higher on the Capstone Paper to pass the course. If not achieved, the grade on the paper will be the grade of record

Curricular Requirements

Pre-Licensure

Cornerstone Core Curriculum Requirements

Consist of 14 core and 2 overlay requirements. See below for additional detailed information on each of these requirements.

Code	Title	Hours
First Year Course Requirements		
ENG 101	Craft of Language	3
World History Course Area		3
Philosophy Requirements		
Either Level One or Level Two (but not both) -- must be Ethics designated. If approved, philosophy courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as Philosophy Level Two and as a Mission Overlay course.		
Philosophy Level One		3
Philosophy Level Two		3
Theology & Religious Studies Requirements		
If approved, Theology & Religious Studies courses may count for a student's Writing Intensive overlay. Students may not double-count the same course as CCC Theology and as a Mission Overlay course.		
Theology		3
Religious Studies		3
Diversity & INT 151 Requirements		

A student's Diversity course may not count for any other CCC course area requirement or as their Mission Overlay course. If approved, Diversity courses may count for a student's Writing Intensive Overlay requirement. INT 151 may not count for any other CCC requirements. This course must be taken in the first two years

Diversity	3
INT 151 Inequality in American Society	1

Math & Natural Science Requirements

If approved, Math & Natural Science Requirements may count toward overlay requirements.

Mathematics	3-4
Natural Science	4

Social Science Requirement

If approved, such Social Science Requirement may count toward a student's overlay requirements.

Non-Native Language Requirement

A single Non-Native Language course may not count as an overlay course but a second language course fulfills a student's Mission Overlay requirement.

Literature Requirement

If approved, Literature courses may count toward a student's overlay requirements.

Fine and Performing Arts, Creativity, and Design Requirement

If approved, Fine and Performing Arts, Creativity, and Design courses may count toward a student's overlay requirements.

Overlay Requirements

Writing-Intensive

If approved, Writing-Intensive courses may double count as major courses, minor courses, electives, or as any CCC course area requirement except for the first-year courses (World History and Rhetoric and Composition).

Mission-Overlay

Mission Overlay courses may double count as major courses, minor courses, elective courses, or any of the following CCC course areas: Fine and Performing Arts, Creativity, and Design, Literature, Mathematics, Natural Science, or Social Science.

Total Hours **47-49**

Recommended CCC Courses

Code	Title	Hours
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Fine & Performing Arts, Design, & Creativity

ENG 454	Narrative Medicine	
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Philosophy Level One

PHL 154	Moral Foundations	
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Philosophy Level Two

PHL 285	Philosophy of Medicine	
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Social Science

PSY 100	Introductory Psychology	
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Diversity

NUR 314	Nsg Care Syst Disadv Pop	
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Mission-Overlay

NUR 430	Nursing in a Global Society	
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Writing Intensive

ENG 454	Narrative Medicine	
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Major Requirements

Code	Title	Hours
BIO 175	A&P for Nursing & Allied Health	4
BIO 175L	A&P Nursing & Allied Health Lab	0
BIO 176	A&P Nursing & Allied Health II	4
BIO 176L	A&P Nursing & Allied Hlth II Lab	0
BIO 185	Microbio Nursing & Allied Health (will count for CCC: Natural Science)	4
BIO 185L	Microbio Nursing & Allied Lab (will count for CCC: Natural Science)	0
CHM 130	Foundations of Chemistry for Health Professionals	4
HSC 244	Health Information Technology	3
HSC 253	Nutrition: Health & Disease	3
MAT 115	Clinical Mathematics	3
MAT 128	Applied Statistics (will count for CCC: Mathematics)	3
NUR 160	Hist & Theory of Nursing Prac	3
NUR 170	Foundational Nursing I	3
NUR 265	Health Assessment	3
NUR 271	Foundations of Hlth & Illness	4
NUR 280	Concepts of Pathophysiology	3
NUR 260	Pharmacology	3
NUR 275	Health and Illness I	5
NUR 295	Health and Illness II	6
NUR 349	Nursing Internship	3
NUR 355	Health and Illness III	6
NUR 371	Health Policy Prof Nurse	3
NUR 402	EBP & Research in Nursing	4
NUR 405	Health and Illness IV	5
NUR 422	Prof Lead Dev & Trans Practice	3
INT 450	Capstone	3

Total Hours **85**

RN to BSN

RN to BSN Students will transfer approximately 67 credits from an associates degree curriculum. Please see the Block Transfer policy (p. 15) for more information.

Core Requirements: If one of these PHL/THE courses were completed as part of your ASN program @ SJU, they will apply to the core requirements; however, to meet program credit hours a student will need to take a 3 credit general elective.

67 transfer credits + 53 RN to BSN curriculum credits = 120 credits

Block Transfer

Code	Title	Hours
PHL Level 1 Core Requirement		3
THL Core Requirement		3
Mission-Overlay		3

Total Hours **9**

Major Requirements

Code	Title	Hours
ENG 454	Narrative Medicine	3
HSC 244	Health Information Technology	3
MAT 128	Applied Statistics	3
PHL 285	Philosophy of Medicine	3
NUR 300:499 Elective		3
Humanities Elective		3
NUR 301	Conceptual Found Nursing Prac	3
NUR 314	Nsg Care Syst Disadv Pop	3
NUR 340	Comprehensive Hlth Assessment	3
NUR 371	Health Policy Prof Nurse	3
NUR 402	EBP & Research in Nursing	4
NUR 420	Leadership & Management	3
NUR 425	Chronic Illnesses Patient Care Nsg	4
NUR 430	Nursing in a Global Society ((also counts for CCC Mission Overlay))	3
INT 450	Capstone	3
Total Hours		47

Typical Course Sequence

Four -Year Traditional BSN Course Sequence

Course	Title	Hours
First Year		
Fall		
BIO 175 & 175L	A&P for Nursing & Allied Health and A&P Nursing & Allied Health Lab	4
ENG 101	Craft of Language	3
MAT 115	Clinical Mathematics	3
Religious Studies or THL Core Requirement		3
PSY 100	Introductory Psychology (OR PHL Level 1 Core Requirement: Must be Ethics Certified)	3
Hours		16
Spring		
BIO 176 & 176L	A&P Nursing & Allied Health II and A&P Nursing & Allied Health II Lab	4
HIS 101 or HIS 102 or HIS 103	Globalization in World History or Movements in World History or Empires in World History	3
PHL Level 1 Core Requirement: Must be Ethics Certified or PSY 100		3
Literature Core Requirement		3
CHEM 130 with CHEM 130 L		4
Hours		17
Summer		
Optional Semester		
Hours		0
Second Year		
Fall		
BIO 185	Microbio Nursing & Allied Health	4
BIO 185L	Microbio Nursing & Allied Lab	0
INT 151	Inequality in American Society	1
NUR 160	Hist & Theory of Nursing Prac	3
NUR 170 & 170C	Foundational Nursing I and Foundational Nursing I Clinicl	3
NUR 265	Health Assessment	3
Hours		14

Spring		
MAT 128	Applied Statistics	3
HSC 253	Nutrition: Health & Disease	3
NUR 271 & 271C	Foundations of Hlth & Illness and Found of Hlth & Illness Clincl	4
NUR 280	Concepts of Pathophysiology	3
NUR 314	Nsg Care Syst Disadv Pop	3
Hours		16
Third Year		
Fall		
HSC 244	Health Information Technology	3
THL or Religious Studies Core Requirement		3
NUR 260	Pharmacology	3
NUR 275 & 275C or NUR 295	Health and Illness I or Health and Illness II	5
Hours		14
Spring		
ENG 454	Narrative Medicine	3
Non-native Language Core Requirement		3
PHL 285	Philosophy of Medicine	3
NUR 295 & 295C or NUR 275	Health and Illness II or Health and Illness I	6
Hours		15
Summer		
NUR 349	Nursing Internship	3
Hours		3
Fourth Year		
Fall		
NUR 355 & 355C or NUR 405	Health and Illness III or Health and Illness IV	5
NUR 371	Health Policy Prof Nurse	3
NUR 402	EBP & Research in Nursing	4
Hours		12
Spring		
NUR 405 & 405C or NUR 355	Health and Illness IV or Health and Illness III	6
NUR 422	Prof Lead Dev & Trans Practice ¹	3
NUR 430	Nursing in a Global Society	3
INT 450	Capstone ²	3
Hours		15
Total Hours		122

¹ Must be taken the last semester of the of the program

² Must be taken during last 7 weeks of the program

RN to BSN Course Sequence

Course	Title	Hours
First Year		
Fall		
ENG 454	Narrative Medicine (First Seven Weeks)	3
HSC 244	Health Information Technology (2nd 7 weeks)	3
PHL Level 1 Core Requirement	If PHL Level 1 taken as part of SJU ASN, take a general elective	3
Hours		9
Spring		
PHL 285	Philosophy of Medicine (First Seven Weeks)	3
NUR 301	Conceptual Found Nursing Prac (2nd 7 weeks)	3

THL Core Requirement	If THL taken as part of SJU ASN, take a general elective		3
Hours			9
Summer			
NUR 314	Nsg Care Syst Disadv Pop (1st 7 weeks)		3
NUR 340	Comprehensive Hlth Assessment (2nd 7 weeks)		3
Hours			6
Second Year			
Fall			
MAT 128	Applied Statistics		3
NUR 371	Health Policy Prof Nurse (1st 7 weeks)		3
NUR 425	Chrmc Illnss Paltv Care Nsg (2nd 7 weeks)		4
Hours			10
Spring			
NUR 402	EBP & Research in Nursing		4
NUR 430	Nursing in a Global Society (1st 7 weeks)		3
NUR 420	Leadership & Management (2nd 7 weeks)		3
Hours			10
Summer			
One of two electives (Humanities or NUR/INT upper level elective)			3
One of two electives (Humanities or NUR/INT upper level elective)			3
INT 450	Capstone (2nd 7 weeks:) Must be taken in the last semester after all required NUR courses are successfully completed		3
Hours			9
Total Hours			53

Nursing MSN

The Nurse Practitioner program prepares nurses to act as advanced practice leaders within the health care system capable of providing high quality, comprehensive care to individuals and families within their population of focus. Graduates use evidence-based practice recommendations to provide patient-centered care for health promotion, improved patient health outcomes, reduction of health disparities among diverse populations and improvement of patient safety.

At the successful completion of the Master of Science in Nursing - Nurse Practitioner program, students are eligible to take the American Nursing Credentialing Center (ANCC) [for Acute Care and FNP] or the American Association of Nurse Practitioners (AANP) [for FNP] board exams.

Learning Goals and Objectives

At the completion of the program, the graduate will:

- Integrate knowledge from nursing and other disciplines to plan patient-centered care that promotes health and improves health care outcomes.
- Apply leadership skills that foster ethical decision making, fiscal responsibility, and advocacy, interprofessional collaborative relationships and a systems perspective.
- Use technology to enhance communication and support quality of care and strategic decision-making processes in practice.
- Apply patient-centered and culturally appropriate concepts to improve quality and safety, reduce health disparities, and improve health outcomes for diverse populations.
- Model behaviors that demonstrate professionalism and community engagement of self and others, through clinical scholarship and application of evidence-based recommendations in practice.

- Use evidence-based knowledge and appropriate professional standards to analyze, evaluate and influence outcomes and health care policy for individuals, populations or systems.

Clinical Requirements

Please refer to the following link for the NP Student Clinical Requirements Policy:

Policy 1.3 NP Student Clinical Requirements (https://docs.google.com/document/d/1vVqONDpRVR_eOWJtM5cwGCF5W_UOqokZrRp6h6GiNwY/edit/?usp=sharing)

Clinical is a rewarding part of your educational journey that requires advanced planning. Clinical contracts must be in place prior to being approved for clinical and can take anywhere from 6 weeks to one year to secure. In general, you will need to apply for your clinical site by the midterm of the semester prior to the clinical.

There are currently a total of 720 hours of clinical in the Adult/ Gerontology Acute Care and Family/Individual Across the Lifespan concentrations. Each clinical course comprises 240 clinical hours.

Clinical Policy

Students entering the first clinical course in their program will need to have their initial requirements and returning students will need to have their annual or expiring requirements completed and confirmed in EXXAT by the following deadlines:

1. Fall semester deadline is July 1
2. Spring semester deadline is December 1
3. Summer semester deadline is April 1

Initial Requirements Clearances

All clearances, drug screen, entry physical exam with immunization documentation, must be obtained within one year of starting clinical courses. If obtained prior to that time or for any absence from the clinical setting exceeding 12 months, these requirements must be repeated. Applicants who have been convicted of offenses or listed as a perpetrator of a founded or indicated report of child abuse may not be eligible for clinical.

1. Students must submit:
 - Pennsylvania Access to Criminal History (PATCH)
 - Pennsylvania Child Abuse History Clearance
 - FBI Background Check (Fingerprinting required)
 - Out-of-state FBI Background Check (only required for students who have resided outside of Pennsylvania in the previous two (2) years)
 - A drug screen must be performed as outlined by the instructions from EXXAT.
2. Applicants who have been convicted of offenses or listed as a perpetrator of a founded or indicated report of child abuse may not be eligible for clinical, internship, service-learning placement, or credentialing exams. Additionally, if the student has had a status

change in any of the above clearances, they must report the updates to SJU.

3. All reports shall be retained confidentially and for a minimum of two (2) years after graduation or withdrawal from SJU. Access to documents is limited to appropriate school officials and clinical site administration on a need-to-know basis.

4. Life Support Certification

- a. Students must provide evidence of successful completion of the American Heart Association (AHA) Basic Life Support (BLS) for Healthcare Providers. This certification must remain current throughout subsequent clinical learning experiences.
- b. Adult-Gerontology Acute Care Nurse Practitioner Students must have an active American Heart Association (AHA) Advanced Cardiovascular Life Support (ACLS) certification to begin clinical courses. The certification must remain current throughout the duration of the NP program. Clinical agencies may require ACLS for Family Nurse Practitioner or Psychiatric Mental Health Nurse Practitioner students. It is the student's responsibility to meet the clinical agency's mandate.

5. Drug Screen

- a. A drug screen must be performed as outlined by the instructions from EXXAT. The drug screen sample must be submitted through the appropriate facility and resulted in EXXAT. All test results will remain confidential with access only by EXXAT, SJU's Health & Wellness Services staff, and the Dean of Student Affairs, if the result is positive. Students who refuse to receive a drug screen, or who falsify the test, will be treated in the same manner as those with positive drug screening results. Retesting must occur after any absence from the clinical setting which exceeds 12 months.
- b. All pre-licensure nursing students, including the two (2)-year/ three (3)-year ASN and the three (3)-year/four (4)-year BSN programs, participating in any clinical experience must complete a drug screening renewal every six (6) months. Compliance with this requirement is mandatory for attendance at clinical experiences.
- c. In the event of a positive result, the student will be contacted by EXXAT staff for additional information. Students with positive drug screen results will not be enrolled by SJU; these students may reapply.

- d. Hepatitis B Vaccine-Students must complete a series of three (3) vaccines and provide dates of vaccination or have an acceptable Hepatitis B Surface Antibody (HbsAB) lab test, to document immunity. If undergoing vaccination, a minimum of the first of the three (3) injections Pennsylvania College of Health Sciences must be completed prior to the start of school; the student must complete the series as scheduled and immediately upon series completion provide documentation of such to Health & Wellness Services.
- e. Initial Tuberculosis Skin Test - Unless contraindicated, all students must have initial two (2)-step tuberculosis skin testing. Testing must be completed by the student's health care provider. QuantiFERON Gold and T-Spot blood tests will be accepted. Space is provided on the Entry Physical Exam and Immunization Record for this to be documented. In the event of a positive result, the student will be contacted by EXXAT staff for additional information. Any student who has had tuberculosis or a positive TB Skin Test in the past must submit a chest X-ray completed within the past year.
- f. COVID 19 vaccines are required. Refer to EXXAT, SJU policies, and clinical site for details.

Ongoing Requirements for NP and PMC Students

NP and PMC students must also submit the following:

1. An unencumbered PA RN license and a CRNP for PMC NP Students
2. A current RN license for state of clinical site, if different from state of residence.
3. Active Basic Life Support (AHA) for Healthcare Providers.
4. For Adult Gerontology Acute Care NP students: Active ACLS
5. A yearly Tuberculosis Skin Test or chest X-Ray, all students must undergo annual tuberculosis skin testing by their health care provider. A one (1)-step test will be required after initial testing. QuantiFERON Gold and T-Spot blood tests will be accepted.
6. Influenza Vaccine Any additional immunization requirements determined by the SJU or the clinical agency.
7. All compliances must be maintained for the duration of the clinical courses.

III. Changes in Health Status

A satisfactory level of mental and physical health is important to support learning and assure student and patient safety. It is the student's responsibility to notify Health & Wellness Services, Track Coordinator, and the Program Director of any significant changes in health status that might impact his or her ability to fully participate in class, laboratory or clinical, etc.

The student should seek a consultation with their Track Coordinator, Program Director, Academic Advisor and/or Health & Wellness Services to determine the best pathway. The student may initiate a change in registration up to and including a Leave of Absence. Any student leaving for medical reasons will need to submit a letter clearing the student to return to clinical from their healthcare provider documenting the student's fitness to return to class and/or clinical.

Physical Exams and Immunizations

1. Students must have an Entry Physical Exam and Immunization Record performed by a physician, nurse practitioner or physician's assistant. In conjunction with the Entry Physical Exam and Immunization Record, the following are required:
 - a. Varicella -Documentation of two (2) varicella vaccination or a varicella antibody screening by lab test.
 - b. MMR - Documentation of two (2) MMR vaccinations or measles (rubeola), mumps and rubella antibody screening by lab test.
 - c. Tetanus/Diphtheria/Pertussis - Date of last Tetanus/Diphtheria/Pertussis (Tdap) must be within the last ten (10) years.

Dress Code

The NP Program does not have a dress code policy. Students are expected to dress according to the clinical agency dress code standards. While in clinical, students must wear their student or agency ID badge at eye level.

Process and Timelines Clinicals

This is a sample of the timeline and deliverables associated with the clinical process:

Process for Clinical Approvals

We provide you with the clinical support you need to complete the required clinical hours; however, the student must ensure that all deadlines are met as well as any compliance requirements.

The following is the overall process for securing clinical placements:

1. Complete Clinical Application from SJU
2. Faculty reviews Clinical Application and gives feedback to student on anticipated clinical placement
3. Students must also apply to agency where intended clinical is to be completed by the agency due date
4. Agency notifies either the student or faculty of approved placement
5. Faculty complete the Clinical Site and Preceptor Approval form and send to the student
6. Ensure you are compliant with the clinical site and compliances in EXXAT
7. See the NP Handbook for more details

Academic Progression

For the full policy, please refer to the following Policy for the Nurse Practitioner Programs: G (https://docs.google.com/document/d/108QIDiojZK0GB_kX0Bi2DBzQGdh1x22isgNuXb3S-fY/edit/?tab=t.0) Graduate Nursing Academic Progression Policy (https://docs.google.com/document/d/108QIDiojZK0GB_kX0Bi2DBzQGdh1x22isgNuXb3S-fY/edit/?usp=sharing). (https://docs.google.com/document/d/108QIDiojZK0GB_kX0Bi2DBzQGdh1x22isgNuXb3S-fY/edit/?tab=t.0)

Academic Warning

SJU utilizes an early alert system that allows faculty to proactively raise awareness when a student is in jeopardy of being unsuccessful in a course. When this happens, students, as well as support staff, receive an electronic notification outlining success resources available to the student.

Academic Probation

Failure to maintain a GPA of 3.0 on a 4.0-point scale or greater in any graduate program will result in academic probation. Students on academic probation may continue with their course progression. Probationary status for two consecutive semesters will result in dismissal from the program.

Progression Requirements

Prior to beginning a course, progression requirements (or minimum grade requirements) in prerequisite courses must be met. Additionally, students must meet program-specific minimum course requirements to progress within the program, as specified below

Failure to Meet Minimum Course Requirements

Students who have taken a course at SJU and earned a grade less than that which is required must repeat the course at SJU and achieve the required grade in order to earn course credit toward graduation. No course with a grade less than that which is required may be repeated more than once. The newly earned grade will become the grade of record for the purposes of transcripts, GPA computations and determination of academic progression. CLEP or course challenges are not acceptable replacements for repeating courses completed without a required passing grade.

Graduate Nursing Program Specific Academic Standards

Any student not earning the required grade in a program-specific course will be dismissed from the program. To resume enrollment in the program, students must reapply and be accepted. Refer below for program-specific academic standards requirements.

1. If a student earns a grade less than a grade of "B" (84%) in a course, the student may progress in the program if the attempted course is not a prerequisite for another course. The course in which the student was unsuccessful must be taken during its next available offering. Failure to complete the course successfully on the second attempt will result in dismissal from the program.
2. Throughout the entire program of study, a total of two (2) different courses may be repeated.
3. Clinical courses are assigned a letter grade, with the expectation that the minimum 84% (B) is achieved. A student who fails a clinical/practicum course may not progress to the next didactic course in their plan of study. The student will need to repeat the clinical course, when next offered.
4. Students may only remain out of clinical for one (1) year. If a student is out of the clinical/practicum courses for more than a year, it is under the discretion of the Nurse
5. Practitioner Program Director and Track Coordinator(s) as to whether re-entry into the program will be permitted. Students who have been out of clinical/practicum courses for greater than one (1) year must take both the didactic/theory course that correlates with the clinical/practicum portions of the course.
6. Students who fail clinical courses due to safety, behavior or ethical issues may be dismissed from the Nurse Practitioner Program.
7. Time Limit to Complete Degree: Students will have five (5) years to complete their MSN degree.

Please note: In addition to the above policy, students are responsible for all policies in the SJU Student Handbook.

Curricular Requirements

Students entering the Nurse Practitioner program choose one of the population-focused concentrations and complete all courses to meet eligibility requirements to become nationally certified and licensed as a Nurse Practitioner. The curriculum consists of MSN core courses, nurse practitioner core courses and courses specific to the chosen concentration. The curriculum is organized to continue the development of values, understanding, knowledge and skills needed in all aspects of practice as an NP and emphasizes specialty areas. It is also consistent with State Board content requirements, and all courses reflect each of those content elements.

The following indicates the number of credits and the number of clinical hours for each concentration:

- Adult-Gerontology Acute Care: 52 total credits, 720 total clinical hours
- Family-Individual Across the Lifespan: 53 total credits, 720 total clinical hours

Adult-Gerontology Acute Care Nurse Practitioner

Code	Title	Hours
NUR 500	NP Role Development	1
MGT 550	Leadership and Ethics	3
HAD 559	Health Policy	3
NUR 640	Advanced Pathophysiology	3
NUR 641	Advanced Pharmacology	3
NUR 511	Graduate Research	3
NUR 642	Adv Hlth Assess & Clin Reason	3
NUR 643	Hlth Promo in Integrated Care	3
NUR 700	Epidemiology & Population Hlth	3
NUR 740	Adult-Geron Acute Care NP I	4
NUR 741	Adult-Geron Acute Care NP Pra	3-4
NUR 742	Adult-Geron Acute Care NP II	4
NUR 743	Adult-Geron Acute Care Prac II	3-4
NUR 744	Adult-Geron Acute Care NP III	4
NUR 745	Adult Geron AC Prac III	3-4
Total Hours		46-49

Family Nurse Practitioner Across the Lifespan

Code	Title	Hours
NUR 500	NP Role Development	1
MGT 550	Leadership and Ethics	3
HAD 559	Health Policy	3
NUR 640	Advanced Pathophysiology	3
NUR 511	Graduate Research	3
NUR 641	Advanced Pharmacology	3
NUR 642	Adv Hlth Assess & Clin Reason	3
NUR 643	Hlth Promo in Integrated Care	3
NUR 700	Epidemiology & Population Hlth	3
NUR 720	Family NP Across Lifespan I	4
NUR 721	Family NP Practicum I	3-4
NUR 722	Family NP Across Lifespan II	4

NUR 723	Family NP Practicum II	3-4
NUR 724	Family NP Across Lifespan III	4
NUR 725	Family NP Practicum III	3-4
Total Hours		46-49

Typical Course Sequence Adult-Gerontology Acute Care Nurse Practitioner

Course	Title	Hours
First Year		
Fall		
MGT 550	Leadership and Ethics	3
NUR 643	Hlth Promo in Integrated Care	3
Hours		6
Spring		
NUR 700	Epidemiology & Population Hlth	3
Hours		3
Summer		
HAD 559	Health Policy	3
NUR 511	Graduate Research	3
Hours		6
Second Year		
Fall		
NUR 640	Advanced Pathophysiology	3
Hours		3
Spring		
NUR 500	NP Role Development	1
NUR 641	Advanced Pharmacology	3
Hours		4
Summer		
NUR 642	Adv Hlth Assess & Clin Reason	3
Hours		3
Third Year		
Fall		
NUR 740	Adult-Geron Acute Care NP I	4
NUR 741	Adult-Geron Acute Care NP Pra	3-4
Hours		7-8
Spring		
NUR 743	Adult-Geron Acute Care Prac II	4
NUR 744	Adult-Geron Acute Care NP III	4
Hours		8
Summer		
NUR 742	Adult-Geron Acute Care NP II	4
NUR 745	Adult Geron AC Prac III	3-4
Hours		7-8
Total Hours		47-49

Family Nurse Practitioner

Course	Title	Hours
First Year		
Fall		
MGT 550	Leadership and Ethics	3
NUR 643	Hlth Promo in Integrated Care	3
Hours		6
Spring		
NUR 700	Epidemiology & Population Hlth	3
Hours		3

Summer		
HAD 559	Health Policy	3
NUR 511	Graduate Research	3
Hours		6
Second Year		
Fall		
NUR 640	Advanced Pathophysiology	3
Hours		3
Spring		
NUR 500	NP Role Development	1
NUR 641	Advanced Pharmacology	3
Hours		4
Summer		
NUR 642	Adv Hlth Assess & Clin Reason	3
Hours		3
Third Year		
Fall		
NUR 720	Family NP Across Lifespan I	4
NUR 721	Family NP Practicum I	3-4
Hours		7-8
Spring		
NUR 722	Family NP Across Lifespan II	4
NUR 723	Family NP Practicum II	3-4
Hours		7-8
Summer		
NUR 724	Family NP Across Lifespan III	4
NUR 725	Family NP Practicum III	3-4
Hours		7-8
Total Hours		46-49

Nursing Post Masters Certificate

The Post-Master's Certificate options are designed for nurses who hold a Master of Science in Nursing (MSN) and seek to expand their expertise in specialized areas of patient care. These programs offer tailored pathways that lead to eligibility for board certification in the respective population foci.

There are two PMC Population Foci Certificate options:

1. Post-Master's Certificate in Adult-Gerontology Acute Care: This certificate program is designed for nurses holding an MSN who seek to enhance their clinical skills in the care of adult and geriatric patients with acute and complex health conditions. A gap analysis is conducted at the time of admission to develop an individualized plan of study based on previous coursework and clinical experiences, allowing for potential waivers of didactic and practicum requirements. The curriculum focuses on evidence-based practices, advanced assessment, diagnostic reasoning, and management strategies to prepare graduates for advanced practice as a nurse practitioner in acute care settings.

Graduates are eligible to sit for board certification in the adult-gerontology acute care population focus.

2. Post-Master's Certificate in Family and Individual Across the Lifespan:

This certificate program is designed for nurses holding an MSN who seek to enhance their clinical skills to provide comprehensive care to individuals and families throughout their lifespan. A gap analysis is conducted at the time of admission to develop an individualized plan of study based on previous coursework and clinical experiences, allowing for potential waivers of didactic and practicum requirements. The curriculum focuses on evidence-based practices, advanced assessment,

diagnostic reasoning, and management strategies to prepare graduates for advanced practice as a nurse practitioner in primary care settings. Graduates are eligible to sit for board certification in population focus of family across the lifespan.

Learning Goals and Objectives

At the completion of the program, the graduate will:

- Integrate knowledge from nursing and other disciplines to plan patient-centered care that promotes health and improves health care outcomes.
- Apply leadership skills that foster ethical decision making, fiscal responsibility, and advocacy, interprofessional collaborative relationships and a systems perspective.
- Use technology to enhance communication and support quality of care and strategic decision-making processes in practice.
- Apply patient-centered and culturally appropriate concepts to improve quality and safety, reduce health disparities, and improve health outcomes for diverse populations.
- Model behaviors that demonstrate professionalism and community engagement of self and others, through clinical scholarship and application of evidence-based recommendations in practice.
- Use evidence-based knowledge and appropriate professional standards to analyze, evaluate and influence outcomes and health care policy for individuals, populations or systems.

Clinical Requirements

Clinical is a rewarding part of your educational journey that requires advanced planning. Clinical contracts must be in place prior to being approved for clinical and can take anywhere from 6 weeks to one year to secure. In general, you will need to apply for your clinical site by the midterm of the semester prior to the clinical.

- **Non-Nurse Practitioners:** can expect to have a minimum total of 720 hours of clinical with each clinical course comprising 240 clinical hours.
- **Practicing Nurse Practitioners** can expect to have a minimum total of 540 clinical hours with each clinical comprising 180 clinical hours.

Clinical Policy

Students entering the first clinical course in their program will need to have their initial requirements and returning students will need to have their annual or expiring requirements completed and confirmed in EXXAT by the following deadlines:

1. Fall semester deadline is July 1
2. Spring semester deadline is December 1
3. Summer semester deadline is April 1

Initial Requirements Clearances

All clearances, drug screen, entry physical exam with immunization documentation, must be obtained within one year of starting clinical courses. If obtained prior to that time or for any absence from the clinical setting exceeding 12 months, these requirements must be repeated. Applicants who have been convicted of offenses or listed as a perpetrator

of a founded or indicated report of child abuse may not be eligible for clinical.

1. Students must submit:

- Pennsylvania Access to Criminal History (PATCH)
- Pennsylvania Child Abuse History Clearance
- FBI Background Check (Fingerprinting required)
- Out-of-state FBI Background Check (only required for students who have resided outside of Pennsylvania in the previous two (2) years)
- A drug screen must be performed as outlined by the instructions from EXXAT.

2. Applicants who have been convicted of offenses or listed as a perpetrator of a founded or indicated report of child abuse may not be eligible for clinical, internship, service-learning placement, or credentialing exams. Additionally, if the student has had a status change in any of the above clearances, they must report the updates to SJU.

3. All reports shall be retained confidentially and for a minimum of two (2) years after graduation or withdrawal from SJU. Access to documents is limited to appropriate school officials and clinical site administration on a need-to-know basis.

4. Life Support Certification

- a. Students must provide evidence of successful completion of the American Heart Association (AHA) Basic Life Support (BLS) for Healthcare Providers. This certification must remain current throughout subsequent clinical learning experiences.
- b. Adult-Gerontology Acute Care Nurse Practitioner Students must have an active American Heart Association (AHA) Advanced Cardiovascular Life Support (ACLS) certification to begin clinical courses. The certification must remain current throughout the duration of the NP program. Clinical agencies may require ACLS for Family Nurse Practitioner or Psychiatric Mental Health Nurse Practitioner students. It is the student's responsibility to meet the clinical agency's mandate.

5. Drug Screen

- a. A drug screen must be performed as outlined by the instructions from EXXAT. The drug screen sample must be submitted through the appropriate facility and resulted in EXXAT. All test results will remain confidential with access only by EXXAT, SJU's Health & Wellness Services staff, and the Dean of Student Affairs, if the result is positive. Students who refuse to receive a drug screen, or who falsify the test, will be treated in the same manner as those with positive drug screening results. Retesting must occur after any absence from the clinical setting which exceeds 12 months.
- b. All pre-licensure nursing students, including the two (2)-year/ three (3)-year ASN and the three (3)-year/four (4)-year BSN programs, participating in any clinical experience must complete a drug screening renewal every six (6) months. Compliance with this requirement is mandatory for attendance at clinical experiences.

c. In the event of a positive result, the student will be contacted by EXXAT staff for additional information. Students with positive drug screen results will not be enrolled by SJU; these students may reapply.

Physical Exams and Immunizations

1. Students must have an Entry Physical Exam and Immunization Record performed by a physician, nurse practitioner or physician's assistant. In conjunction with the Entry Physical Exam and Immunization Record, the following are required:
 - a. Varicella -Documentation of two (2) varicella vaccination or a varicella antibody screening by lab test.
 - b. MMR - Documentation of two (2) MMR vaccinations or measles (rubeola), mumps and rubella antibody screening by lab test.
 - c. Tetanus/Diphtheria/Pertussis - Date of last Tetanus/Diphtheria/ Pertussis (Tdap) must be within the last ten (10) years.
 - d. Hepatitis B Vaccine-Students must complete a series of three (3) vaccines and provide dates of vaccination or have an acceptable Hepatitis B Surface Antibody (HbsAB) lab test, to document immunity. If undergoing vaccination, a minimum of the first of the three (3) injections Pennsylvania College of Health Sciences must be completed prior to the start of school; the student must complete the series as scheduled and immediately upon series completion provide documentation of such to Health & Wellness Services.
 - e. Initial Tuberculosis Skin Test - Unless contraindicated, all students must have initial two (2)-step tuberculosis skin testing. Testing must be completed by the student's health care provider. QuantiFERON Gold and T-Spot blood tests will be accepted. Space is provided on the Entry Physical Exam and Immunization Record for this to be documented. In the event of a positive result, the student will be contacted by EXXAT staff for additional information. Any student who has had tuberculosis or a positive TB Skin Test in the past must submit a chest X-ray completed within the past year.
 - f. COVID 19 vaccines are required. Refer to EXXAT, SJU policies, and clinical site for details.

Ongoing Requirements for NP and PMC Students

NP and PMC students must also submit the following:

1. An unencumbered PA RN license and a CRNP for PMC NP Students
2. A current RN license for state of clinical site, if different from state of residence.
3. Active Basic Life Support (AHA) for Healthcare Providers.
4. For Adult Gerontology Acute Care NP students: Active ACLS
5. A yearly Tuberculosis Skin Test or chest X-Ray, all students must undergo annual tuberculosis skin testing by their health care provider. A one (1)-step test will be required after initial testing. QuantiFERON Gold and T-Spot blood tests will be accepted.
6. Influenza Vaccine Any additional immunization requirements determined by the SJU or the clinical agency.

7. All compliances must be maintained for the duration of the clinical courses.

III. Changes in Health Status

A satisfactory level of mental and physical health is important to support learning and assure student and patient safety. It is the student's responsibility to notify Health & Wellness Services, Track Coordinator, and the Program Director of any significant changes in health status that might impact his or her ability to fully participate in class, laboratory or clinical, etc.

The student should seek a consultation with their Track Coordinator, Program Director, Academic Advisor and/or Health & Wellness Services to determine the best pathway. The student may initiate a change in registration up to and including a Leave of Absence. Any student leaving for medical reasons will need to submit a letter clearing the student to return to clinical from their healthcare provider documenting the student's fitness to return to class and/or clinical.

Dress Code

The NP Program does not have a dress code policy. Students are expected to dress according to the clinical agency dress code standards. While in clinical, students must wear their student or agency ID badge at eye level.

Process and Timelines Clinicals

This is a sample of the timeline and deliverables associated with the clinical process:

Process for Clinical Approvals

We provide you with the clinical support you need to complete the required clinical hours; however, the student must ensure that all deadlines are met as well as any compliance requirements.

The following is the overall process for securing clinical placements:

1. Complete Clinical Application from SJU
2. Faculty reviews Clinical Application and gives feedback to student on anticipated clinical placement
3. Students must also apply to agency where intended clinical is to be completed by the agency due date
4. Agency notifies either the student or faculty of approved placement
5. Faculty complete the Clinical Site and Preceptor Approval form and send to the student
6. Ensure you are compliant with the clinical site and compliances in EXXAT
7. See the NP Handbook for more details

Academic Progression Academic Warning

SJU utilizes an early alert system that allows faculty to proactively raise awareness when a student is in jeopardy of being unsuccessful in a course. When this happens, students, as well as support staff, receive

an electronic notification outlining success resources available to the student.

Academic Probation

Failure to maintain a GPA of 3.0 on a 4.0-point scale or greater in any graduate program will result in academic probation. Students on academic probation may continue with their course progression. Probationary status for two consecutive semesters will result in dismissal from the program.

Progression Requirements

Prior to beginning a course, progression requirements (or minimum grade requirements) in prerequisite courses must be met. Additionally, students must meet program-specific minimum course requirements to progress within the program, as specified below.

Failure to Meet Minimum Course Requirements

Students who have taken a course at SJU and earned a grade less than that which is required must repeat the course at SJU and achieve the required grade in order to earn course credit toward graduation. No course with a grade less than that which is required may be repeated more than once. The newly earned grade will become the grade of record for the purposes of transcripts, GPA computations and determination of academic progression. CLEP or course challenges are not acceptable replacements for repeating courses completed without a required passing grade.

Post Masters Certificate Specific Academic Standards

Any student not earning the required grade in a program-specific course will be dismissed from the program. To resume enrollment in the program, students must reapply and be accepted. Refer below for program-specific academic standards requirements.

1. If a student earns a grade less than a grade of "B" (84%) in a course, the student may progress in the program if the attempted course is not a prerequisite for another course. The course in which the student was unsuccessful must be taken during its next available offering. Failure to complete the course successfully on the second attempt will result in dismissal from the program.
2. Throughout the entire program of study, a total of two (2) different courses may be repeated.
3. Clinical courses are assigned a letter grade, with the expectation that the minimum 84% (B) is achieved. A student who fails a clinical/practicum course may not progress to the next didactic course in their plan of study. The student will need to repeat the clinical course, when next offered.
4. Students may only remain out of clinical for one (1) year. If a student is out of the clinical/practicum courses for more than a year, it is under the discretion of the Nurse
5. Practitioner Program Director and Track Coordinator(s) as to whether re-entry into the program will be permitted. Students who have been out of clinical/practicum courses for greater than one (1) year must take both the didactic/theory course that correlates with the clinical/practicum portions of the course.

6. Students who fail clinical courses due to safety, behavior or ethical issues may be dismissed from the Nurse Practitioner Program.
7. Time Limit to Complete Degree: Students will have five (5) years to complete their MSN degree.

Please note: In addition to the above policy, students are responsible for all policies in the SJU Handbook.

Curricular Requirements Required Course Work

The following courses are typical for the Post Masters Certificate Program for those with an MSN degree. Select the program that matches your credentials.

**Actual coursework may vary pending a full gap analysis.*

Adult/Gerontology Acute Care for Current Nurse Practitioners

Code	Title	Hours
NUR 740	Adult-Geron Acute Care NP I	4
NUR 741	Adult-Geron Acute Care NP Pra	3-4
NUR 742	Adult-Geron Acute Care NP II	4
NUR 743	Adult-Geron Acute Care Prac II	3-4
NUR 744	Adult-Geron Acute Care NP III	4
NUR 745	Adult Geron AC Prac III	3-4
Total Hours		21-24

** Actual coursework may vary pending a full gap analysis.*

Adult/Gerontology Acute Care for Non Nurse Practitioners

Code	Title	Hours
NUR 500	NP Role Development	1
NUR 640	Advanced Pathophysiology	3
NUR 641	Advanced Pharmacology	3
NUR 642	Adv Hlth Assess & Clin Reason	3
NUR 740	Adult-Geron Acute Care NP I	4
NUR 741	Adult-Geron Acute Care NP Pra	3-4
NUR 742	Adult-Geron Acute Care NP II	4
NUR 743	Adult-Geron Acute Care Prac II	3-4
NUR 744	Adult-Geron Acute Care NP III	4
NUR 745	Adult Geron AC Prac III	3-4
Total Hours		31-34

** Actual coursework may vary pending a full gap analysis.*

Family/Individual Across the Lifespan For Current Nurse Practitioners

Code	Title	Hours
NUR 720	Family NP Across Lifespan I	4
NUR 721	Family NP Practicum I	3-4
NUR 722	Family NP Across Lifespan II	4
NUR 723	Family NP Practicum II	3-4
NUR 724	Family NP Across Lifespan III	4

NUR 725	Family NP Practicum III	3-4
Total Hours		21-24

** Actual coursework may vary pending a full gap analysis.*

Family/Individual Across the Lifespan For Non Nurse Practitioners

Code	Title	Hours
NUR 500	NP Role Development	1
NUR 640	Advanced Pathophysiology	3
NUR 641	Advanced Pharmacology	3
NUR 642	Adv Hlth Assess & Clin Reason	3
NUR 720	Family NP Across Lifespan I	4
NUR 721	Family NP Practicum I	3-4
NUR 722	Family NP Across Lifespan II	4
NUR 723	Family NP Practicum II	3-4
NUR 724	Family NP Across Lifespan III	4
NUR 725	Family NP Practicum III	3-4
Total Hours		31-34

** Actual coursework may vary pending a full gap analysis.*

Typical Course Sequence

Below are the typical course sequences for students who begin in the fall semester. Actual plans of study will vary pending gap analysis.

Adult/Gerontology Acute Care Post-Master's Certificate

Course	Title	Hours
Second Year		
Fall		
NUR 740	Adult-Geron Acute Care NP I	4
NUR 741	Adult-Geron Acute Care NP Pra	3-4
Hours		7-8
Spring		
NUR 742	Adult-Geron Acute Care NP II	4
NUR 743	Adult-Geron Acute Care Prac II	3-4
Hours		7-8
Summer		
NUR 745	Adult Geron AC Prac III	4
NUR 744	Adult-Geron Acute Care NP III	4
Hours		8
Total Hours		22-24

Family/Individual Across the Lifespan Post-Master's Certificate

Course	Title	Hours
Second Year		
Fall		
NUR 720	Family NP Across Lifespan I	4
NUR 721	Family NP Practicum I	3-4
Hours		7-8
Spring		
NUR 722	Family NP Across Lifespan II	4
NUR 723	Family NP Practicum II	3-4
Hours		7-8
Summer		
NUR 724	Family NP Across Lifespan III	4

NUR 725	Family NP Practicum III	3-4
	Hours	7-8
	Total Hours	21-24

INTERDISCIPLINARY PROGRAMS

Saint Joseph's University offers innovative interdisciplinary programs that blend diverse fields of study, fostering critical thinking and collaborative learning. These programs encourage students to explore the connections between disciplines such as humanities, social sciences, and natural sciences, equipping them with a holistic understanding of complex societal issues.

Undergraduate Minors

- Faith-Justice Studies (p. 393)
- Justice and Ethics in the Law (p. 393)

Faith-Justice Studies Minor

The Faith-Justice Studies minor is one of the distinguishing mission-driven academic programs at Saint Joseph's University. It empowers students to work across multiple disciplines by integrating learning from six courses to engage in analysis of social structures and systems of thought in light of Gospel values and other faith traditions. As part of the course of study, students explore the call that emerges from this analysis to stand in solidarity with the marginalized peoples of our world.

Students interested in pursuing the minor in Faith-Justice Studies are advised to contact the Faith-Justice Institute for further information.

Learning Goals and Outcomes

Goal 1: Consider existing social values, norms, and/or priorities in light of Gospel values and/or other faith-based traditions of social justice.

Outcome 1.1: Analyze institutions and social structures, and question prevailing systems of thought or action, that systematically contribute to problems such as poverty, racism, human rights violations, and violence.

Outcome 1.2: Engage with the sufferings of the poor and marginalized and explore the call, not only to serve, but also to stand in solidarity.

Requirements

Students seeking the minor are required to successfully complete six courses from the program's listings with no more than three courses from any single discipline. At least one of the six courses must be a Theology course that directly addresses Catholic Social Thought, chosen from among the following:

Code	Title	Hours
THE 155	Catholic Social Tradition	3
THE 261	Christianity & Media	3
THE 366	Christian Medical Ethics	3
THE 373	Economic Ethics	3

Students may use three credits of a senior capstone project to satisfy one of the course requirements provided they submit a proposal signed by a faculty mentor or departmental chair from their major within the first six weeks of the semester during which the three credits will be earned.

During the senior year, students will be asked to create and submit a brief portfolio of their work to illustrate their engagement with the program's learning objectives.

The courses listed below are a partial listing of courses which may apply towards the Faith-Justice Studies minor. Some multi-section courses may have specific sections that satisfy the Faith-Justice Studies minor requirements. Students are therefore advised to refer to course schedules and to meet with the Director of the Faith-Justice Studies program during the registration period to confirm the full array of Faith-Justice Studies courses offered in any given semester.

If a student wishes to seek Faith-Justice credit for a course that has not yet been approved as a Faith-Justice Studies course, the student may petition to have the course approved. Students may use this option only once, according to the following guidelines:

1. The student will obtain written permission from the instructor of the course and the Director of the Faith-Justice Studies program within the first six weeks of the course,
2. The student will submit a written plan indicating how the course will satisfy Faith-Justice Studies course criteria,
3. The student will submit a brief report at the end of the semester outlining how Faith-Justice Studies objectives have been met, along with supporting written materials (examinations, journals, projects, etc.).

Justice and Ethics in the Law Minor

The Justice and Ethics in the Law (JEL) minor emphasizes the ethical, business, social, and political structures that underlie the law. This interdisciplinary minor examines how justice is defined in legal regimes as well as the ethical issues raised by the enforcement of law, legal procedure, conflicting rights, and the making (and maintaining) of constitutions. All students will have the opportunity for an internship. JEL emphasizes skills that may be applied to academic and professional life: analytic and problem solving skills; critical reading ability of complex texts; writing skills including preparing and revising papers; oral communication and listening abilities; and research and time-management skills. Given the number of writing intensive, diversity, social science, and mission-driven classes approved for the minor, students may satisfy much of the Cornerstone Core Curriculum through the minor.

Internships must be related to justice, ethics, or law. Please contact the JEL Director to discuss the potential approval of your internships for JEL credit.

Learning Goals and Outcomes

Goal 1: Students will develop logical reasoning skills.

Objective 1.1: Demonstrate ability to analyze legal cases.

Goal 2: Students will demonstrate an understanding of the interrelationship between law, ethics and justice in a multi-disciplinary context.

Objective 2.1: Demonstrate basic knowledge of similarities and differences in the concept of justice in moral, historical, or legal contexts.

Objective 2.2: Identify and explain fundamental questions of ethics.

Objective 2.3: Describe how justice is defined in legal (as opposed to ethical) contexts.

Goal 3: Students will demonstrate an understanding of the relationship between law and social justice in a multi-disciplinary context.

Objective 3.1: Define conceptions of social justice.

Objective 3.2: Compare and contrast conceptions of social justice in moral, historical, or legal contexts.

Requirements

Total of six courses:

- Two core courses in Legal Reasoning (one from the College of Arts and Sciences and one from the Haub School of Business)
- Two Ethics courses (see approved list)
- Two Electives (see approved list)

Note: No more than three courses may be taken in the same department and no class may count twice as part of the minor.

Legal Reasoning Courses

Minors must take two Legal Reasoning courses (MGT 360, MGT 361, or MGT 362 and one course from the College of Arts and Sciences) that expose students to logical reasoning, reading cases, writing briefs, and/or research. Students may take additional Legal Reasoning courses and count them as electives.

Code	Title	Hours
College of Arts and Sciences		
ENV 471	Environmental Law	3
PHL 210	Logic and the Law	3
PHL 270	Special Topics in Philosophy ¹	3
POL 270	Special Topics ¹	3
POL 307	Reproduction and the Court	3
POL 310	Constitutional Politics	3
POL 311	Const Law: Rights & Civil Lib	3
POL 312	Social Controv & Supreme Court	3
POL 408	Capstone: The Armed Citizen?	3
SOC 270	Special Topics ¹	3
SOC 345	Law and Social Policy	3
SOC 360	Sociology of Law	3
Haub School of Business		
MGT 360	Legal Environment of Business	3
MGT 361	Introduction to Law Honors	3
MGT 362	Topics in Business Law	3

Ethics Courses

Minors must take at least two Ethics courses. Students may take additional Ethics courses and count them as electives.

Code	Title	Hours
ENG 405	Early Tudor Gender Power & Lit	3
ENV 102	Environmental Ethics	3
HAD 320	Healthcare Law and Ethics	3
HIS 204	Latin American-U.S. Migration	3
HIS 341	Genocide & Human Rights	3

HIS 363	American Medicine Since 1865	3
HIS 472	Seminar in European History ¹	3
HSC 251	Healthcare Law and Ethics	3
HSC 368	Just Hlth Care Dev Nations	3
or THE 368	Just Hlth Care in Dev Nations	
LIN 260	Language and the Law	3
MGT 210	Business Stakeholders & Ethics	3
MGT 310	Breaking News in Bus. Ethics	3
PHL 262	Freedom, Citizenship, Culture	3
PHL 270	Special Topics in Philosophy ¹	3
PHL 311	Philosophy of Law	3
PHL 320	Business, Society and Ethics	3
PHL 330	Social and Political Phil	3
PHL 331	Inequality: A Phil Exploration	3
PHL 334	Ethics and Criminal Justice	3
PHL 336	Violence and Non-Violence	3
PHL 338	Vio & Recnciliatn in N. Ireln	3
POL 367	Ethics in International Affairs	3
PSY 236	Ethics in Psychology	3
SOC 260	Language and the Law	3
THE 261	Christianity & Media	3
THE 366	Christian Medical Ethics	3
THE 373	Economic Ethics	3

Electives

Minors must take two Elective courses. Additional courses may be indicated on the schedule with the Justice and Ethics in the Law attribute.

Code	Title	Hours
ACC 422	Forensic Accounting	3
COM 451	Privacy/Surv in the Dig Era	3
COM 475	Crime, Justice, & Media	3
ECN 455	Antitrust and Regulation	3
ENG 377	Inside-Out	3
ENG 429	The Civil Rights Movement	3
ENG 433	Environmental Justice	3
ENG 444	Race, Class, and Gender	3
ENG 451	N. Ireland Conflict & Story	3
ENG 467	Communication and the Law	3
ENG 492	English Internship ²	3
HAD 304	Health Policy	3
HIS 319	Reform/Rev in Europe 1500-1650	3
HIS 327	Early Modern Europe 1400-1800	3
HIS 329	Crime & Punishment in Europe	3
HIS 348	Witches in Early Modern Europe	3
HIS 379	Black History Since Civil War	3
HIS 491	Philadelphia Area Internship ²	3
LIN 220	Logic	3
MGT 222	Influence, Negotiation & Conflict	3
MGT 363	International Business Law	3
MGT 364	Bus Law-Entrepreneurial Firms	3
MGT 365	Employment and Labor Law	3

MKT 352	Sports Law	3
PHL 220	Logic	3
PHL 240	Symbolic Logic	3
PHL 256	Freedom and Determinism	3
PHL 377	Inside-Out	3
POL 306	Political Participation in US	3
POL 313	Public Policy	3
POL 326	Protesting Inequality	3
POL 328	U.S. Immigration	3
POL 331	Latin American Politics	3
POL 402	Capstone: Contentious Pol inUS	3
POL 407	Capstone: Theories of Justice	3
POL 409	Capstone: Global Migration	3
POL 491	Philadelphia-Area Internship ²	3
SOC 206	Theories of Crime	3
SOC 207	Juvenile Justice	3
SOC 225	Intro to American CJ	3
SOC 264	Criminal Courts & Procedures	3
SOC 267	Introduction to Corrections	3
SOC 377	Inside-Out	3

¹ These courses only count towards the minor when they cover certain topics. Students should consult with the instructor and the Justice and Ethics in the Law Director to confirm.

² Students must have any internship certified by the Justice and Ethics in the Law Director in order to count for credit towards the minor. Sociology has internships offered through independent study that may accommodate law, justice, and ethics work.

PROGRAMS A-Z

A

- Accounting Major (p. 194)
- Actuarial Science Major (p. 214)
- Actuarial Science Minor (p. 216)
- Addictions Counseling Graduate Certificate (p. 274)
- Advertising And Promotions Minor (p. 258)
- Africana Studies Minor (p. 50)
- Agribusiness Graduate Certificate (p. 227)
- American Studies Minor (p. 50)
- Ancient Cultures Minor (p. 136)
- Animal Studies Minor (p. 51)
- Applied Behavior Analysis Graduate Certificate (p. 283)
- Applied Behavior Analysis MS (p. 283)
- Applied Investment Analysis Graduate Certificate (p. 217)
- Art Education MS (p. 296)
- Art History Major (p. 53)
- Art History Minor (p. 56)
- Art Major (p. 57)
- Art Minor (p. 59)
- Art Therapy Minor (p. 60)
- Artificial Intelligence for Business Major (p. 201)
- Artificial Intelligence for Business Minor (p. 203)
- Asian Studies Major (p. 65)
- Asian Studies Minor (p. 68)
- Autism Behavioral Studies Major (p. 283)
- Autism Spectrum Disorder Graduate Certificate (p. 285)
- Autism Studies Minor (p. 285)

B

- Biochemistry Major (p. 83)
- Biochemistry Minor (p. 85)
- Biochemistry MS (p. 85)
- Biological Studies Major (p. 69)
- Biology MA (p. 70)
- Biology Major (p. 71)
- Biology Minor (p. 74)
- Biology MS (p. 75)
- Biomedical Sciences Major (p. 76)
- Biotech and Life Sciences Management Graduate Certificate (p. 227)
- Business Administration Certificate of Proficiency (p. 197)
- Business Administration Major (p. 197)
- Business Intelligence & Analytics Major (p. 203)
- Business Intelligence & Analytics Minor (p. 205)
- Business Intelligence & Analytics MS (p. 206)
- Business Minor for Non-Business Majors (p. 199)

C

- Cardiac Sonography (p. 356)
- Cardiovascular Technology (p. 359)

- Catholic Education Leadership Graduate Certificate (p. 274)
- Chemical Biology Major (p. 86)
- Chemistry Major (p. 89)
- Chemistry Minor (p. 92)
- Chemistry MS (p. 92)
- Child and Family Studies Major (p. 297)
- Chinese Language and Culture Minor (p. 136)
- Classical Studies Minor (p. 136)
- Clinical Mental Health Counseling MS (p. 274)
- Commercial Photography Minor (p. 60)
- Communication Sciences & Disorders Major (p. 136)
- Communication Studies Major (p. 94)
- Communication Studies Minor (p. 96)
- Computer Science Major (p. 98)
- Computer Science Minor (p. 99)
- Computer Science MS (p. 100)
- Corporate Financial Management Graduate Certificate (p. 217)
- Creative and Professional Writing Graduate Certificate (p. 116)
- Creative Writing Minor (p. 116)
- Criminal Justice Major (p. 103)
- Criminal Justice Minor (p. 105)
- Criminal Justice MS (p. 105)
- Curriculum & Instruction MS (p. 299)

D

- Data Analytics Graduate Certificate (p. 207)
- Data Management Graduate Certificate (p. 207)
- Data Science Graduate Certificate (p. 207)
- Data Science Major (p. 107)
- Data Science Minor (p. 109)
- Deaf and Hard of Hearing Graduate Certificate (p. 286)
- Deaf and Hard of Hearing MS (p. 286)
- Diagnostic Medical Sonography (p. 361)
- Diversity, Equity and Inclusion in Educational Leadership Doctoral Certificate (p. 275)
- Diversity, Equity, and Inclusion Graduate Certificate (p. 243)
- Doctor of Business Administration (p. 199)
- Doctor of Occupational Therapy (p. 330)
- Doctor of Pharmacy/Master of Business Administration (https://academiccatalog.sju.edu/business/business-administration/pharmd_mba_dual_degree/)
- Doctor of Pharmacy/Master of Science or Health Informatics or Health Administration (p. 243)
- Doctor of Physical Therapy (p. 352)
- Drug Development & Industrial Pharmacy MS (p. 342)
- Drug Discovery & Cell Gene Therapy MS (p. 342)
- Drug Discovery & Development Graduate Certificate (p. 343)

E

- Economics Major (p. 110)
- Economics Minor (p. 112)
- Education PK-4 and Special Education Dual Major (p. 300)
- Education PK-4 and Special Education Dual Major (p. 288)

- Educational Leadership and Transformational Change MS (p. 276)
- Educational Studies Minor (p. 302)
- Elementary Education (PK-4) MS (p. 306)
- Elementary/Middle Grades (4-8) Education Major (p. 302)
- Elementary/Middle Grades (4-8) Education MS (p. 305)
- Engineering Physics Major (p. 171)
- English as Second Language Graduate Certificate (p. 309)
- English Major (p. 117)
- English Minor (p. 119)
- Entertainment Marketing Major (p. 261)
- Entertainment Marketing Minor (p. 263)
- Entrepreneurship Major (p. 245)
- Entrepreneurship Minor (p. 247)
- Environmental And Sustainability Studies Minor (p. 121)
- Environmental Science Major (p. 122)
- Environmental Science Minor (p. 124)
- Ethical Coaching in Sports Graduate Certificate (p. 248)
- Executive MBA (<https://academiccatalog.sju.edu/business/business-administration/executive-mba/>)
- Exercise Physiology Major (p. 313)
- Exercise Physiology Minor (p. 318)

F

- Faith-Justice Studies Minor (p. 393)
- Film and TV Minor (p. 156)
- Finance Major (p. 219)
- Finance Minor (p. 222)
- Finance MS (p. 222)
- Financial Application in Real Estate Graduate Certificate (p. 223)
- Food and Beverage Business Development Minor (<https://academiccatalog.sju.edu/business/food-pharma-health/food-bev-bus-dev-minor/>)
- Food Marketing Graduate Certificate (p. 229)
- Food Marketing Major (p. 229)
- Food Marketing MBA (p. 232)
- Food Marketing Minor For Non-Business Majors (p. 233)
- Food Marketing MS (p. 233)
- Francophone Studies Major (p. 138)
- French Major (p. 140)
- French Minor (p. 142)

G

- Gender Studies Minor (p. 125)
- Genomics Graduate Certificate (p. 78)
- Genomics MS (p. 78)
- Geographical Information Systems Undergraduate Certificate (p. 127)
- Global Food, Health and Wellness Minor (<https://academiccatalog.sju.edu/business/food-pharma-health/global-food-minor/>)
- Graphic Design Major (p. 61)
- Graphic Design Minor (p. 63)

H

- Health Administration Major (p. 234)
- Health Administration MHA (p. 236)
- Health Administration/Health Informatics MHA/MHI (p. 237)
- Health Care Ethics Minor (p. 127)
- Health Equity & Social Justice Minor (p. 186)
- Health Informatics Graduate Certificate (p. 238)
- Health Informatics MHI (p. 238)
- Health Informatics/ Business Intelligence MHI/MS (p. 210)
- Health Sciences Major (p. 318)
- Health Sciences Minor (p. 329)
- Healthcare Education EdD (p. 277)
- Healthcare Management Graduate Certificate (p. 239)
- History Major (p. 129)
- History Minor (p. 131)
- Human Resource Management Graduate Certificate (p. 248)
- Human Resource Management MS (p. 248)
- Human Resources and People Management Major (p. 249)
- Human Resources and People Management Minor (p. 251)

I

- Industrial and Organizational Psychology Minor (p. 181)
- Information Technology Major (p. 101)
- Information Technology Minor (p. 103)
- Intensive Structured Literacy w/ Wilson Graduate Certificate (p. 290)
- Interdisciplinary EdD for Educational Leaders (p. 278)
- International Business Major (p. 251)
- International Business Minor (p. 254)
- International Relations Major (p. 132)
- International Relations Minor (p. 134)
- Irish Studies Minor (p. 135)
- Italian Minor (p. 142)
- Italian Studies Major (p. 142)

J

- Journalism Minor (p. 120)
- Justice and Ethics in the Law Minor (p. 393)

L

- Latin American and Latinx Studies Minor (p. 151)
- Leadership Graduate Certificate (p. 254)
- Leadership, Ethics and Organizational Sustainability Major (p. 254)
- Leadership, Ethics and Organizational Sustainability Minor (p. 256)
- Linguistics Major (p. 144)
- Linguistics Minor (p. 147)

M

- Managing Neurodiversity at Work Minor (p. 152)
- Marketing Major (p. 264)
- Marketing Minor (p. 266)
- Marketing MS (p. 266)
- Master of Occupational Therapy (p. 331)

- Mathematics Major (p. 152)
- Mathematics Minor (p. 154)
- MBA Program (<https://academiccatalog.sju.edu/business/business-administration/mba/>)
- Medical Laboratory Science Major (p. 78)
- Medical Laboratory Science Undergraduate Certificate (p. 81)
- Medieval and Renaissance Studies Minor (p. 155)
- Museum Education Graduate Certificate (p. 279)
- Museum Education MA (p. 280)
- Museum Studies Minor (p. 63)
- Music Industry Minor (p. 156)
- Music Major (p. 157)
- Music Minor (p. 159)

N

- Neurodiversity in the Workplace Graduate Certificate (<https://academiccatalog.sju.edu/business/management/neurodiversity-workplace-cert/>)
- Neuroscience Major (p. 163)
- Neuroscience Minor (p. 166)
- Nuclear Medicine Technology (p. 364)
- Nursing ASN (p. 376)
- Nursing BSN (p. 379)
- Nursing MSN (p. 384)
- Nursing Post Masters Certificate (p. 388)

O

- Organization Development and Leadership MS (p. 257)
- Organizational Development and Change Graduate Certificate (p. 257)

P

- Pharmaceutical & Healthcare Business Major (p. 239)
- Pharmaceutical & Healthcare Business Minor (p. 241)
- Pharmaceutical & Healthcare Marketing MBA (p. 241)
- Pharmaceutical Chemistry Minor (p. 93)
- Pharmaceutical Sciences & Drug Development Major (p. 343)
- Pharmaceutical Sciences & Drug Development Minor (p. 345)
- Pharmaceutics MS (p. 346)
- Pharmaceutics PhD (p. 346)
- Pharmacology & Toxicology Major (p. 347)
- Pharmacology & Toxicology MS (p. 349)
- Pharmacology & Toxicology PhD (p. 350)
- Pharmacology Minor (p. 350)
- Philadelphia College of Pharmacy Dean's Office (p. 332)
- Philosophy Major (p. 168)
- Philosophy Minor (p. 170)
- Physician Assistant (p. 352)
- Physics Major (p. 174)
- Physics Minor (p. 177)
- PK-12 Education Major (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/prek-12-major/>)
- Political Science Major (p. 178)
- Political Science Minor (p. 180)

- Post-Baccalaureate Certificate in Accountancy (p. 196)
- Principal Leader Doctoral Certificate (p. 280)
- Professional Accountancy MS (p. 196)
- Psychology Major (p. 182)
- Psychology Minor (p. 185)

Q

- Quantitative Economics Major (p. 113)

R

- Radiography (p. 366)
- Reading Specialist Graduate Certificate (p. 310)
- Reading Specialist MS (p. 310)
- Real Estate Minor (p. 223)
- Religious Studies Major (p. 189)
- Respiratory Care (p. 368)
- Risk Management & Insurance Major (p. 224)
- Risk Management & Insurance Minor (p. 226)

S

- Sales Certificate (p. 267)
- School Counseling MS (p. 281)
- Secondary Education (7-12) Major (<https://academiccatalog.sju.edu/education-humandev/education/teacher-edu/seed-major/>)
- Secondary Education (7-12) MS (p. 311)
- Social Work MSW (p. 281)
- Social, Emotional, and Behavioral Wellness Graduate Certificate (p. 290)
- Sociology Major (p. 186)
- Sociology Minor (p. 188)
- Spanish Major (p. 148)
- Spanish Minor (p. 150)
- Special Education MS (p. 291)
- Special Education PK-12 MS (p. 293)
- Special Education PK-12 Post Master's Certificate (p. 295)
- Special Education Studies Minor (p. 295)
- Sports Marketing Major (p. 268)
- Sports Marketing Minor (p. 270)
- Superintendent Letter of Eligibility Doctoral Certificate (p. 282)
- Supervisor of Special Education Graduate Certificate (p. 295)
- Supply Chain Management Major (p. 211)
- Supply Chain Management Minor (p. 213)
- Surgical Technology (p. 370)

T

- Teaching English to Speakers of Other Languages Minor (p. 150)
- Theatre & Film Major (p. 159)
- Theatre Studies Minor (p. 163)
- Theology and Religious Studies Minor (p. 191)
- Theology Major (p. 191)
- Toxicology Minor (p. 350)

V

- Vascular Sonography (p. 373)

W

- World Languages PK12 Education MS (p. 309)
- Writing Studies MA (p. 120)

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A

- Accounting (ACC) (p. 401)
- Actuarial Science (ASC) (p. 404)
- Aerospace Studies (AER) (p. 405)
- American Sign Language (ASL) (p. 406)
- Applied Behavioral Analysis (ABA) (p. 407)
- Art (ART) (p. 411)
- Art History (ARH) (p. 417)
- Arts & Sciences (ANS) (p. 421)

B

- Biology (BIO) (p. 423)
- Business (BUS) (p. 436)

C

- Cancer Biology (CBI) (p. 438)
- Cardiac Sonography (CAS) (p. 438)
- Cardiovascular Technology (CVT) (p. 439)
- Chemical Biology (CMB) (p. 440)
- Chemistry (CHM) (p. 440)
- Child and Family Studies (CFS) (p. 446)
- Chinese (CHN) (p. 447)
- Classics (CLA) (p. 448)
- Clinical Mental Health Counseling (CNS) (p. 448)
- College Studies (CSS) (p. 451)
- Communications (COM) (p. 451)
- Computer Science (CSC) (p. 455)
- Criminal Justice (CRJ) (p. 465)

D

- Data Science (DSC) (p. 470)
- Decision & System Sciences (DSS) (p. 471)
- Diagnostic Medical Sonography (DMS) (p. 477)

E

- Economics (ECN) (p. 478)
- Education (EDU) (p. 482)
- Education Leadership (EDL) (p. 497)
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- English as Second Lang (ESL) (p. 523)
- Environmental Science (ENV) (p. 524)
- Exercise Physiology (EPH) (p. 525)

F

- Finance (FIN) (p. 528)
- Food Marketing (FMK) (p. 532)
- French (FRE) (p. 538)

G

- Gaelic (Irish) Studies (GAE) (p. 541)
- Genomics (GNM) (p. 542)
- Geographical Information Systems (GIS) (p. 543)
- German (GRM) (p. 544)
- Graphic Design (GDS) (p. 545)

H

- Health Administration (HAD) (p. 546)
- Health Care Ethics (HCE) (p. 548)
- Health Education (HED) (p. 548)
- Health Science (HSC) (p. 550)
- Health Services (HSV) (p. 554)
- History (HIS) (p. 554)
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I

- Interdisciplinary (INT) (p. 562)
- International Business (IBU) (p. 564)
- Italian (ITA) (p. 565)
- Italian Studies (IST) (p. 569)

J

- Japanese (JPN) (p. 570)

L

- Latin (LAT) (p. 570)
- Linguistics (LIN) (p. 571)
- Literature in Translation (LTT) (p. 575)

M

- Management (MGT) (p. 576)
- Marketing (MKT) (p. 586)
- Marketing Pharmaceutical Ex (MPE) (p. 592)
- Mathematics (MAT) (p. 592)
- Medical Health Informatics (MHI) (p. 597)
- Medical Lab Science (MLS) (p. 597)
- Modern and Classical Cultures (MCC) (p. 598)
- Music, Theatre & Film (MTF) (p. 599)

N

- Neuroscience (NSC) (p. 605)
- Nuclear Medicine Technology (NMT) (p. 606)
- Nursing (NUR) (p. 607)

O

- Occupational Therapy (OTH) (p. 613)

P

- Pharmaceutical Marketing (PMK) (p. 618)
- Pharmaceutical Sciences (PHS) (p. 621)
- Pharmacology (PHT) (p. 629)

- Pharmacy (PRX) (p. 633)
- Pharmacy Practice (PHP) (p. 637)
- Philosophy (PHL) (p. 639)
- Physical Therapy (DPT) (p. 651)
- Physician Assistant Studies (PHA) (p. 655)
- Physics (PHY) (p. 663)
- Political Science (POL) (p. 671)
- Psychology (PSY) (p. 679)

R

- Radiography (RAD) (p. 687)
- Real Estate Finance (REF) (p. 689)
- Religious Studies (REL) (p. 690)
- Respiratory Care (RCP) (p. 696)
- Risk Management & Insurance (RMI) (p. 697)

S

- Social Work (SWK) (p. 698)
- Sociology (SOC) (p. 701)
- Spanish (SPA) (p. 708)
- Special Education (SPE) (p. 715)
- Surgical Technology (SUR) (p. 723)

T

- Theology (also see REL crses) (THE) (p. 724)

V

- Vascular Sonography (VAS) (p. 727)

Accounting (ACC)

ACC 101 Concepts of Financial Acct (3 credits)

An introduction to the discipline of accounting from a user's perspective. Emphasis is on how accounting information and financial statements are used in business decisions, particularly in decisions by people outside the organization. Students will access corporate websites to retrieve and analyze externally published financial information of publicly traded companies.

Attributes: Undergraduate

ACC 102 Managerial Accounting (3 credits)

This course covers basic cost accounting terminology, concepts, and classifications. Cost accumulation systems, cost-profit-volume analysis, and uses of accounting information for managerial decision-making purposes are discussed. Students are introduced to the use of spreadsheet application software as an essential tool for analysis of financial data.

Prerequisites: ACC 101 and DSS 100 (may be taken concurrently)

Attributes: Undergraduate

ACC 205 Fin Acc Info Sys I (3 credits)

The conceptual basis and procedural framework of accounting is covered in this course. Topics include: revenue recognition, cost allocation, financial statement preparation/presentation, analysis of financial data, and using accounting information for liquidity and profitability assessments. Students are introduced to business technology integration through use of enterprise resource planning applications.

Prerequisites: ACC 102

Attributes: Undergraduate

ACC 206 Fin Acc Info Sys II (3 credits)

The second FAIS course coverage includes solvency and operational capacity; accounting for long-term assets and liabilities; disclosure reporting; financial analysis issues dealing with long-term debt, retirement benefits, and deferred income taxes. Spreadsheet software applications are used as tools for the analysis of assigned problems and projects.

Prerequisites: ACC 205

Attributes: Undergraduate

ACC 212 Management Acc Info Systems (3 credits)

Topics in this course include the design of cost systems, use of cost system outputs to facilitate operating decisions, and application of management accounting information in strategic planning and control. Spreadsheet software is used in modeling and for problem/project analysis.

Prerequisites: ACC 102

Attributes: Undergraduate

ACC 307 Fin Acc Info Sys III (3 credits)

The final FAIS course covers stockholders' equity, business combinations, consolidation accounting, line of business and segment reporting, foreign operations and global accounting/reporting issues, and governmental fund accounting. There is a significant use of enterprise resource planning systems and software application tools in the course.

Prerequisites: ACC 206

Attributes: Undergraduate

ACC 312 Management Accounting Analytic (3 credits)

Topics in this course include the design of cost systems, use of cost system outputs to facilitate operating decisions, and application of management accounting information in strategic planning and control. Spreadsheet software is used in modeling and for problem/project analysis.

Prerequisites: ACC 102

Attributes: Undergraduate

ACC 315 Federal Income Taxation (3 credits)

Focused on individual taxpayers, this course is a comprehensive introduction to the principles and procedures of income taxation at the federal level. Topics covered include filing status, exemptions, inclusions, exclusions, deductions, property transactions, capital gains and losses, nontaxable exchanges, and credits.

Prerequisites: ACC 101

Attributes: Undergraduate

ACC 317 Auditing & Assurance Services (3 credits)

This course integrates the most important concepts of auditing and other assurance services to assist students in understanding audit decision making and evidence accumulation. Major topics covered include audit reports, auditing standards, legal liability, ethical issues, evaluation of internal controls, and audit risk.

Prerequisites: ACC 206

Attributes: Undergraduate

ACC 370 Special Topics in Accounting (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ACC 407 Contemp Topics: Financial Acct (3 credits)

This course explores current issues in the field of financial accounting, covering advanced topics on recording, reporting, display, and disclosure. The impacts of IFRS implementation, changing valuation techniques, and other contemporary topics on professional practice are considered.

Prerequisites: ACC 307

Attributes: Undergraduate

ACC 410 Fin Statement Analysis&Valuata (3 credits)

This course provides a capstone approach to analyzing and understanding the 10-K reports of major organizations. The course builds upon the detailed studies of accounting topics covered in the required undergraduate accounting curriculum. Students are required to examine the results of these previous topics using the 10-K and interpret financial reporting from the perspective of users of the financial statements. Formal student presentations on their analysis of the statements of selected companies is required.

Prerequisites: ACC 307 and ACC 317

Attributes: Undergraduate

ACC 415 Special Topics in Fed Taxation (3 credits)

A comprehensive study of the federal income tax treatment of corporations, partnerships, and fiduciary entities. Taxation of gratuitous transfers is also covered. This examination of tax laws and procedures takes the form of studying illustrative examples and completion of problem-solving exercises.

Prerequisites: ACC 315

Attributes: Undergraduate

ACC 417 Audit Decision Analytics (3 credits)

This course examines emerging technological issues in the field of auditing and assurance services, covering subjects related directly to the attestation function in professional practice. Theoretical auditing concepts and prescribed audit procedures are applied to professional practice situations. The course is largely case-based, using a combination of text, supplemental reading materials, cases, and computer exercises. Topics covered will include data analysis in the risk assessment process, evidence accumulation, evaluation of internal controls, and concerns about ethical matters. Successful completion of the course will require you to complete written assignments, computer-based projects, and classroom presentations.

Prerequisites: ACC 317

Attributes: Undergraduate

ACC 420 Fund Accounting (3 credits)

This course provides students with an introduction to the fund-based theory and practice of accounting as it is applied in governmental and nonprofit entities. Emphasis is placed on the comprehensive annual financial reporting model used for communicating with organizations' stakeholders.

Prerequisites: ACC 205

Attributes: Undergraduate

ACC 422 Forensic Accounting (3 credits)

This course covers forensic accounting techniques that address the contemporary need to prevent, detect, investigate, and prosecute financial fraud perpetrators. Tools and systems used in auditing for fraud instances are discussed. Also reviewed are the professional pronouncements that apply to the independent accountant in the circumstances when financial malfeasance is suspected or uncovered. Ethical considerations and other professional responsibilities that impact the auditor and the client's stakeholder community are included in the various cases that form the basis for course coverage.

Prerequisites: ACC 317

Attributes: Justice Ethics and the Law , Undergraduate

ACC 423 Accounting Control Systems (3 credits)

This case-based course is designed to develop a student's understanding of accounting information systems and consulting services and their role in accomplishing the strategic goals of organizations. Topics covered will include operational and strategic information systems, business process reengineering, and enterprise resource planning (ERP) systems. During the semester, we will use a combination of text, supplemental reading material, cases, and hands-on computer exercises. Successful completion of the course will require you to complete written assignments, computer-based projects, and classroom presentations. The tests will emphasize overall understanding of conceptual material and the projects and exercises will emphasize the application of such material to real world information using leading enterprise resource planning software.

Prerequisites: ACC 307

Attributes: Undergraduate

ACC 430 International Accounting (3 credits)

This course introduces students to the accounting challenges faced by multinational companies. By reviewing the diversity of accounting systems in various countries, cultural and environmental influences on accounting and financial reporting are observed. The worldwide movement to converge or replace various national accounting rules with International Financial Reporting Standards is described. Specific issues addressed include financial disclosure, consolidation, currency translation, transfer pricing, and cross-border taxation.

Prerequisites: ACC 102

Attributes: GEP: Globalization Course, Undergraduate

ACC 450 Professional Accounting Pract (3 credits)

Topics will include materials commonly required for Professional Accounting Certifications.

Prerequisites: ACC 307

Attributes: Undergraduate

ACC 470 Special Topics in Accounting (3 credits)

Topics will vary according to the semester in which the class is offered. Permission of Department Chair required.

Prerequisites: ACC 307

Attributes: Undergraduate

ACC 490 Accounting Winter Internship (3 credits)

A spring internship experience can be completed with a company that recruits on campus or the student can arrange an internship on their own.

Prerequisites: ACC 206

Restrictions: Enrollment limited to students with a class of Junior or Senior.

Attributes: Undergraduate

ACC 491 Accounting Summer Internship (3 credits)

A summer internship experience can be completed with a company that recruits on campus or the student can arrange an internship on their own.

Prerequisites: ACC 206

Attributes: Undergraduate

ACC 493 Accounting Research (1-3 credits)

Must have permission of Department Chair.

Attributes: Undergraduate

ACC 509 Curricular Practical Training (1 credit)**ACC 550 Creat & Meas Shareholder Value (3 credits)**

This course employs a case-based approach for assessing the value of the firm and demonstrating how shareholder value is increased. Coverage includes a description of value creation fundamentals and a discussion of contemporary value metrics such as cost-profit-volume analysis, economic value added, and activity-based measurement of management effectiveness. Using financial databases, students work in teams to apply the analytic tools of managerial decision making and prepare comprehensive reports (e.g., the Balanced Scorecard) that measure managerial performance in enhancing firm value.

Prerequisites: HSB Foundation with a score of AC500

Restrictions: Students in the MSPROA program may **not** enroll. Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 570 Creat&Meas Share Value (2 credits)

This course is designed to help students understand the role of managerial accounting in creating value for the organization. It shows how internally generated accounting information is used as a basis for managerial decision making. Topics covered include the balanced scorecard, activity-based costing systems, performance evaluation, and cost-volume-profit analysis. The course also emphasizes how behavioral and ethical factors impact both the organization and its managers.

Attributes: Graduate

ACC 601 Tax Planning (3 credits)

The goal of this course is to introduce the many tax planning opportunities that are inherent in management and personal financial decisions. The emphasis is on acquiring recognition-level knowledge of the important role taxation plays in the daily operation of business enterprises and in each individual's personal financial affairs.

Prerequisites: ACC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 610 Fin Statement Analy&Valuation (3 credits)

This course provides a capstone approach to analyzing and understanding the 10-K reports of major organizations. The course builds upon the detailed studies of accounting topics covered in the required undergraduate accounting curriculum. Students are required to examine the results of these previous topics using the 10-K and interpret financial reporting from the perspective of users of the financial statements. Formal student presentations on their analysis of the statements of selected companies is required.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 615 Special Topics in Fed Taxation (3 credits)

A comprehensive study of the federal income tax treatment of corporations, partnerships, and fiduciary entities. Taxation of gratuitous transfers is also covered. This examination of tax laws and procedures takes the form of studying illustrative examples and completion of problem-solving exercises. Graduate students are required to complete additional work in terms of number of presentations and depth of the analyses.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 617 Audit Decision Analytics (3 credits)

This course examines emerging technological issues in the field of auditing and assurance services, covering subjects related directly to the attestation function in professional practice. Theoretical auditing concepts and prescribed audit procedures are applied to professional practice situations. The course is largely case-based, using a combination of text, supplemental reading materials, cases, and computer exercises. Topics covered will include data analysis in the risk assessment process, evidence accumulation, evaluation of internal controls, and concerns about ethical matters. Successful completion of the course will require you to complete written assignments, computer-based projects, and classroom presentations.

Restrictions: Enrollment limited to students in the MSPROA program. Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 620 Fin Statement Analysis (1 credit)

This course provides a study of how to analyze, understand, and interpret the operating, investing, and financing activities of a publicly traded company using its various external financial disclosures. In addition, students learn how to apply analytical tools for credit and equity assessment, generate financial forecasts, and develop the residual operating income model to arrive at the intrinsic value of the firm.

Attributes: Graduate

ACC 622 Forensic Accounting (3 credits)

This course covers forensic accounting techniques that address the contemporary need to prevent, detect, investigate, and prosecute financial fraud perpetrators. Tools and systems used in auditing for fraud instances are discussed. Also reviewed are the professional pronouncements that apply to the independent accountant in the circumstances when financial malfeasance is suspected or uncovered. Ethical considerations and other professional responsibilities that impact the auditor and the client's stakeholder community are included in the various cases that form the basis for course coverage.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 623 Accounting Control Systems (3 credits)

This case-based course is designed to develop a student's understanding of accounting information systems and consulting services and their role in accomplishing the strategic goals of organizations. Topics covered will include operational and strategic information systems, business process reengineering, and enterprise resource planning (ERP) systems. During the semester, we will use a combination of text, supplemental reading material, cases, and hands-on computer exercises. Successful completion of the course will require you to complete written assignments, computer-based projects, and classroom presentations. The tests will emphasize overall understanding of conceptual material and the projects and exercises will emphasize the application of such material to real world information using leading enterprise resource planning software.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 650 Professional Accounting Pract (3 credits)

Topics will include materials commonly required for professional accounting certifications.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 670 Special Topics in Accounting (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ACC 793 Research in Accounting (3 credits)

By permission of Chair

Prerequisites: ACC 550

Attributes: Graduate

Actuarial Science (ASC)

ASC 150 First Year Seminar (3 credits)

This first year seminar course provides an introduction to the mathematical and financial techniques actuaries use to forecast the future and quantify risk. Topics may be selected from basic probability, introduction to financial mathematics, time series analysis and statistical correlation, credibility theory, pricing insurance products and risk load, portfolio theory and asset allocation management. Students are also required to make a presentation on a topic related to actuarial science. The course is taught in a computer classroom and students make extensive use of software such as Microsoft Excel in the development of mathematical models.

Attributes: First-Year Seminar, Undergraduate

ASC 170 Topics in Actuarial Science (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ASC 201 Financial Methods in Act Sci (3 credits)

This course provides an introduction to financial theory and practice as it relates to the management and valuation of publicly-traded companies, and the role of interest rates in capital markets and the economy. Topics include: the corporation and financial markets, financial statement analysis, financial decision making, the time value of money, interest rates, bond valuation and debt financing, fundamentals of investment decisions and capital budgeting, stock valuation, raising equity capital, capital markets and the pricing of risk, optimal portfolios, the Capital Asset Pricing Model, and the cost of capital. ASC 201 is designed to (i) fulfill the Validation by Educational Experience (VEE) requirements of the Society of Actuaries (SOA) and the Casualty Actuarial Society (CAS) pertaining to Corporate Finance, and (ii) introduce actuarial science majors to the basic concepts necessary to succeed in ASC 401 (Financial Mathematics) and the SOA Exam FM / CAS Exam 2 sponsored by the actuarial societies. Where appropriate, examples and problems from prior FM/2 exams will be assigned and completed.

Prerequisites: ECN 101 and ACC 101 and MAT 161

Attributes: Undergraduate

ASC 270 Topics in Actuarial Science (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ASC 300 Intro to Actuarial Probability (3 credits)

This course is the first part of a two-semester sequence that will prepare the student to take Exam P of the Society of Actuaries. This course includes counting principles, permutations, combinations, basic probability concepts, sample spaces and events, conditional probabilities, Bayes's Theorem, mutually-exclusive and independent events, discrete and continuous univariate random variable distributions (including binomial, negative binomial, geometric, hypergeometric, Poisson, uniform, exponential, gamma, normal, lognormal, and beta) and their applications.

Prerequisites: MAT 162

Attributes: Undergraduate

ASC 301 Actuarial Probability (3 credits)

This course provides an introduction to the basic probabilistic principles of insurance and Risk Management. Selected topics are covered to enable the application of probability theory to solve problems found in insurance and risk management applications. A problem solving approach will be adopted to provide preparation to pass the first actuarial exam co-sponsored by the Casualty Actuarial Society (Part 1) and the Society of Actuaries (Part P).

Prerequisites: MAT 321 or ASC 300

Attributes: Undergraduate

ASC 370 Topics in Actuarial Science (3 credits)

These courses are designed to give in-depth coverage of Actuarial Science topics that are not covered in great detail in other courses.

Attributes: Undergraduate

ASC 401 Financial Math - Actuarial Sci (3 credits)

This course provides an in depth study of the theory of interest. Topics that will be covered include: calculation of the effective rates of interest and discount, evaluation of accumulated and present values of fixed and variable annuities, solution of interest problems involving unknown time periods and rates, determination of yield rates, amortization of loans and sinking funds, calculation of the price of a bond, and valuation of securities. This course will prepare students for the actuarial science examination in financial mathematics which is co-sponsored by the Casualty Actuarial Society (Part 2) and the Society of Actuaries (Part FM).

Prerequisites: MAT 162

Attributes: Undergraduate

ASC 402 Investment Mathematics (3 credits)

This course introduces the basics of investment and financial pricing based on rigorous mathematical reasoning. It consists of two parts. In the first part, students will learn how to construct a portfolio based on the mean-variance principle, the capital asset pricing model, multi-factor model and behavioral finance. The second part is on financial derivatives: a put-call parity, the binomial model for pricing European and American contingent claims, Black-Scholes framework, delta-hedging, and exotic options. This course will prepare students for the actuarial science exam in Investment and Financial Markets (IFM) of the Society of Actuaries or Exam 3F of the Casualty Actuarial Society. If time permits, the class will discuss the fundamental difference between Actuarial Pricing and Financial Pricing and how to combine them to price hybrid products such as Variable Annuities.

Prerequisites: MAT 322 and ASC 401

Attributes: Undergraduate

ASC 410 Modern Actuarial Statistics (3 credits)

This course covers selected topics from Exam MAS-I of the Casualty Actuarial Society. This course covers Poisson processes (including expected values, variances, probabilities and applications), discrete Markov Chains, Life Contingency problems, Monte Carlo Simulation, random number generation, maximum likelihood estimation, testing statistical hypotheses, insurance claim applications of various statistical distributions.

Prerequisites: ASC 301

Attributes: Undergraduate

ASC 420 Fundamentals of Actuarial Math (3 credits)

This course covers selected topics from Exam FAM of the Society of Actuaries. This course covers key features of insurance and reinsurance coverage, characteristics and applications of commonly used severity, frequency, and aggregate models, estimating parameters for severity and frequency distributions using MLE, credibility concepts and their applications, pricing and reserving for short-term insurance coverages, long-term insurance coverages and retirement financial security programs, parametric and non-parametric mortality and survival models, present value random variables associated with long-term insurance coverages, premium and policy value calculation for long-term insurance coverages.

Prerequisites: ASC 301

Attributes: Undergraduate

ASC 470 Topics in Actuarial Science (3 credits)

Topics will vary according to the semester in which the class is offered.

ASC 471 Independent Study (3 credits)

Students will study a topic in actuarial science with a faculty mentor.

Attributes: Undergraduate

ASC 472 Independent Study (3 credits)

Students will study a topic in actuarial science with a faculty mentor.

Attributes: Undergraduate

Aerospace Studies (AER)

AER 101 Foundations of USAF I (1 credit)

A survey course designed to introduce students to the United States Air Force and Air Force Reserve Officer Training Corps. Featured topics include: mission and organization of the Air Force, officership and professionalism, military customs and courtesies, Air Force officer opportunities, group leadership problems, and an introduction to communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing cadets with followership experiences.

Attributes: Undergraduate

AER 102 Foundations of USAF II (1 credit)

A survey course designed to introduce students to the United States Air Force and Air Force Reserve Officer Training Corps. Featured topics include: mission and organization of the Air Force, officership and professionalism, military customs and courtesies, Air Force officer opportunities, group leadership problems, and an introduction to communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing cadets with followership experiences.

Attributes: Undergraduate

AER 200 Leadership Lab (0 credits)

Leadership Laboratory (LLAB) is a dynamic and integrated grouping of leadership developmental activities designed to meet the needs and expectations of prospective Department of the Air Force second lieutenants and complement the AFROTC academic program. It is a student planned, organized, and executed practicum conducted under the supervision of the Detachment Commander and Operations Flight Commander.

Attributes: Undergraduate

AER 201 Evolution USAF Aero Power I (1 credit)

A survey course designed to facilitate the transition from Air Force ROTC cadet to Air Force ROTC candidate. Featured topics include: Air Force heritage, Air Force leaders, an introduction to ethics and values, introduction to leadership, group leadership problems, and continuing application of communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing cadets with their first opportunity to apply leadership experiences discussed in class.

Attributes: Undergraduate

AER 202 Evolution USAF Aero Power II (1 credit)

A survey course designed to facilitate the transition from Air Force ROTC cadet to Air Force ROTC candidate. Featured topics include: Air Force heritage, Air Force leaders, an introduction to ethics and values, introduction to leadership, group leadership problems, and continuing application of communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing cadets with their first opportunity to apply leadership experiences discussed in class.

Attributes: Undergraduate

AER 301 Air Force Leadership Studies I (3 credits)

This course is a study of the leadership and quality management fundamentals, professional knowledge, Air Force doctrine, leadership ethics, and communication skills required of an Air Force junior officer. Case studies are used to examine Air Force leadership and management situations as a means of demonstrating and exercising practical application of the concepts being studied. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing advanced leadership experiences, giving students the opportunity to apply leadership and management principles. Prerequisite: Successful completion of Air Force ROTC Field Training
Attributes: Undergraduate

AER 302 Air Force Leadership Studies II (3 credits)

This course is a study of the leadership and quality management fundamentals, professional knowledge, Air Force doctrine, leadership ethics, and communication skills required of an Air Force junior officer. Case studies are used to examine Air Force leadership and management situations as a means of demonstrating and exercising practical application of the concepts being studied. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing advanced leadership experiences, giving students the opportunity to apply leadership and management principles. Prerequisite: Successful completion of Air Force ROTC Field Training
Attributes: Undergraduate

AER 401 National Security Affairs I (3 credits)

This course examines the national security process, regional studies, advanced leadership ethics, Air Force doctrine. Special topics of interest focus on the military as a profession, officership, military justice, civilian control of the military, preparation for active duty, and current issues affecting military professionalism. Within this structure, continued emphasis is given to refining communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing advanced leadership experiences, giving students the opportunity to apply the leadership and management principles. Prerequisite: Successful completion of Air Force ROTC Field Training
Attributes: Undergraduate

AER 402 National Security Affairs II (3 credits)

This course examines the national security process, regional studies, advanced leadership ethics, Air Force doctrine. Special topics of interest focus on the military as a profession, officership, military justice, civilian control of the military, preparation for active duty, and current issues affecting military professionalism. Within this structure, continued emphasis is given to refining communication skills. Leadership Laboratory (AER 200) is mandatory for Air Force ROTC cadets, and it complements this course by providing advanced leadership experiences, giving students the opportunity to apply the leadership and management principles. Prerequisite: Successful completion of Air Force ROTC Field Training
Attributes: Undergraduate

American Sign Language (ASL)

ASL 101 American Sign Language I (3 credits)

This course will provide the learner with fingerspelling and basic sign language skills. Students will gain knowledge of the deaf culture, hearing loss and its implications, and various communication systems used by the deaf.

Prerequisites: ASL 101 Placement with a score of 1

Restrictions: Enrollment is limited to students with a major in Autism Behavioral Studies, Communication Sci. Disorders, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr, Exercise Physiology, Health Science, Psychology or Special Education (PK to 8).

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ASL 102 American Sign Language II (3 credits)

This course will serve to supplement the beginner's course by providing more in-depth study of the deaf, their culture and the various communication systems used by the deaf. Conversational abilities should be attained by the end of this class.

Prerequisites: ASL 101 or ASL 102 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ASL 170 Special Topics in ASL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ASL 201 Intermediate Amer Sign Lang I (3 credits)

Continuing American Sign Language instruction for intermediate learners. Focus is on receptive, expressive and conversational competence, based on a total immersion approach. Emphasis is placed on topics that which naturally occur within the Deaf community. Students will have the opportunity to develop relationships with members of the Deaf community through outside interactions, which are encouraged in order to increase linguistic and cultural knowledge.

Prerequisites: ASL 102 or Language Placement with a score of SL201

Attributes: Undergraduate

ASL 202 Intermediate Amer Sign Lang II (3 credits)

This course will continue American Sign Language for intermediate learners. The focus continues to be on honing receptive, expressive and conversational competence, based on a total immersion approach. Students will still have the opportunity to develop relationships with the Deaf community through outside interactions.

Prerequisites: ASL 201 or Language Placement with a score of SL202

Attributes: Undergraduate

ASL 270 Special Topics in ASL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ASL 370 Special Topics in ASL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ASL 470 Special Topics in ASL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

Applied Behavioral Analysis (ABA)

ABA 100 Intro Autism Spectrum Disorder (3 credits)

Autism spectrum disorders (ASD's), including autism, pervasive developmental disorder, and Asperger's syndrome, are common, occurring in 1 in 166 individuals. The result of a neurological disorder that affects the functioning of the brain, ASD's impact social interactions and communication skills. The types of ASD's range in severity from very low functioning associated with significant cognitive deficits and highly disruptive behaviors, to very high functioning, associated with highly gifted intelligence and "quirky" behaviors. This course introduces students to the neurology, symptoms, diagnostic criteria, causes, biomedical treatments, and behavioral interventions, as well as to the impact on individuals with ASD's, families, friends, school districts, the economy, and society with regard to functioning, coping, prognosis, and outcomes.

Attributes: Faith Justice Course, Undergraduate

ABA 101 Intro App Behavior Analysis (3 credits)

This is the first course within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB©) Verified Course Sequence (VCS) BCaBA © certification. This course is designed to introduce the current research-based interventions in the field of applied behavior analysis and autism. Students will gain a general understanding of the philosophical underpinnings, the concepts and principles of applied behavior analysis and how they can be used across multiple environments (home, school, early intervention, clinics) to address the various social, behavioral and communication deficits of individuals with autism. Topics addressed include respondent and operating conditioning, reinforcement, punishment, extinction, generalization, discrimination, matching law, and various contingencies.

Attributes: Undergraduate

ABA 102 ABA Ethics & Professionalism (3 credits)

This is the second course within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence (VCS) BCaBA © certification. This course will explore professional and ethical issues in the field of applied behavior analysis. The Behavior Analyst Certification Board's Professional and Ethical Compliance Code will be examined and its relation to the provision of services. Students will explore ethical problem solving and practices, and societal issues of importance related to culture, human rights, punishment, parenting, education, behavior management, and workplace behavior. Students learn to demonstrate professionalism in the field and practice resolving ethical dilemmas from case studies and their work settings.

Prerequisites: ABA 101

Attributes: Undergraduate

ABA 200 Applied Behav Anlysis & Autism (3 credits)

This is the first course within the Onground 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence toward BCaBA Certification. This course is designed to introduce the gold standard of research-based interventions in the field of autism: applied behavior analysis, a natural science approach to studying behavior. It covers principles of learning and behavior in relation to autism spectrum disorders, from relatively simple concepts such as reinforcement to more complex issues such as the acquisition of human language. Students will gain a general understanding of applied behavior analysis principles and how these principles guide the foundation toward a behavioral treatment approach for individuals with autism.

Attributes: Undergraduate

ABA 201 Skill Assess & Instr ABA&ASD (3 credits)

This is the second course within the Onground 5th Edition Behavior Analyst Certification Board's © Verified Course Sequence toward BCaBA Certification. This course is designed to provide research-based interventions in the field of autism for skill assessment and instruction, utilizing applied behavior analysis, a natural science approach to studying behavior. It covers principles of learning and behavior in relation to skill deficits in autism spectrum disorders, from relatively simple concepts such as prompting procedures to more complex treatment such as Discrete Trail Training (DTT). Students will gain an in-depth understanding of the steps necessary to utilize applied behavior analysis principles in skill assessment and intervention, and how these principles guide building an individualized social skills curriculum for children and adolescents with autism (ages 2 - 21 years old).

Attributes: Undergraduate

ABA 202 Single-Case Research in ABA (3 credits)

This is the third course within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence (VCS) BCaBA © certification. This course covers assessment of behavior, including all dimensions of behavior and structured observation. Single-case research methods, including reversal, multiple baseline, changing criterion, alternating treatment, and multi-element designs are covered. Students will be expected to understand, interpret, and apply single-subject research methodology through the experience of defining behavior, collecting data, calculating interobserver agreement, and creating graphical displays of data. Students will have the opportunity to implement basic experiments for evaluating the effectiveness of behavioral interventions.

Prerequisites: ABA 102

Attributes: Undergraduate

ABA 300 Behav Assess & Interv ABA&ASD (4 credits)

This is the third course within the Onground 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence toward BCaBA © Certification, and connects to the first concentrated supervised experience at the Kinney Center for Autism Education and Support. The course content covers the research-based and comprehensive interventions to address behavioral needs in the field of autism through functional behavior assessment and functional analysis within applied behavior analysis, through completing a total of 250 hours of supervised experience. Students will gain a thorough understanding of applied behavior analysis principles related to behavioral assessment and how these principles guide a formal behavior intervention plan process for children, adolescents, and adults with autism. Through this experience, students will apply concepts learned in Applied Behavior Analysis and Autism through a primary assignment of providing direct implementation with individuals with autism. Students will also apply concepts learned in Skill Assessment and Instruction in ABA and Autism through a progress monitoring assignment within a Social Skills program, where the student will select goals based on assessment, determine appropriate data collection materials, complete objective observations, and analyze progress for a group of individuals with autism. To apply concepts learned in Behavioral Assessment, students will complete their first functional behavioral assessment for an individual with autism. Students will be expected to complete additional hours during the week outside of the assigned class meeting time that apply the course material to an applied setting.

Prerequisites: ABA 100 and ABA 200 and ABA 201

Attributes: Undergraduate

ABA 301 Prof Ethics ABA & ASD (4 credits)

This is the fourth course within the Onground 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence toward BCaBA © Certification and connects to the second concentrated supervised experience at the Kinney Center for Autism Education and Support. This course covers ethical concepts and decision making for behavior analysis professionals through the Behavior Analyst Certification Board Professional and Ethical Compliance Code. Students will learn the depth of the compliance code as well as the ability to analyze and apply the code through real life settings, completing a total of 250 hours of supervised experience. Students will continue to enhance skills gained in Concentrated Field Experience 1, by continuing direct implementation with individuals with autism. Students will expand the progress monitoring assignment to a new age group of individuals with autism within a Social Skills program, where the student will select goals based on assessment, determine appropriate data collection materials, complete objective observations, and analyze progress for a group of individuals with autism. To apply concepts learned in Ethics and Professionalism in Applied Behavior Analysis and Autism Treatment, students will complete a second functional behavioral assessment for an individual with autism, as well as following their first functional behavioral assessment utilizing procedural integrity methods. Students will be expected to complete additional hours during the week outside of the assigned class meeting time that apply the course material to an applied setting.

Prerequisites: ABA 100 and ABA 200 and ABA 201 and ABA 300

Attributes: Undergraduate

ABA 302 Adv App ABA (3 credits)

This is the fifth course within the PLS 5th Edition Behavior Analyst Certification Board's (BACB) Verified Course Sequence (VCS) BCaBA certification. This course is designed to expand upon the previously learned concepts of behavior analysis and connect it to the practical world. In this course, students will gain an understanding of how to use the principles and practices of applied behavioral. This course behavior change procedures from covers principles of learning and behavior from relatively simple animal studies to more complex issues such as the acquisition of human language. Examples of topics reviewed in depth include operant and respondent conditioning, reinforcement, punishment, extinction, shaping, chaining, stimulus control, and verbal behavior. Multi-disciplinary, real world examples and applications will be introduced.

Prerequisites: ABA 102

Attributes: Undergraduate

ABA 400 Appld Research: ABA & ASD (4 credits)

This is the fifth course within the Onground 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence toward BCaBA © Certification and connects to the third concentrated supervised experience at the Kinney Center for Autism Education and Support. This course covers research design and how to systematically analyze all dimensions of behavior and structured observation through applied intervention. Single-case research methods, including reversal, multiple baseline, changing criterion, alternating treatment, and multielement designs are covered. Students will be expected to understand, interpret, and apply single-subject research methodology, completing a total of 250 hours of supervised experience. Through this experience, students will apply all prior concepts learned within the first four content classes, through a case management assignment. The case management assignment will include both skill and behavioral assessment, selecting and prioritizing goals and target behaviors based on record review, objective observation, indirect and direct measures. In addition, the case management assignment will include selecting intervention and teaching procedures, in building skill instruction plans and analyzing data through progress reports. To apply concepts learned in Applied Research Design, students will complete a case study within their case management assignment, whether through skill instruction or behavioral intervention. Students will be expected to complete additional hours during the week outside of the assigned class meeting time that apply the course material to an applied setting.

Prerequisites: ABA 100 and ABA 200 and ABA 201 and ABA 300 and ABA 301

Attributes: Undergraduate

ABA 401 Behav Consult: ABA & ASD (4 credits)

This is the sixth and final course within the Onground 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence toward BCaBA © Certification and connects to the fourth and final concentrated supervised experience at the Kinney Center for Autism Education and Support. Students will build upon previous knowledge around behavior analytic principles, measurement, data, experimental design, ethics, assessment, selecting and implementing interventions, completing a total of 250 hours of supervised experience. This course takes that foundation and applies it to data-based decision making to evaluate the effects of interventions for clients and staff, continuing with their case management assignment from Concentrated Field Experience 3, as well as their case study. Students also learn to collaborate while selecting and implementing interventions that integrate behavior analytic concepts and principles into plans and to rely on the best available scientific evidence and to incorporate information about preferences, risks, the environment, and social validity for program planning, via their third and final functional behavioral assessment. This consultation task will require utilizing the conjoint behavior consultation method across all steps of the process with the parents, additional professionals and direct care staff on the case. Students will be expected to complete additional hours during the week outside of the assigned class meeting time that apply the course material to an applied setting.

Prerequisites: ABA 300 and ABA 301 and ABA 400

Attributes: Undergraduate

ABA 402 Assessment in ABA (3 credits)

This is the sixth course within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence (VCS) BCaBA © certification. Assessment is an important part of any behavior analytic intervention. This course is designed to expand upon the previously learned concepts of behavior analysis and will present the student with information on observation, data collection, and data interpretation. Students will learn the methods for obtaining descriptive data and the procedures for conducting systematic manipulations. Functional assessments and analysis of individual behaviors will be a primary focus. Students will review completing record review, determining the need for services, identifying socially significant behavior, identifying client strengths and weaknesses, conducting preference assessments, graphing functions of behaviors, various applications of assessment within behavior analysis, and the importance of interdisciplinary collaboration, and incorporating client quality of life and happiness. Students will also have the opportunity to complete a functional behavior assessment, and review mock client data.

Prerequisites: ABA 302

Attributes: Undergraduate

ABA 403 Consultation & Supervision in ABA (3 credits)

This is the seventh and final course within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB ©) Verified Course Sequence (VCS) BCaBA © certification. This is the final course in the sequence, where students will build upon previous knowledge around behavior analytic principles, measurement, data, experimental design, ethics, assessment, selecting and implementing interventions. This course takes that foundation and applies it to data-based decision making to evaluate the effects of interventions for clients and staff of organizations. Students also learn to collaborate while selecting and implementing interventions that integrate behavior analytic concepts and principles into plans and to rely on the best available scientific evidence and to incorporate information about preferences, risks, the environment, and social validity for program planning. The course includes team activities and case studies to assess and intervene in collaborative, positive ways that maximize outcomes.

Prerequisites: ABA 402

Attributes: Undergraduate

ABA 404 Concentrated Field Experience1 (3 credits)

This is the first concentrated field experience, within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB) Verified Course Sequence (VCS) BCaBA certification.

Prerequisites: ABA 101

Attributes: Undergraduate

ABA 405 Concentrated Field Experience2 (3 credits)

This is the second concentrated field experience, within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB) Verified Course Sequence (VCS) BCaBA certification.

Prerequisites: ABA 101 and ABA 404

Attributes: Undergraduate

ABA 406 Concentrated Field Experience3 (3 credits)

This is the third concentrated field experience, within the PLS 5th Edition Behavior Analyst Certification Board's © (BACB©) Verified Course Sequence (VCS) BCaBA© certification. Concentrated Field Experience3.

Prerequisites: ABA 101 and ABA 201 and ABA 404 and ABA 405

Attributes: Undergraduate

ABA 468 Resources & Advocacy for Autism (3 credits)

Intervention and therapeutic services are critical to improving the lives of children and adults, and advocating for individuals with autism is an important process in securing these services. This course introduces students to the role that therapists, physicians, families, case workers and community agents serve in advocating for those with autism, where services are provided, how they are funded, what they offer those with autism, and how to advocate for individuals with autism. IHS 465 is recommended prior to or concurrently with this course.

Attributes: Undergraduate

ABA 469 Adult/Transition Autism (3 credits)

This course focuses on understanding the issues facing adults with autism spectrum disorder. Students will learn about issues adults with ASD face including independent living skills, friendships, sexual relationships and marriage, finding and coping with employment, secondary education, post-secondary education, psychiatric disturbances in adulthood, legal issues, and enhancing independence. Students will learn the newest research and intervention techniques to promote a successful transition to adulthood. IHS 465 is recommended prior to or concurrently with this.

Attributes: Undergraduate

ABA 470 Senior Sem ABS Research (3 credits)

This course is designed to expand upon the previously learned concepts in your ABS coursework. This course will be mostly face-to-face with a few designated online sessions and is specific to the research/advocacy track.

Attributes: Undergraduate

ABA 471 Special Topics in Autism (3 credits)

Autism spectrum disorders (ASD), including autism, pervasive developmental disorder, and Aspergers syndrome, are common. The result of a neurological disorder that affects the functioning of the brain, ASD's impact social interactions and communication skills. The types of ASD range in severity from very low functioning associated with significant cognitive deficits and highly disruptive behaviors, to very high functioning, associated with highly gifted intelligence and "quirky" behaviors. This course is a continuation of Intro to Autism Spectrum Disorder and provides advanced topics in the causes, treatments and implications of autism. The format for this course is seminar style. This will primarily consist of significant student involvement.

Attributes: Undergraduate

ABA 475 Coping with Autism (3 credits)

This course explores how families and service providers cope with autism. The impact of autism on parents, siblings, grandparents and others close to the family is discussed, particularly around coping with the behaviors associated with autism and the reactions of others. In addition, how families cope with complex issues such as school placement and support services, respite time, marital relationships, economics of paying for services and other important and difficult issues faced by those who care for children and adults with autism are presented. Finally, the impact on service providers and their strategies for effective coping are explored.

Attributes: Undergraduate

ABA 601 Concepts & Principles of Behavior Analysis (3 credits)

This introductory course focuses on the concepts and principles of behavior analysis, a natural science approach to studying behavior. It covers principles of learning and behavior from relatively simple animal studies to more complex issues such as the acquisition of human language. Examples of topics reviewed in depth include operant and respondent conditioning, reinforcement, punishment, extinction, shaping, chaining, stimulus control, and verbal behavior. Multi-disciplinary, real world examples and applications will be introduced.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 602 Ethics & Professionalism in Behavior Analysis (3 credits)

This course focuses on ethics and professionalism in behavior analysis, with a emphasis on the Behavior Analyst Certification Board's® Professional and Ethical Compliance Code for Behavior Analysts and the corresponding disciplinary system. This course familiarizes students with ethical problem solving and practice related to the application of behavior analysis. Topics include regulations, laws, policies, and societal issues of importance related to culture, human rights, punishment, parenting, education, behavior management, and workplace behavior. Students learn to demonstrate professionalism in the field and practice resolving ethical dilemmas from case studies and their work settings. Connections are made to relevant ethical codes from multi-disciplinary and related fields as students learn to think, resolve issues, and behave like an ethical behavior analyst.

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 603 Measuring Behavior Change (3 credits)

This course addresses defining behavior, collecting data, calculating inter-observer agreement, and creating graphical displays of data. It teaches students the characteristics of behavior analytic experiments that are methodologically and logically sound, socially valid, and ethical. We explore the major experimental designs used in behavior analysis, practice interpretation and evaluation of data, and learn the limitations of behavioral and non-behavioral research. Interdisciplinary examples are provided and analyzed.

Prerequisites: ABA 601 and ABA 602

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 604 Behavior Assessment (3 credits)

This course focuses on behavior assessment. It covers descriptive and functional assessment of problematic behavior, as well as functional analysis. Students learn to review records, determine the need for behavior analytic services, select socially significant behavior-change goals, and conduct skill and preference assessment. Through case studies, students learn to describe the common functions of behavior. Examples of multi-disciplinary applications of behavior assessment are presented.

Prerequisites: ABA 601 and ABA 602

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 605 Behavior Change Procedures (3 credits)

This course provides comprehensive review of the application of behavior analytic principles across varied child, adult, and health contexts. Specific training is provided for procedures such as reinforcement, punishment, motivating operations, modeling, stimulus control, rules, shaping and chaining. Students explore methods for teaching simple to complex repertoires, using discrete trials, Skinner's analysis of verbal behavior, group contingencies, self-management, and strategies to maintain and generalize behavior. Topics include behavior change applications from a range of subject-matter experts who have clinical and research experience across multiple uses of ABA.

Prerequisites: ABA 601 and ABA 602 and ABA 603 and ABA 604

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 606 Collaboration, Supervision, & Management in Behavior Analysis (3 credits)

This course prepares students to provide behavior analytic supervision or training, performance monitoring, mentorship, and function-based strategies to improve personnel performance through expectation setting, motivation, and feedback. There is an emphasis on the importance of data-based decision making to evaluate the effects of interventions for clients and staff of organizations. Students also learn to collaborate while selecting and implementing interventions that integrate behavior analytic concepts and principles into plans and to rely on the best available scientific evidence and to incorporate information about preferences, risks, the environment, and social validity for program planning. The course includes team activities and case studies to assess and intervene in collaborative, positive ways that maximize outcomes.

Prerequisites: ABA 601 and ABA 602 and ABA 603 and ABA 604

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 607 Science and Philosophy of Behavior Analysis (3 credits)

The course covers the history and philosophy of behaviorism, latest developments over the last decade, evolutionary theory, and cultural evolution theory. We explore behavior analysis as it applies to philosophical and practical problems, and explore concepts such as purpose, language, knowledge, and thought, as well as applying behavioral thinking to contemporary social issues like freedom, democracy, culture, and resolution of complex social issues. The course culminates with practical approaches to improving our lives, our community, and our world.

Prerequisites: ABA 601 and ABA 602 and ABA 603 and ABA 604 and ABA 605 and ABA 606

Restrictions: Enrollment is limited to students with a major in Applied Behavior Analysis. Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 608 Capstone: Applied Behavior Analysis (3 credits)

ABA 608 is the last course taken within the sequence and culminates the entire Applied Behavior Analysis (ABA) coursework. The course provides students the opportunity to integrate the principles of ABA to synthesize the knowledge and skills gained throughout the graduate program, including an application of behavioral principles to address an identified problem in a clinical or educational setting.

Prerequisites: ABA 601 and ABA 602 and ABA 603 and ABA 604 and ABA 605

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 609 Supervised Fieldwork in ABA (4 credits)

This course is designed to provide students with supervision hours that are in line with the requirements of the BACB. Please note that these requirements may change at any time. The exact number of hours provided each week may vary depending on individual student needs and practical factors. It is the responsibility of the student to track their accrual of experience hours. While the course is fully online, there will be a mix of scheduled Zoom sessions and discussions during the week. There will also be asynchronous assignments that are aligned to provide feedback and deepen student understanding of ABA principles. Students do not need a current placement to enroll in this course; however, should not enroll in this course without currently or previously enrolled in ABA 601.

Prerequisites: ABA 601 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ABA 670 Special Topics: ABA (1-3 credits)

The theme or topic for this course will change as topical interests among graduate students and faculty change.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Art (ART)

ART 121 Introduction to Studio Art (3 credits)

This course is designed to introduce the essential elements of painting, drawing and sculpture. Working from the landscape, still life and the figure, students research two-dimensional form and space through a variety of mediums that includes: charcoal, pencil and paint. The investigation of three-dimensional issues is done with clay. \$230 Art fee

Attributes: GEP: Art/Literature, Undergraduate

ART 130 Art Therapy (3 credits)

Art therapy uses different forms of creative expression to help people explore and transform feelings, thoughts, and ideas. It can help to process and cope with emotional issues, as well as facilitate self-awareness, understanding, healing, and well-being. Art therapy can be especially useful for people who find it difficult to talk about their thoughts and emotions. In this course, students will examine theories and models of art therapy. Through discussion of readings, sharing of experiences, group work, and art therapy activities, students will increase their understanding of the history, theory, practice, and applications of art therapy in various settings.

Attributes: ARTS Major ILC Courses, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 132 Illustration I (3 credits)

This is an introductory course to the Illustration field. Students will develop fundamental illustration skills and become familiar with major areas within the industry, such as advertising, book, editorial and entertainment design. Students will explore a variety of media and techniques while acquiring approaches to communication-based problem solving skills using research methods to create and communicate their ideas. Both concept and execution are emphasized. Objective visual perception, clarity in drawing and technical facility is stressed.

This course is an introduction to conceptual strategies available to the visual artist, the critical link between text and image, and the creative approaches for giving visual form to abstract concepts and ideas.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 133 Drawing I (3 credits)

Students work from their actual visual experience. Working from the landscape, still life and the figure, students research form and space through tone, size relationships, mark-making and composing the picture plane. Ultimately we try to integrate these elements producing a unified whole as well as finding an equivalent to the artists' experience. Media range from small pencil drawings to larger more ambitious charcoal drawings. Art fee \$230

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 135 Painting I (3 credits)

This course concentrates on becoming familiar and proficient with the basics of image-making through painting, developing good studio practice, introducing terminology, developing language and examining the work of established professional painters, so that constructive discussions and self-analysis may take place. The subject is studio-based, and the course focuses on working from life (meaning that students work from their actual visual experience) or on learning from the attempt to express an interior reality. Working from various motifs as appropriate, including the landscape, still life and the figure, students research form and space using paint. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 136 Landscape Painting (3 credits)

This course is designed to introduce the student to the essential elements of painting. We research these elements through the unique challenges that arise from notating the landscape, which include: overlapping forms, color temperature, the vastness of an outdoor space, scale relationships and atmospheric perspective. Ultimately we try to integrate these elements producing a unified whole as well as finding an equivalent to the artists' experience.

Attributes: GEP: Art/Literature, Undergraduate

ART 137 Printmaking (3 credits)

In this course, students will be introduced to various printmaking techniques, including monotype, linocut, and etching. Printmaking holds a unique position in the 21st century, as artists increasingly use it as an interdisciplinary medium for creating multiples in the art world. Students will explore a brief history of printmaking and examine how contemporary artists employ these techniques for expression and communication. Additionally, students will learn about the applications of prints beyond the art world, including publication and commercial printing.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 138 Landscape Drawing (3 credits)

This course is designed to introduce the student to the essential elements of drawing from the landscape. We research form and space while working from the landscape. Some of the issues include: overlapping forms, the vastness of an outdoor space, scale relationships and atmospheric perspective. Ultimately we try to integrate these elements producing a unified whole as well as finding an equivalent to the artists' experience.

Attributes: GEP: Art/Literature, Undergraduate

ART 139 Contemp Botanical Illustration (3 credits)

This course offers a solid foundation in a variety of skills and techniques for scientific illustration. Students learn botanical drawing and watercolor, as well as botanical science. The course is for beginner, intermediate, and advanced students. It will take place at the Barnes Arboretum at Saint Joseph's University and students will have access to the gardens, greenhouse, and herbarium. A limited number of seats are open to SJU undergraduate students.

Attributes: CCC: F&P Arts, Design & Creative, Undergraduate

ART 140 Anatomy and Life Drawing (3 credits)

This course explores anatomy through drawing. It will provide an in-depth anatomical approach to depicting human anatomy. Students will learn anatomical proportioning while drawing from the figure, and will have the opportunity (but not the obligation) to draw from cadavers. No prerequisites or prior studio art experience required. All students welcome; the course may be of particular interest to art, biology, and health sciences students.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 141 3-D Studio Art (3 credits)

In this hands-on studio course students experiment with the fundamentals of three-dimensional design. Mechanical connections, structural stability, and expressive potential are explored in-depth as well. Spatial and visual elements are discussed in the context of our physical relationship to our environment and to contemporary and art historical influences. Each of the three main projects are designed to encourage students to think creatively, problem solve, improvise, and to discover how the creative process can unfold in exciting and unexpected ways. Image presentations, a museum trip, and group discussions and critiques complement the hands-on studio projects. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 142 Pottery I (3 credits)

This course is an introduction to the creation, function and history of ceramic vessel forms created by hand. Through regular studio practice, students will learn to use the potter's wheel and clay handbuilding techniques to create a variety of functional pottery forms such as cups, bowls, vases and pitchers. Techniques in ceramic surfacing, glazing, kiln firing methods and concept development will be explored. Historic and contemporary pottery forms and styles will be introduced weekly through presentations, lectures, and a gallery visit. Classes also include technical demonstrations, practice time, and critiques. All are welcome. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 143 Mosaics I (3 credits)

This hands-on studio art course focuses on the relationship between image and object through an exploration of ceramic tile and mosaics. Found adorning the most sacred of spaces and often performing the most mundane of functions, ceramic tile is a form of artistic inquiry that explores the intersection of art and utility. Topics include visual perception and language; basic painting and drawing methods; non-objective, abstract and representational imagery; and the construction, firing, and glazing of ceramic tile and mosaics. Classes also include technical demonstrations, practice time, and critiques. All are welcome. Art Fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 144 Ceramics I (3 credits)

This course is an introduction to the creation of ceramic objects by hand and the many ways that using clay as an art form has impacted the history of humankind. Through assigned projects and regular studio practice, students will learn how to build objects with clay using ceramic handbuilding techniques, basic wheel-throwing techniques, ceramic surfacing and kiln firing methods, and concept development. Classes consist of technical demonstrations, lectures on historic and contemporary ceramic objects and artists, practice time, and critiques. Students will begin to understand the essential components of a well designed and finely crafted ceramic sculpture or vessel through assigned projects, group discussions and a gallery visit. All are welcome. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 145 Figurative Sculpture (3 credits)

This introductory course explores ideas and techniques for sculpting the figure from life. Traditional figurative sculpting is taught through study of anatomical proportion, muscular structure, and clay modeling. The history of contemporary figurative sculpture will be explored through lectures, power point presentation, videos, and student research. This class culminates in a project based on contemporary figurative processes. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 146 Sculpture and the Environment (3 credits)

This hands-on studio art course is an introduction to three-dimensional design principles and contemporary sculptural issues focusing on art work related to the topics of environmental activism and the field of environmental ethics. In this class, students will see and discuss work examples that include environmental art, socially engaged public art, and land art among others. The design phases incorporated will include sketching, model making, and joinery techniques in wood. Image presentations, group discussions, and class critiques will complement the studio projects. The ethical frameworks of natural law, utilitarianism, and deontology will be discussed and utilized to further examine public policy around the management of natural resources. Art work examples created and presented in this course will be discussed in the context of 20th and 21st century art historical traditions—students explore pressing environmental issues and artistic impulses that lead contemporary artists to draw attention to environmental themes in their work.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

ART 147 Intro to Sculpture/Mixed Media (3 credits)

This hands-on studio course is an introduction to three-dimensional design principles and contemporary sculptural issues explored through an in-depth mixed-media and interdisciplinary creative process. Mixed-media refers to the combination of various materials, while interdisciplinary refers to working between two-dimensional and three-dimensional processes. In this class, students will work with mold making, wood working, collage, and laser cutting, among other material processes. Image presentations, a museum trip, group discussions and class critiques complement the hands-on studio projects. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 148 Social Justice Through Sculpt (3 credits)

In this studio art course students explore the concepts of social sculpture and social engagement along with fundamental design principles by considering how an art making practice can be used to create opportunities for social change. In this class, students use processes and technologies related to laser cutting, laser etching, use of Adobe Illustrator, and archiving personal narratives (recorded at Service Learning sites that will include local homeless shelters or local public schools), while drawing attention to themes and value systems related to systemic inequality and structural racism. Image presentations, group discussions, and class critiques complement the hands-on and digital fabrication based studio projects.

Attributes: Undergraduate

ART 149 Japanese Pottery & Tea Culture (3 credits)

This studio art course introduces students to the Japanese philosophy and techniques used in pottery making from the perspective of Japanese tea culture, and its evolution from the ancient rituals of the tea ceremony and Zen Buddhist philosophy. Students will use traditional Japanese forming techniques, glazes, and kiln firing practices to create pottery forms derived from the Japanese tea ceremony and Zen aesthetics. At the culmination of this course, students will create a body of work and be able to describe and discuss in depth the cultural context and distinctive features that gave rise to the uniquely Japanese tea ceremony pottery forms and practices. Classes consist of technical demonstrations, lectures, discussions on assigned readings, practice time, critiques, and a group participation at a Japanese tea ceremony at Shofuso. All are welcome.

Attributes: Asian Studies Course, CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ART 160 Phoneography (3 credits)

The smartphone and other mobile technology have spurred a remarkable shift in the field of photography: more pictures are being taken with phones than all other devices combined. This drastic increase in amateur, semi pro and professional photography with mobile devices, has resulted in an influx of photo-editing software and new techniques. Learn various techniques of shooting, editing with camera phones.

Attributes: GEP: Art/Literature, Undergraduate

ART 170 Special Topics (3 credits)

Concentrated focus on a selected topic in Art at an introductory level. CCC certifications vary by section.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 171 Camera-less Photography (3 credits)

A hands-on photography course that explores using darkroom chemicals and light to produce unique photographic images. Students will explore the camera-less processes of photograms, Cliché Verre and chemigrams in depth. A chemigram is an experimental piece of art where an image is made by painting with chemicals on light-sensitive paper. Cliché Verre uses computer-generated or hand-drawn negatives to produce images.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 172 Darkroom Photography I (3 credits)

This course investigates film-based black and white photography as an expressive and creative medium. Topics include the skills of using a 35mm camera effectively, film processing, basic darkroom printing techniques, and an understanding of the aesthetics of photography. Adjustable 35mm cameras will be provided to any students who need them. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 173 Digital Photography I (3 credits)

This course introduces students to the fundamental terminology, concepts, methodologies, and techniques of digital photography. It focuses on the principles of composition, lighting, and visual storytelling. The course will focus on black and white and color photographic techniques. An overview of the history of this modern medium and impact on contemporary culture will be introduced through lectures, field trips and guest lectures. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 174 Historical Photo Processes (3 credits)

This course is an introduction to experimental photographic image techniques related to using the sun as a method to produce engaging and graphic imagery. Students will be introduced to solar printing techniques such as Cyanotype and Van Dyke Brown. Students will explore their own artistic approaches to a photographic printmaking processes, on a variety of surfaces, that does not require extensive technical expertise.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 175 Image Manipulation: Photoshop (3 credits)

This course introduces students to digital tools that manipulate and enhance photographic images. Students learn the skills to correct, retouch, render and enhance varied input in order to create high-quality digital output utilizing the industry standard for digital image manipulation.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 176 Independent Study (3 credits)

Independent research leading to the successful completion of a project with guidance from a faculty member.

Attributes: GEP: Art/Literature, Undergraduate

ART 177 Photography & Climate Crisis (3 credits)

This hands-on studio photography course is an introduction to the principals of two dimensional design using 19th century photographic processes and hybrid 21st century photographic technology with content focused on issues of environmentalism and ethics. The aim of this course is not only to interrogate ethical theory, but to practice artmaking using sustainable materials acquired through urban foraging and upcycling. Students will study the foundations of the environmental movement in the 20th century and current legislation on environmentalism and environmental policy through close readings on the ethical traditions of: natural law, utilitarianism, deontology, deep ecology and ecofeminism. Students will be exposed to art work created by contemporary photographers who use the same methods practiced in class (chlorophyll printing, anthotype and cyanotype processes) and will analyze these examples in relation to environmentalism, humanitarianism, and ethics. Students will work to create their own archive of found imagery and produce digital negatives using photoshop and the piezography printing process to make chlorophyll, anthotype and cyanotype prints. Class time will be spent engaging in Image presentations, group discussions, class critiques and studio projects. Written responses papers, and a final research paper will fill out the course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Ethics Intensive, Undergraduate

ART 178 Photography & Enviro Justice (3 credits)

This photography course introduces students to a blend of 19th-century photographic processes and 21st-century digital technologies, emphasizing environmentalism and ethical considerations in art-making. Engaging in sustainable practices like urban foraging, students will explore ethical theories to critically assess the moral implications of historical and contemporary photographic techniques. Through hands-on projects, students will produce a series of images while analyzing the work of contemporary photographers who address environmental and social justice issues. Course assessments include response papers, a final research paper, and critiques that encourage students to develop critical, ethical reflections on sustainability, resource equity, and the societal impact of photography.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

ART 179 Photography: Truth & Privilege (3 credits)

In this studio course, students will learn the fundamental techniques of digital photography through the study of contemporary artists from marginalized communities. Contemporary methods of portrait photography will be explored through three assignments covering candid portraits, self-portraiture, studio portraits, staged portraits, still-life and memory. The course will include readings and research around the impact of images on race and history, the ethics of seeing, racial bias and photography, photography and privilege and students will learn about how artists who are from oppressed communities make photographs as a way to address issues of race, class, gender and sexuality. Photography techniques taught will include using a DSLR in manual, lighting techniques in and out of the studio and digitally developing and printing photographs. Image presentations, group discussions and class critiques will complement the studio projects.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Diversity, GEP: Diversity Course, GEP: Art/Literature, Undergraduate

ART 180 Intro to Video (3 credits)

This is a course about video art techniques, which introduces students to the basic theory and practice of art based video, incorporating basic narrative, non narrative, and experimental video techniques. Skills that will be developed include introductory level DSLR camera operations such as adjusting exposure and focus, and basic camera movements. Students will learn to edit with Adobe Premiere Pro. The class will also cover basic methods of recording sound. All technical skills are directed towards the inclusion of video as a form of creative expression within the context of an artistic medium.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 193 2D Animation (3 credits)

During this course, students will examine and practice the medium of animation, and gain a greater understanding for what makes this unique artform tick. This will take their general understanding of Shape and Color, and amplify it by adding the concept of Time and Motion to their existing design principles. We will discuss noteworthy works of animation, both new and old, and learn how these pieces of media can leave such a lasting impact simply by adding motion to garner emotion. Students will complete work on a variety of assignments which all correlate to a different level of development in animation, including Character Design and Storyboarding. Through regular group critiques and constructive feedback, students will learn how to more decisively utilize aspects of time and motion, as well as light, shape and color, in their animation and artistic career.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 196 Art Elective (3 credits)**ART 221 Art Education in the Schools (3 credits)**

In this course there are seminar discussions in methods of teaching, levels of mark making, learning styles, art historical references for the learning lessons being taught this week in the school in an eight-week intensive experience of teaching a group of fifteen to thirty primary school students. While this is being done, the student keep a weekly diary from which they construct a ten-page term paper on the meaning of the experience. This is a service learning course.

Attributes: GEP: Art/Literature, Undergraduate

ART 233 Drawing II (3 credits)

Our purpose is to explore both formally and conceptually the elements of drawing in order to realize an authentic vision. Through directed exercises students discover new possibilities in the essential experience of drawing. These exercises cover the formal issues including surface and spatial geometry, the relationship between tone or scale to spatial depth, the mark as a means to personal expression and the integration of pictorial elements into a unified whole. In order to create new possibilities, students experiment with developing images and explore how and why images become interesting. Art fee \$230.

Prerequisites: ART 133 (may be taken concurrently)

Attributes: GEP: Art/Literature, Undergraduate

ART 235 Painting II (3 credits)

Through lectures, critical discussions coursework and examination of the work of established professional painters, students will study content and material issues pertinent to producing compelling artworks. Finding one's own voice as well as an authentic application of the media are primary objectives. Formal concerns such as dynamic composition and rigorous construction of form and space will be stressed. Art fee \$230.

Prerequisites: ART 135

Attributes: GEP: Art/Literature, Undergraduate

ART 239 Concepts and Artmaking (3 credits)

Artists have always made work based on concepts; ideas upon which the image or process is based. For example, the Impressionists in the second half of the 19th century made work based on concepts relevant to the time, choosing to paint common, every day subjects in plain air. Those concepts affected the processes, materials, and subjects of their work. In this course we explore how contemporary artists develop the concepts underpinning their work as well as develop our own conceptual thought concerning art-making. The focus each week is on making our own work. In this regard we will be paying particular attention to the ideas that are motivating us to make the image in the first place, clarifying them by considering some of the factors that influence our ideas and consequently refining the process by which we pursue the development and actualization of those ideas. We will augment our own ideas by researching the concepts of a number of contemporary artists. There are restrictions concerning the materials or medium, except those restrictions that we choose to place on ourselves as a result of the deepening understanding of our concepts and processes. The process of developing your own ideas in art is invaluable if you want to make art in the future; and if not, may simply alter your understanding of the next step you are going to take in your life, helping you to clarify your wants and desires.

Prerequisites: ART 121 or ART 133 or ART 135 or ART 141 or ART 142 or ART 143 or ART 144 or ART 172 or ART 173

Attributes: GEP: Art/Literature, Undergraduate

ART 241 Sculpture II (3 credits)

Building on skills acquired in ART 141, this course explores the use of repetition to achieve scale, the relationship between interior and exterior spaces, and the critical analysis associated with these techniques. Projects are executed in a variety of materials that are chosen for their aesthetic and conceptual properties.

Prerequisites: ART 141 or ART 147

Attributes: GEP: Art/Literature, Undergraduate

ART 242 Pottery II (3 credits)

In this intermediate pottery course, students expand their previous technical skills and concept development by creating an intermediate level body of work on such topics as complex functional vessels, the design and creation of unified pottery sets, and the exploration of "vessel" as an abstract concept. Demonstrations will include intermediate wheel throwing and clay handbuilding techniques, proper loading and unloading of kilns, further glaze research as it relates to specific vessel types, and other topics as needed. Emphasis is given to the ergonomics of specific vessel forms, enhanced craftsmanship, and focus on detail. Topics also include the role of handmade vessels from an historical and contemporary viewpoint. Art fee \$230.

Prerequisites: ART 142 or ART 144 or ART 149

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 243 Ceramic Surface Design (3 credits)

This course explores a broad range of ceramic surfacing and decorating techniques, from traditional to alternative. Group discussions and projects will examine the relationships among surface, content, form, and function. Experiments will be conducted using specific glazes, glaze techniques, overglaze and underglaze decals, slip design techniques, resist methods, and more. Glaze "flaws" will be explored as opportunities for unique surfaces. Students are encouraged to explore both historical and experimental uses of materials and to develop a personal approach to glaze and surface. Projects include functional and sculptural work, both two-dimensional and three-dimensional, and emphasize the dialogue between surface and form. Art fee \$230.

Prerequisites: ART 142 or ART 143 or ART 144 or ART 149

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 244 Ceramics II (3 credits)

This course explores the techniques and concepts involved in creating complex hand-built and wheel-thrown vessels and sculptures. Assignments are concept-driven and encourage creative inquiry and independent thought. The emphasis is not only the refinement of skill but the importance of content. Topics include sculptural approaches to clay, the wheel as an idea generating tool, alternative surfacing methods, and other research-driven investigations. Classes consist of technical demonstrations, lectures, practice time, and critiques.

Prerequisites: ART 142 or ART 144

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 245 Atmospheric Firing: Wood/Salt (3 credits)

This course explores the effects of wood, salt, and raku firing on pottery and sculpture. Firings include high-fire, midrange, and low-fire. To create a type of visual poetry, the projects in this course focus on the distinct attributes of each firing: fuel source, timing, weather, loading method, and flame path. Topics include the impact of heat movement, atmosphere, and temperature on aesthetics and functionality. Some off-campus events are required, including firing a Japanese style noborigama kiln.

Prerequisites: ART 142 or ART 143 or ART 144

Attributes: GEP: Art/Literature, Undergraduate

ART 246 Ceramic Sculpture (3 credits)

Students explore the development of ceramic sculpture from its earliest beginnings to contemporary work being done today. A variety of techniques to both construct and glaze ceramics are studied. Students will be expected to produce a body of sculptural work that balances the conceptual, material, aesthetic and process-oriented elements within it.

Prerequisites: ART 142 or ART 144

Attributes: GEP: Art/Literature, Undergraduate

ART 247 Sculpture Mixed Media II (3 credits)

Building upon the knowledge and skills formed in Intro to Sculpture and Mixed Media students will further their conceptual and craftsmanship skills in generating sculptural forms in this advanced level course.

Prerequisites: ART 141 or ART 147

Attributes: GEP: Art/Literature, Undergraduate

ART 248 Figurative Sculpture II (3 credits)

This class consists of research, discussion, and practice on contemporary figurative and body art issues. Projects throughout the semester explore different sculptural working methods, processes, and techniques including armature, traditional materials, molding/casting, and form building. Outcome of student work is focused on understanding of human gesture and individual expression.

Prerequisites: ART 145

Attributes: Undergraduate

ART 270 Spec. Topics & Ind. Study (SO) (3 credits)

Concentrated focus on a selected topic in Art History. Topic and content vary from semester to semester. Course may be taken twice for credit as the topic changes.

Prerequisites: ART 172 or ART 173

Attributes: GEP: Art/Literature, Undergraduate

ART 272 Darkroom Photography II (3 credits)

This course provides a continuation or review of film-based camera and darkroom techniques while introducing more advanced and experimental development. Topics include archival printing, advanced exposure controls, experimental camera work, and darkroom print manipulation. Slide presentations of master photographers will illustrate the flexibility of the medium and enable students to develop visual analysis, as well as their own creative expression. Adjustable 35mm film cameras will be provided to any student who needs one. Art fee \$230.

Prerequisites: ART 172

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 273 Commercial Photography (3 credits)

In this advanced level photography studio course, students examine photographic illustration for various commercial applications, including: food, portraiture, still life and product. Professional studio lighting techniques are analyzed and applied. Advanced applications of digital capture will be explored within a studio context. Art fee \$230.

Prerequisites: ART 172 or ART 173

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 275 Experimental Digital Photo (3 credits)

In this advanced, photography course, students will investigate the physical nature of photography. Students will explore alternative digital printing techniques on a variety of materials including but not limited to: fabric, wood, metal, glass and plastic. Moving beyond the traditional flat picture plane and exploring photography as part of sculpture and installation, is an important part of this course. Additionally, students will be introduced to a multitude of ways of producing photographic subject matter and how these images contribute to and rely on contemporary photographic culture.

Prerequisites: ART 172 or ART 173

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 331 Works on Paper (3 credits)

In this course, students address more sophisticated problems in black and white composition, using graphite, charcoal, and ink. They then are introduced to color media appropriate for paper, pastel and aquarelle, investigate the interaction of drawing and photography, and experiment with collage techniques. The course presupposes that drawing is a significant medium in itself and that works on paper are not mere way-stations to other "heavier" media, such as painting or sculpture.

Attributes: GEP: Art/Literature, Undergraduate

ART 333 Drawing III (3 credits)

Drawing III is an intensive and rigorous study of drawing where students produce an enormous amount of work. The issues we investigate include: organizing your visual experience into a clear pictorial idea, recognizing and articulating the structure of a work, the relationships in tone and the uses of scale as an element. This course is directed to be a more personal exploration of drawing and images. Students will be encouraged to produce a series of related images.

Prerequisites: ART 233

Attributes: GEP: Art/Literature, Undergraduate

ART 335 Painting III (3 credits)

This course concentrates on realizing convincing form, rigorous construction of the entire picture plane and the pursuit of finding an authentic vision. There is a focus on the scale of the paintings and tone relationships. We research what personal narrative is and how it could impact the image. The students produce paintings in a range of sizes including some very large works.

Prerequisites: ART 235

Attributes: GEP: Art/Literature, Undergraduate

ART 341 Sculpture III (3 credits)

Advanced skills in three-dimensional concepts and techniques.

Prerequisites: ART 141 or ART 241

Attributes: GEP: Art/Literature, Undergraduate

ART 344 Ceramics III (3 credits)

More complex work in ceramic sculpture, pottery-making or mosaics are studied in this class. It is expected that the students in this class will explore and develop their personal approach to both ceramic art and glazing/firing techniques. One other class in ceramics is required before enrolling in this class. The requirements are designed to develop a strong sense of the history in ceramics and the students' own skills in ceramic art.

Attributes: GEP: Art/Literature, Undergraduate

ART 370 Spec. Topics & Ind. Study (JR) (3 credits)

Concentrated focus on a selected topic in Studio Art. Topic and content vary from semester to semester. Course may be taken twice for credit as the topic changes.

Attributes: GEP: Art/Literature, Undergraduate

ART 372 DirectedProjects - Photography (3 credits)

This course provides students with an opportunity to build a comprehensive portfolio of photographic work. Students will begin with directed shooting assignments that lead to work which investigates the student's own personal vision. Lectures and presentations review the work of selected photographers, both historic and contemporary, for group discussion and analysis. With input from the instructor and the class, students develop their own photographic project in traditional, experimental, or digital, media, reflecting historical and/or contemporary genres of image making. \$230 Art Fee

Prerequisites: ART 172 or ART 173 or ART 272 or ART 273 or ART 275

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 373 Photo Essay/Docu Photo (3 credits)

This course is an introduction to the tradition of documentary photography. Topics will emphasize why people photograph, the stories photographs can tell us, and how photographs can manipulate or evoke emotions. Presentations will include the work of master documentary photographers, both fine art and journalistic, enabling students to discuss and analyze social documentation as well as autobiographical documentation. Assignments will encourage students to look at their own world in a new way and allow them to choose their own subjects for a photographic essay.

Prerequisites: ART 273

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 374 Adv. Comm. Studio Photography (3 credits)

In this advanced level photography studio course, students will build upon skills learned in previous studio courses and continue to examine photographic illustration for various commercial applications, including: food, portraiture, fashion, still life and product. Advanced professional studio lighting techniques, such as strobe(flash) photography will be applied. This course investigates the versatility and creative potential of commercial photography and its role in Advertising and Marketing. All aspects of a commercial photographic business will be discussed. May be taken as an independent study with the instructor's permission during years when it is not regularly scheduled.

Prerequisites: ART 273 (may be taken concurrently)

Attributes: GEP: Art/Literature, Undergraduate

ART 444 Ceramics IV (3 credits)

More complex work in ceramic sculpture, pottery-making or mosaics is studied in this class. It is expected that the students in this class will explore and develop their personal approach to both ceramic art and glazing/firing techniques. One other class in ceramics is required before enrolling in this class. The requirements are designed to develop a strong sense of the history in ceramics and the students' own skills in ceramic art.

Attributes: GEP: Art/Literature, Undergraduate

ART 470 Spec Topics & Indep Study (SR) (3 credits)

Concentrated focus on a selected topic in art history or studio art. Topic and content vary from semester to semester. Course may be taken twice for credit as the topic changes.

Attributes: GEP: Art/Literature, Undergraduate

ART 491 Internship in the Arts I (3 credits)

Junior and Senior art majors may broaden their perspective by completing an approved internship in the arts. Work in industry, art studios, theatres, galleries and museums offers potential opportunities for internships. Students are expected to spend six to eight hours per week on site, and to maintain a weekly journal of their experiences and to secure a report by their immediate supervisor at mid semester and upon completion of the work. Prior approval by the chair is required.

Attributes: GEP: Art/Literature, Undergraduate

ART 492 Internship in the Arts II (3 credits)

Junior and Senior art majors may broaden their perspective by completing an approved internship in the arts. Work in industry, art studios, theatres, galleries and museums offers potential opportunities for internships. Students are expected to spend six to eight hours per week on site, and to maintain a weekly journal of their experiences and to secure a report by their immediate supervisor at mid semester and upon completion of the work. Prior approval by the chair is required.

Attributes: GEP: Art/Literature, Undergraduate

ART 493 Ind. Research in the Arts I (3 credits)

Students pursuing advanced independent projects, especially those in connection with departmental or university honors, may register for these courses under the direct mentorship of department faculty. Prior approval of both faculty mentor and chair required.

Attributes: GEP: Art/Literature, Undergraduate

ART 494 Ind. Research in the Arts II (3 credits)

Students pursuing advanced independent projects, especially those in connection with departmental or university honors, may register for these courses under the direct mentorship of department faculty. Prior approval of both faculty mentor and chair required.

Attributes: GEP: Art/Literature, Undergraduate

ART 495 Senior Project I (Capstone) (3 credits)

In the first segment of this advanced level two-semester course students focus on developing a cohesive body of work in a medium and subject matter of their choosing. This course culminates with a senior thesis exhibition. (Art Education majors may, but are not required to complete the Senior Project courses. Instead those students may take two additional Art courses. Art minors are also able to take this two-semester class. Art fee \$230.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ART 496 Senior Project II (Capstone) (3 credits)

In the second half of this advanced level two-semester course, students focus on professional business skills related to Art. Students are introduced to artists and industry experts via field trips to New York and Philadelphia. Developing a variety of written professional materials is integral to the course. This course culminates with a senior thesis exhibition. (Art Education majors may, but are not required to complete the Senior Project courses. Instead those students may take two additional Art courses. Art minors are also able to take this two-semester class.) Art fee \$230.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ART 497 Professional Practices Seminar (3 credits)

The class is a seminar with practical applications. It is part laboratory for hands-on projects and part discussion group. Projects include: creation of a professional website, creation of a professional resume and creation of writing samples, application for a grant and public speaking. Class trips to galleries and museums will form the basis for discussions about contemporary art and for critical writing assignments. Topics under discussion include: the transition from student to professional, job searches, gallery contracts, grant applications, graduate school options and trends in contemporary art. Class attendance and participation are mandatory. By the end of the semester, students will have a website for their work, a resume, an artist statement and writing samples. They will know how to apply for a grant and they will be aware of the possibilities for employment and exhibition in the arts. The class is aimed at Art majors, but those outside the major will also find it useful.

Attributes: GEP: Art/Literature, Undergraduate

Art History (ARH)

ARH 101 Intro to Global Art History I (3 credits)

A survey of the visual arts and architecture from a global perspective. Students are introduced to a wide range of artistic practices, styles, and media from many major periods throughout history, and will examine the way visual culture both reflects and influences the ideas and values of the societies that produce it. The course covers material such as prehistoric cave painting; funerary art from ancient Egypt; temple architecture and sculpture dedicated to the gods and goddesses of ancient Greece and Rome; the development of Buddhist art and architecture in Asia; and the religious and secular art and architecture of medieval Europe.

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 102 Intro to Global Art History II (3 credits)

A survey of the visual arts and architecture from a global perspective. This is a continuation of "Introduction to a Global Art History I," but the two courses may be taken independently of one another. Students are introduced to a wide range of artistic practices, styles, and media, including painting, drawing, prints, photography, sculpture, installation art, performance art, film, video, and architecture, in Europe, the Americas, Asia, and Africa. The class examines many major periods and movements in the history of art, including material such as Renaissance painting in Italy and northern Europe; ukiyo-e woodblock prints in Japan; power figures in Africa; Impressionism in nineteenth-century France and America; Cubism and Abstract Expressionism in the early twentieth century; and contemporary art worldwide.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 103 Art of Africa/African Diaspora (3 credits)

This course will focus on the rich history of the art and architecture of Africa and the African diaspora. It will take advantage of the strong collection of African art at Saint Joseph's University, as well as other collections in the Philadelphia area.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ARH 104 History of Global Architecture (3 credits)

This course introduces students to the history of architecture - its major figures, works, movements, and historical eras. It encourages students to analyze major buildings within a broader context and challenges them to reflect on the cultural and political implications of the built environment. Students will gain familiarity with the most significant architectural styles, structural approaches, building materials, and technological innovations that have shaped architecture throughout human history.

Prerequisites: ENG 101

Attributes: American Studies Course, CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ARH 105 East Asian Art & Architecture (3 credits)

This course introduces students to the visual culture of East Asia from prehistory to the present, viewed through the lens of history, literature, and religion. Topics of particular focus will include ancestor worship in ancient China; the intersection of Buddhism with art and architecture; calligraphy as an art form; the illustration of *The Tale of Genji* and Heian court culture; class, gender, and ukiyo-e (woodblock prints); popular art such as manga and anime, and trends in contemporary Asian art of the late twentieth and early twenty-first centuries. We will also discuss the idea of cultural interaction and appropriation between China, Korea, Japan, and the West, as well as issues surrounding the collection and display of East Asian art in America. Students are given the opportunity to see relevant works of art in collections in the Philadelphia region.

Attributes: Art History Course, Asian Studies Course, CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ARH 106 Latin American Art & Architect (3 credits)

This course examines the visual arts of ancient, colonial, and modern Latin America. It encompasses the study of painting, sculpture, decorative arts and architecture from Mesoamerica, Central America, South America and the Caribbean. We also address issues critical to discussions of the arts of Latin America, such as preconceptions about the political and religious roles in art, appropriation and adaptation of western cultures, the incorporation and relationship with European/American art theory and methods, and the reevaluation of Latin American art today. Students are given the exciting opportunity to examine works of art from Saint Joseph's University's important collection of colonial Spanish American art as well as collections in nearby museums.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

ARH 107 Women, Gender, and Art (3 credits)

This course offers a survey of art history with an emphasis on gender. It will consider how gender informs the production, reception, and cultural understanding of art and imagery. Students will consider how gender is relevant to the creation and study of arts and culture. We will study artists who have used art to effect social change. Exploring feminist approaches to art historical study, we will analyze perceptions of gender through visual culture and personal experience. We will examine the ways that certain ideals of masculinity and femininity are represented in art and its history to gain insight into gender performance and sexual identity both in past periods and in contemporary society.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Diversity Course, Gender Studies Course, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ARH 108 Traditions of Art/BarnesMethod (3 credits)

This course is offered by the Barnes Foundation and will count toward the Art History major or minor. One of the oldest forms of expression and communication, art is more enjoyable when you understand its visual language and more meaningful when you appreciate its relationship to everyday experiences. Learn the aesthetic principles that underlie art.

Attributes: Art History Course, Undergraduate

ARH 109 Elements of Art/Barnes Method (3 credits)

This course is offered by the Barnes Foundation and it will count toward the Art History major or minor. Art is a visual record of artists' perceptions throughout time. Focusing on developments in the art of western Europe, this class explores how traditions influence one another, how artists learn and adapt traditions, and how modern art evolved in the 19th and 20th centuries.

Attributes: Undergraduate

ARH 110 Art and Medicine (3 credits)

This course focuses on artists who explore and employ medicine in their work. Possible images for analysis include works by Leonardo da Vinci, Thomas Eakins, and Hannah Wilke, as well as visual depictions of world health crises in the media. Students will look at how a broad range of artists has envisioned medicine, disease, and deviance, and their related dialogue with constructions of race, class, gender, and sexuality. The course will encourage students to think critically about the many intersections between art and medicine throughout history. It also will touch upon how medical professionals are increasingly receiving art history training and why. The chronological parameters of the course will vary according to who is teaching it.

Attributes: GEP: Art/Literature, Undergraduate

ARH 111 Art & Arch of Islamic World (3 credits)

This course will cover the rich legacy of Islamic art and architecture from the seventh century to the present, including the architecture and decoration of buildings ranging from mosques to palaces, illuminated manuscripts of all sorts, luxury objects such as metalwork and ivories, and more. We will consider the religious, political, and aesthetic contexts of monuments produced in the Arab Middle East, Iran, India, Turkey, North Africa, Spain, and beyond. We will also consider issues such as contemporary art, the collecting of Islamic art in Western museums, and the effect of iconoclasm on cultural production and historic preservation. *Attributes:* CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ARH 115 Italy Through Art (3 credits)

Italy Through Art, The Making of Modern Rome: Conducted in Rome, this course introduces students to the visual language of art, while providing an enriching cultural experience. The eternal city is an expansive, open-air museum where ancient and modern meet. Students will learn about Rome's artistic heritage while living amidst ancient ruins, baroque basilicas and contemporary monuments. As we view art objects first-hand, we will explore the making and meaning of Italian art, by addressing methodological issues including form and function, style, materials and technique. We begin with a consideration of ancient Rome, through direct experience with monuments that have survived centuries. Next, we explore the early developments of Christianity by visiting Roman basilicas and churches. Our excursion to Tuscany focuses on Renaissance humanism and Medici patronage. Upon return to Rome we examine Baroque masterpieces adorning Roman piazzas and churches. We conclude with art and architecture of the period after 1870, when Rome became the capital of Italy. The course is complemented by guest lectures and site visits to Roman museums, churches and palaces, as well as excursions to Assisi, Florence, Pompeii and Sorrento. Taught in English. No pre-requisites. Counts toward the major and minor in art history, the Italian Studies major, the major and minor in Classical Studies, and the minor in Medieval, Renaissance, Reformation Studies. *Attributes:* Art History Course, Classical Studies Course, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ARH 150 Art & Architecture of Phila (3 credits)

Students will focus on a topic having to do with the history of art and architecture. The class will include field trips on campus and in Philadelphia. Besides learning about artists and their works, students will hone their reading, writing, speaking and research skills, as they become acquainted with the university.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

ARH 170 Special Topics in Art History (3 credits)

Concentrated focus on a selected topic in Art History at an introductory level.

Attributes: Undergraduate

ARH 178 Art History & Photography: Italy (3 credits)

This Art study tour will have a combined emphasis on the history of Italian Renaissance art and the practice of photography. Through travel to the Italian cities of Venice, Florence, and Rome students will have the opportunity to explore the great works of art and architecture that defined the Renaissance in Italy - St. Mark's Square, the Uffizi, the Sistine Chapel and more. They will also spend time developing photographic skills as they explore these cities with an eye toward creating their own photo essay. Travel will be over Spring Break. No prior experience in either art history or photography is required.

Attributes: Undergraduate

ARH 180 Encountering Mystery (3 credits)

This course investigates the relationship between art, religious belief structures, and mystical experience. With a number of texts from Comparative Religion and Art Theory as backdrop, the lectures, discussions, and papers will involve presentations of art and architecture which circumscribe religious belief structures as well as expressions of spiritual conviction. Discussions of the essential elements of the I-am-spiritual-but-not-religious mindset will expose contrasting experiences of the *mysterium tremendum et fascinans*, the "numinous" wholly Other. Reflection on experience will lead to a stronger ability to express one's own attitudes about the scientific mindset and the creative expression of spiritual ideas and ideals.

Attributes: GEP: Art/Literature, Undergraduate

ARH 202 Medvl Art Ctcombs to Cthdrals (3 credits)

This course examines the art and architecture of the Middle Ages across a broad chronological and geographic scope, from the late Roman empire through the late Gothic period (c. 250-1500), including western Europe, Byzantium, and the Islamic world. We will study the painting, sculpture, architecture, stained glass, metalwork, and manuscripts produced by the diverse cultures during this period in terms of materials and methods of production, style, and iconography. We will also pay special attention to the historical context for the creation and reception of medieval art, including issues of patronage, politics, gender, cross-cultural interactions, and the multivalent purposes of images and buildings during the Middle Ages.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Irish Studies Course, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ARH 203 Renaissance Art & Architecture (3 credits)

This course analyzes key works of art and architecture and art historical trends from the period of the 13th to 16th century. The focus of our exploration is on the art of Europe, with a particular emphasis on Italy, Spain, and the Netherlands. We discuss the careers and works of artists such as Michelangelo, Leonardo da Vinci, and Albrecht Dürer. We also explore the social and historical context of the art they produced, including issues of patronage, gender, and audience.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ARH 204 Baroque Art and Architecture (3 credits)

This course analyzes key monuments and art historical trends from the late 16th century to the mid-18th century. The focus of our exploration is on the art of Europe, with a particular emphasis on Italy, Spain, and the Netherlands. We discuss the careers and works of artists such as Caravaggio, Gianlorenzo Bernini, Artemisia Gentileschi, and Jan Vermeer, and also explore the social and historical context of the art they produced. We will also discuss the art of Viceregal Latin America.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ARH 205 Revolution to Realism 1780-1880 (3 credits)

From the power of Neoclassicism to the decadence of the fin-de-siècle, painters, sculptors, and architects challenged tradition and transformed art during the dynamic and often turbulent years between 1780 and 1880. The death of the revolutionary hero, the search for spiritual meaning, the "rape" of the countryside by industrialism, the anxious masculinity of romanticism, and the emergence of such conceptions as "Orientalism" and nationalism are some of the themes that are addressed through the art of this period. Students study the careers of such artists as David, Delacroix, Ingres, Gericault, Constable, Turner, and Goya, and the radical landscape painting of the mid-century that foreshadowed Impressionism. Themes explored include gender and sexuality, patronage, and political censorship, and we focus on the social and political contexts in which works were produced, exhibited, and understood.

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 206 Impressionism & Post-Impress (3 credits)

This course examines art and architecture in Europe and the United States during the 19th and early 20th centuries. This was a period of dramatic social and political turmoil, unprecedented advancements in technology and science, and incredible innovation and creativity, and artists responded in various ways to what seemed an ever-changing and uncertain world. We will explore the works of artists such as Manet, Monet, Degas, Cassatt, Seurat, and van Gogh, to name just a few, in light of events such as war and revolution, industrialization, global expansion and colonialism, and changes in the art world. We will consider the reception of the work of these artists by their contemporaries and by later audiences, and examine these works within their wider artistic, cultural, political, and social contexts.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 207 American Art & Architecture (3 credits)

This course offers a survey of the history of American art and architecture. Organized around important episodes in American history, including the Civil War, the Harlem Renaissance, and the Civil Rights Movement, this course considers such topics as the role of gender and racial identity in the content, authorship, and reception of artworks. The class examines major movements in the history of American art, with an emphasis on works that historically have been overlooked because of the race, gender, religion, nationality, and/or ethnicity of the artist or architect. In an effort to show the currency and relevance of these issues, and to scrutinize how art institutions treat (or ignore) issues of diversity, the course requires students to visit area museums and galleries.

Attributes: American Studies Course, CCC: F&P Arts, Design & Creative, CCC: Diversity, GEP: Diversity Course, GEP: Art/Literature, Undergraduate

ARH 208 Modern Art & Architecture (3 credits)

This course offers a survey of the history of European and American art and architecture, with a focus on the first half of the 20th century. Students are introduced to a wide range of artistic practices, styles, and media, including painting, drawing, prints, photography, sculpture, film and architecture. The class examines major movements within the history of art, including such artists as Pablo Picasso, Marcel Duchamp, Frida Kahlo, and Salvador Dalí. It takes advantage of the many rich collections of art and architecture in the Philadelphia area by visiting these institutions and analyzing works firsthand.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ARH 209 Contemporary Art & Architect (3 credits)

The period from the mid-twentieth century to the present is one of exceptional political, social, cultural, and technological upheaval. This course offers a survey of European and American painting, drawing, prints, photography, sculpture, installation art, performance art, film, video, and architecture within the context of these changes. Topics covered include debates regarding abstraction and figuration, as well as feminism, primitivism, modernism, postmodernism, and the impact of such factors as technology, religion, and war on the creation and reception of art.

Prerequisites: ENG 101

Attributes: American Studies Course, CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

ARH 210 Museum Studies (3 credits)

This course is an introduction to museum history, theory, and practice. Through case studies and key texts, it explores the evolving structure and mission of the museum and its impact on our understanding of art, society, and culture. Additionally, students will gain insight into the various jobs and responsibilities at museums. A key component of this course is immersive, on-site learning experiences that take advantage of the distinguished art institutions available in the Philadelphia region. Although centered on art museums, this course considers a broad range of museum practices and related fields.

Prerequisites: ENG 101

Attributes: American Studies Course, Art History Course, CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Diversity Course, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ARH 211 Art & Magazines (3 credits)

Artists have been involved with magazines since they first appeared - designing covers, illustrating stories, designing pages, and even making their own. With an emphasis on the 19th through the 21st century, this course explores artists' involvement in periodicals, including artists' journals, contributions to mass circulation magazines, and underground "zines." It explores how serials have helped artists disseminate their ideas, shaped their artistic beliefs, and informed what kind of images they made. It also considers why artists have accepted commissions from commercial periodicals like *Fortune* and *The New Yorker*. The course examines a wide range of artists, including not only photographers and "fine" artists, but also graphic designers and those hired as illustrators. It will delve into the material nature of magazines, from paper to digital, and analyze how magazines interrogate entrenched divisions between "high" and "low." As part of the class, students will have the option to experiment with making their own magazines.

Attributes: GEP: Art/Literature, Undergraduate

ARH 212 History of Photography (3 credits)

Photography is a widely used but relatively little understood medium. This course offers a survey of photography in the United States and Europe from its invention to the present. We examine the ways in which photography has been employed by amateurs, artists, anthropologists, politicians, and scientists for a wide range of purposes. We also examine how the medium has affected portraiture, painting, documentation, journalism, and advertising. The class considers photography in the context of continuing debates regarding the nature of reality and truth, photography's status as art or document, subjectivity versus objectivity, and issues of originality, authenticity, and power.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 213 Art & Pilgr Parthenon to Disney (3 credits)

This course explores all sorts of journeys, with a focus on the emphasis on pilgrimage in different religious traditions, but also travel for other reasons such as warfare and exploration, or even touristic pilgrimages to places like baseball stadiums, or Disney parks around the world. We will pay particular attention to how these experiences are both reflected and shaped by material culture. While the primary focus of the course will be the pilgrimage experiences of the medieval Christian, we will also examine pilgrimage in the ancient world, Judaism, Islam, Buddhism, and Hinduism. In addition to looking at the art and architecture of particular pilgrimage sites such as the Church of the Holy Sepulchre in Jerusalem, Santiago de Compostela in northern Spain, and Canterbury Cathedral in England, we will also discuss the significance of the cult of the saints in medieval religious belief and practice; relics and reliquaries; objects associated with pilgrims such as pilgrim badges; the Crusades as a form of pilgrimage; memory and spiritual journeys; and representations of pilgrims and travelers in all forms of visual culture.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate

ARH 214 Intro to Art Conservation (3 credits)

This course introduces the field of art conservation. Students will be introduced to the methods used to study and analyze art objects, types of treatment, and strategies to prevent damage to objects. The various activities of conservators in the museum will also be presented, including preventive conservation, exhibit installation, and object treatment.

Students will have an opportunity to study an object in the collection of the Frances M. Maguire Art Museum and produce a condition report.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 215 Museum Ops, Mgmt & Professions (3 credits)

This course is an introduction into the organization, management, and professions of museums in the U.S. After a brief introduction to museum history, theory and practice, students will learn about various types of museums and major aspects of museum operations. A key component of this course is immersive, on-site learning experiences that take advantage of the museums available in the Philadelphia region, especially the Frances M. Maguire Art Museum. These include guest lectures from museum staff as well as field trips to local institutions. The course is organized broadly into the major initiatives and functions of museums today, with the goal of providing critical insight into current museum practices and professions.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 216 Curating an Exhibition (3 credits)

Students will participate in various aspects of mounting an exhibition, including learning background information about the exhibition theme, researching objects, writing labels, designing the exhibition space, and mounting the show, usually in the Frances M. Maguire Art Museum. This course is open to any SJU student but will be especially pertinent to Art History majors and minors, and Museum Studies minors.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 221 Rebels&Revolutionaries:Art&Lit (3 credits)

In this course we will explore the works of 20th- and 21st-century visual artists and writers who have rebelled against the status quo and revolutionized the course of visual art and literature. We will delve into their texts and images through readings, discussions, and field trips, and consider what they teach us about our own time and our role in it.

Attributes: CCC: F&P Arts, Design & Creative, English Area 4- British/Irish, GEP: Art/Literature, Honors Course, Irish Studies Course, Undergraduate

ARH 270 Special Topics in Art History (3 credits)

Concentrated focus on a selected topic in Art History at an introductory level.

Attributes: Undergraduate

ARH 301 Mystery&Monument:Anc Greece (3 credits)

This course examines the material culture remains of various cities prominent in the history of Greece. Knossos, the main city of the island of Crete, Troy, and Mycenae are among the sites studied for their importance in the Bronze Age (3000-1100 BCE). After a detailed study of Greek architecture and the evolution of key building types such as the temple, the stoa, and the theater, students explore the material remains of Olympia, Delphi, and Athens. The myths associated with these cities are also included.

Attributes: Art History Course, GEP: Art/Literature, Undergraduate

ARH 302 Mystery&Monument:Anc Rome (3 credits)

An introduction to the art and archaeology of Roman Italy, which will explore through digital images the major surviving monuments of Rome and its environs, of the Etruscans, and of other famous sites in Italy.

Attributes: GEP: Art/Literature, Undergraduate

ARH 480 Art History Research Seminar (3 credits)

This course is designed to prepare Art History majors and minors for graduate study and professional employment after graduation. It is optional for minors and required for majors (who may take it in either their junior or senior year). It offers students the opportunity to apply what they have learned in their art history and related courses to a project focused on a topic of their choosing. This topic will be the basis of an extensive research paper and a public presentation. Working closely with fellow classmates, the professor, and additional mentors, students will share and develop their ideas while honing their research, analytical, and writing skills. Outside readings will provide students with various methodologies to consider while pursuing their work. Students also will be exposed to various art history-related professions and offered guidance regarding the practical aspects of pursuing graduate school and professional employment.

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

ARH 481 Museum Internship (3 credits)

This course is optional, but recommended for Art History majors. It is open to Art History minors upon consultation with the Chair. Students work 10 hours per week (total 130 hours), write a resume and sample cover letter, keep a journal, and attend and write about an SJU Career Development Center event. Students who complete the requirements will receive 3 credits for one upper-division Art History course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

Arts & Sciences (ANS)

ANS 170 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed as an introductory level course or as a course primarily for but not limited to first-year students.

Attributes: Undergraduate

ANS 175 McConnell Scholars Success Sem (1 credit)

Our class is designed to provide students with the tools needed to thrive and succeed at SJU and in the McConnell Scholars Program. We will focus on the development and application of college-level study skills, success strategies, and the use of campus resources that enhance individual student achievement. We will investigate the variety of offices, resources, and opportunities available to students across campus.

Attributes: Undergraduate

ANS 190 Stem Squared Seminar (0 credits)

Topics and agenda may include university and outside speakers, and discussion of special topics for students majoring in the natural sciences, mathematics and computer science.

Attributes: Undergraduate

ANS 270 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to sophomores.

Attributes: Undergraduate

ANS 275 McConnell Scholars I (3 credits)

This is the first of a two-course sequence for students admitted into the McConnell Scholars Program. We will examine a range of topics, concepts, theories, and practices relevant to gender justice and gender equity across various academic disciplines. Our goal is to study the current scholarship, ideas, and trends that inform conversations about gender justice; and analyze the ways in which theoretical and academic knowledge can be applied to gender equity initiatives within our communities.

Attributes: Undergraduate

ANS 290 Professional Prep Seminar (1 credit)

What can you do with a degree from a program in the College of Arts and Sciences? Do you know how to search for an internship or a job? And, are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance your knowledge about internships and careers and help you build practical skills through a series of steps and events throughout the semester. This one-credit course meets once a week throughout the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication, and networking/interviewing.

Attributes: Undergraduate

ANS 370 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to juniors.

Attributes: Undergraduate

ANS 375 McConnell Scholars II (3 credits)

This is the second of a two-course sequence for students admitted into the McConnell Scholars Program. We will build on the knowledge and skills learned in ANS 275 and further examine topics, concepts, theories, and practices relevant to gender justice and gender equity across academic disciplines. In addition, we will study various ways for understanding leadership, mentoring networks, and community-building through the lens of gender justice and gender equity.

Prerequisites: ANS 275

Attributes: Undergraduate

ANS 380 Opioid Ed & Prevention Seminar (0 credits)

The Opioid Prevention and Education seminar is an undergraduate-level course designed to create future career leaders who are equipped with the knowledge and experience to face the current opioid epidemic. The curriculum consists of Training, Academic, and Experiential components to expose students to a wide range of educational modalities on this topic. Throughout the academic year, various speakers, training programs, and experiential opportunities will be offered that challenge students to consider all dimensions of this complex crisis and think critically about future solutions.

Attributes: Undergraduate

ANS 390 McNulty Seminar I (0 credits)

Topics and agenda may include outside speakers, local speakers, and discussion of special topics in science, mathematics and computer science, especially as they relate to women in these and associated areas. McNulty Program Scholars and Fellows are required to attend each semester.

Attributes: Undergraduate

ANS 391 McNulty Seminar II (0 credits)

Topics and agenda may include outside speakers, local speakers, and discussion of special topics in science, mathematics and computer science, especially as they relate to women in these and associated areas. McNulty Program Scholars and Fellows are required to attend each semester.

Attributes: Undergraduate

ANS 392 CAS Minternship (1 credit)

These supervised mini-internships provide students an opportunity to intern in offices, initiatives, and projects across the SJU campus that are related to professional skill-building. Students will: (1) develop writing, communication, and interpersonal skills; (2) examine various venues through which they can apply their knowledge and skills; and (3) integrate academic learning into professional life. Registration and placement require Chair/Instructor approval. This course is repeatable for credit for a total of 3 times.

Attributes: Undergraduate

ANS 470 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to seniors.

Attributes: Undergraduate

ANS 475 McConnell Scholar Special Proj (3 credits)

This course is for McConnell Scholars students who want to develop an experiential learning project in consultation with and approval from the Program Director(s). Projects will focus on a particular topic, activity, and/or initiative related to gender justice and/or gender equity; and students will clearly demonstrate an application of the scholarship relevant to the project. Students will have the opportunity to practice and share the knowledge they have gained by engaging in discussions with other McConnell Scholars students.

Prerequisites: ANS 275 or ANS 375

Attributes: Undergraduate

ANS 490 CAS Internship I (3 credits)

This course supports student internships in a variety of interdisciplinary settings, where students will complete a total of 130 hours of site work, keep a journal, and develop career readiness competencies.

Attributes: Undergraduate

ANS 491 CAS Internship II (3 credits)

This course supports advanced student internships in a variety of interdisciplinary settings, where students will complete a total of 130 hours of site work, keep a journal, and develop career readiness competencies.

Attributes: Undergraduate

ANS 492 CAS Internship Experience (3 credits)

This course supports students who have previously engaged in internship activities in a variety of interdisciplinary settings, where students will engage in learning experiences about those experiences and develop career readiness competencies.

ANS 494 CAS Independent Research I (3 credits)

Faculty directed independent reading and research. May stand alone or precede ANS 495.

Attributes: Undergraduate

ANS 495 CAS Independent Research II (3 credits)

Second semester of a yearlong faculty directed independent reading and research project.

Attributes: Undergraduate

ANS 570 Special Topics (3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to graduate students.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

ANS 591 McNulty Seminar I (0 credits)

Topics and agenda may include outside speakers, local speakers, and discussion of special topics in science, mathematics and computer science, especially as they relate to women in these and associated areas. McNulty Program Scholars and Fellows are required to attend each semester.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Biology (BIO)

BIO 101 Bio I: Cells (4 credits)

The study of the structure and function of representative prokaryotic and eukaryotic cells. Chemical makeup, organelle interactions, energy producing and biosynthetic reactions will be stressed. Three lecture periods, one three-hour laboratory period (BIO 101L or BIO 150L). First of three courses in the core program.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

BIO 101L Bio I: Cells Lab (0 credits)

Students who register for BIO 101 must also register for a BIO 101 laboratory. For example, if you register for BIO 101 you must, at the same time, register for a section of BIO 101L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

BIO 102 Bio II: Genetics (4 credits)

The study of heredity and the mechanism of transmission of genetic information in biological systems. The course material is approached from the population, organismic, and biochemical perspectives. Three lecture periods, one three-hour laboratory period (BIO 102L or BIO 151L).

Prerequisites: BIO 101

Attributes: GEP: Science Course w/Lab, Undergraduate

BIO 102L Bio II: Genetics Lab (0 credits)

Students who register for BIO 102 must also register for a BIO 102 laboratory. For example, if you register for BIO 102 you must, at the same time, register for a section of BIO 102L.

Attributes: Undergraduate

BIO 105 Human Biology (3 credits)

This course is an introductory study of the biology of the human body.

Topics include overviews of the circulatory, digestive, respiratory, nervous, reproductive, excretory, and musculoskeletal systems.

Laboratory activities will provide the student with practical experiences in understanding how the human body is organized and how it functions.

Students will also address current ethical concerns in the field of biology as they apply to the human body. Students who register for BIO 105 must

also register for a BIO 105 laboratory. For example, if you register for BIO 105 you must, at the same time, register for a section of BIO 105L.

Attributes: Undergraduate

BIO 105L Human Biology Lab (0 credits)

Students who register for BIO 105 must also register for a BIO 105 laboratory. For example, if you register for BIO 105 you must, at the same time, register for a section of BIO 105L.

BIO 150L Bio I: Cells Lab Phage (0 credits)

A research-based laboratory for first year students accompanying BIO 101 involving isolation, purification, and preliminary genomic characterization of bacteriophages, viruses that infect bacteria. Open to first year students majoring in Biology, Biomedical Science, Biochemistry, Chemical Biology, Environmental Science, or Medical Laboratory Science. Admission by application. Students are expected to continue with BIO 151L in the spring. Two 120-minute lab periods.

Attributes: CCC: Natural Science, First-Year Seminar, GEP: Natural Science, Undergraduate

BIO 151L Phage Lab (0 credits)

A research-based laboratory for first year students accompanying BIO 102. Students work "in silico" (using computers) to annotate bacteriophage genomes isolated the previous year by students in BIO 150L. Complete annotated genomes will be submitted to GenBank. Open to first year students majoring in Biology, Biomedical Science, Biochemistry, Chemical Biology, Environmental Science, or Medical Laboratory Science. Admission by application. Students are expected to continue with BIO 150L in the spring. Two 75-minute lab periods.

Prerequisites: BIO 150L

Attributes: First-Year Seminar, Undergraduate

BIO 160 Heredity and Evolution (3 credits)

A study of human genetics at three levels: human heredity and the inheritance of disease, genes and DNA, and human evolution. Includes discussion of how a cell uses its genetic information and how scientists study genes using genetic engineering techniques. Open to all students except those who have credit for BIO 102 or BIO 462 or BS 462.

Attributes: GEP: Natural Science, Undergraduate

BIO 161 Human Organism (3 credits)

A study of the basic principles of human anatomy, physiology, and genetics. The organization and function of the human body will be described with an appreciation of underlying genetic and evolutionary concepts. Open to all students except those who have credit for BIO 201 or BIO 202 or BIO 260 or BIO 310 or BS 201 or BS 310.

Attributes: GEP: Natural Science, Undergraduate

BIO 162 Plants and Civilization (3 credits)

This course will examine plants in the context of their importance to people. Plants used for food, fiber, medicine, and recreation will be included. Open to all students. Biology majors need permission of the Biology Chair to take this course.

Restrictions: Students cannot enroll who have a major in Biochemistry, Biology, Biomedical Sciences, Chemistry, Chemical Biology, Environmental Science, Medical Laboratory Science or Physics.

Attributes: GEP: Natural Science, Undergraduate

BIO 165 Exploring the Living World (4 credits)

Students in this course will learn about the scientific world view and experience the methods of science in the context of the life sciences. This course is designed for students not planning to major in science. The course includes a survey of plant and animal life, an overview of bioenergetics, and selected topics in genetics and evolutionary biology. Three lecture periods, one three-hour laboratory period (BIO 165).

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

BIO 165L Exp. Living World Lab (0 credits)

Students who register for BIO 165 must also register for a BIO 165 laboratory. For example, if you register for BIO 165 you must, at the same time, register for a section of BIO 165L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

BIO 175 A&P for Nursing & Allied Health (4 credits)

This course studies the fundamental elements of human structure and function including cellular physiology, tissue organization, integumentary system, skeletal system, muscular system, nervous system and senses. Unifying themes, such as homeostasis, will be covered. Students who register for BIO 175 must also register for a BIO 175 laboratory. For example, if you register for BIO 175 you must, at the same time, register for a section of BIO 175L.

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography, Cardiovascular Technology, Diagnostic Medical Sonography, Nuclear Medical Technology, Nursing, Radiography, Respiratory Care, Surgical Technology or Vascular Sonography.

BIO 175L A&P Nursing & Allied Health Lab (0 credits)

The laboratory component provides hands-on experiences, which encourage critical thinking, the understanding of scientific methodology and the application of scientific principles as presented in the lecture component of Human Anatomy & Physiology I. Students who register for BIO 175 must also register for a BIO 175 laboratory. For example, if you register for BIO 175 you must, at the same time, register for a section of BIO 175L.

BIO 176 A&P Nursing & Allied Health II (4 credits)

This course is a continuation of Human Anatomy & Physiology I (BIO 175) and includes the cardiovascular system, lymphatic system and immunity, respiratory system, digestive system and metabolism, renal system, fluid/electrolyte and acid/base balance and reproductive system. Unifying themes, such as homeostasis, will be expanded upon. Students who register for BIO 176 must also register for a BIO 176 laboratory. For example, if you register for BIO 176 you must, at the same time, register for a section of BIO 176L.

Prerequisites: BIO 175

BIO 176L A&P Nursing & Allied Health II Lab (0 credits)

The laboratory component provides hands-on experiences, which encourage critical thinking, the understanding of scientific methodology and the application of scientific principles as presented in the lecture component of Human Anatomy & Physiology II. Students who register for BIO 176 must also register for a BIO 176 laboratory. For example, if you register for BIO 176 you must, at the same time, register for a section of BIO 176L.

BIO 185 Microbio Nursing & Allied Health (4 credits)

This course provides an introduction to microbiology with an emphasis on the basic principles and concepts including anatomy, classification, physiology and practical uses of microorganisms. Students will develop an understanding of how microorganisms affect our lives by causing disease, destroying things that we consider important or contributing to improving our quality of life. The importance of the prevention of the transmission of infections will be emphasized. Students who register for BIO 185 must also register for a BIO 185 laboratory. For example, if you register for BIO 185 you must, at the same time, register for a section of BIO 185L.

Prerequisites: BIO 105 or BIO 175

Restrictions: Enrollment is limited to students with a major in Nursing.

Attributes: CCC: Natural Science, Undergraduate

BIO 185L Microbio Nursing & Allied Lab (0 credits)

Students who register for BIO 185 must also register for a BIO 185 laboratory. For example, if you register for BIO 185 you must, at the same time, register for a section of BIO 185L.

Attributes: CCC: Natural Science, Undergraduate

BIO 201 Bio III: Organismic Biology (4 credits)

A survey of all living things followed by more detailed study of plants and animals. Topics include development, nutrition, locomotion, transport, and homeostatic controls. Three lecture periods, one three-hour laboratory period (BIO 201L). This course is NOT required for legacy University of the Sciences students.

Prerequisites: BIO 102

Attributes: GEP: Science Course w/Lab, Undergraduate

BIO 201L Bio III: Organismic Biol Lab (0 credits)

Students who register for BIO 201 must also register for a BIO 201 laboratory. For example, if you register for BIO 201 you must, at the same time, register for a section of BIO 201L.

Attributes: Undergraduate

BIO 218 Hematology (3 credits)

Study of the blood and blood-forming tissues with emphasis on the cellular morphology and hematopoietic mechanisms of the red blood cells, white blood cells, and platelets. Also covers a wide variety of clinical disorders, particularly those involving abnormally formed cellular elements and coagulation. Students who register for BIO 218 must also register for a BIO 218 lab section. For example, if you register for BIO 218 you must, at the same time, register for a section of BIO 218L.

Prerequisites: BS 119 or BIO 102 or BIO 119 or BS 133 or BIO 133

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 218L Hematology Lab (1 credit)

Students who register for BIO 218 must also register for a BIO 218 lab section. For example, if you register for BIO 218 you must, at the same time, register for a section of BIO 218L.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 219 Nutrition (3 credits)

A basic course in understanding nutrition and its implications in the maintenance of good health.

Prerequisites: BS 119 or BIO 102 or BIO 119 or BS 133 or BIO 133

Attributes: Undergraduate

BIO 230 Basic Concepts & Proc MLS (4 credits)

Fundamentals in medical laboratory sciences. Students who register for BIO 230 must also register for BIO 230 lab section. For example, if you register for BIO 230 you must, at the same time, register for a section of BIO 230L.

Prerequisites: BS 119 or BIO 102 or BIO 119 or BS 133 or BIO 133

Attributes: Undergraduate

BIO 230L Basic Concepts Med Lab Sci Lab (0 credits)

Students who register for BIO 230 must also register for BIO 230 lab section. For example, if you register for BIO 230 you must, at the same time, register for a section of BIO 230L.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 240 Introduction to Immunology (3 credits)

This course will cover principles of immunology, both at the molecular and cellular level, and will address aspects of cell mediated immunity in health and disease. Emphasis will be placed on specific and non-specific immunity and how the systems interact with each other. Other aspects of immunology, such as cancer, autoimmunity, immunology tools and the mechanisms pathogens use to avoid the immune system, will be covered.

Prerequisites: BIO 105 or BIO 185 or BIO 176

BIO 260 Anat&Physiol for AI Hlth I (4 credits)

This course is designed for students needing preparation in human anatomy and physiology for allied health programs. Students may count either BIO 175 plus BIO 176, or BIO 260 plus BIO 261, or BIO 202 plus BIO 203, or BIO 310 plus BIO 311, or BIO 417 toward graduation, but not more than one such combination. Three 50-minute lecture periods and one three-hour lab period (BIO 260L).

Prerequisites: BIO 102 (may be taken concurrently) or BIO 119 or BIO 133 or BS 119 or BS 133

Attributes: Undergraduate

BIO 260L Anatomy & Physiology Lab I (0 credits)

Students who register for BIO 260 must also register for a BIO 260 lab section. For example, if you register for BIO 260 you must, at the same time, register for a section of BIO 260L.

Attributes: Undergraduate

BIO 261 Anat&Physiol for AI Hlth II (4 credits)

Continuation of BIO 260. This course is designed for students needing preparation in human anatomy and physiology for allied health programs. Students may count either BIO 175 plus BIO 176, or BIO 260 plus BIO 261, or BIO 202 plus BIO 203, or BIO 310 plus BIO 311, or BIO 417 toward graduation, but not more than one such combination. Three 50-minute lecture periods and one three-hour lab period (BIO 261L).

Prerequisites: BIO 260

Attributes: Undergraduate

BIO 261L Anatomy & Physiology Lab II (0 credits)

Students who register for BIO 261 must also register for a BIO 261L lab section. For example, if you register for BIO 261 you must, at the same time, register for a section of BIO 261L.

Attributes: Undergraduate

BIO 270 Clinical Micro (4 credits)

This course is designed for students needing preparation in microbiology as required for allied health programs. Not open to students who have taken BIO 185 or BIO 243 or BIO 348 or BIO 416 or BIO 422 or BIO 425 or BIO 453 or BS 244 or BS 342 or BS 343 or BS 347 or BS 348 or BS 350 or BS 375 or BS 453. Three 50-minute lecture periods and one three-hour lab period (BIO 270L).

Prerequisites: BIO 102 or BIO 119 or BS 119 or BIO 133 or BS 133

Attributes: Undergraduate

BIO 270L Clinical Microbiology Lab (0 credits)

Students who register for BIO 270 must also register for a BIO 270L lab section. For example, if you register for BIO 270 you must, at the same time, register for a section of BIO 270L.

Attributes: Undergraduate

BIO 290 Career Development Seminar (0 credits)

This seminar course is designed to enhance students' professional development, knowledge about careers, and practical career skills. By the end of the seminar, students will be able to identify career paths of interest and have the necessary tools to pursue them. This course is taken in the fall of the sophomore year for Biology and Biomedical Sciences majors.

Attributes: Undergraduate

BIO 310 Anatomy and Physiology I (3 credits)

A systemic approach to the structure and function of the human. Organ systems studied include the integumentary, skeletal, muscular, and nervous systems. Three lecture periods. Students may also take the BIO 202L Human Structure & Function I Lab (1 credit) concurrently with this lecture. Students may count either BIO 175 plus BIO 176, or BIO 202 plus BIO 203, or BIO 260 plus BIO 261, or BIO 310 plus BIO 311, or BIO 417 toward graduation, but not more than one such combination.

Prerequisites: (BIO 201 or BIO 243 or BS 243) and (CH 102 or CHM 125 or CH 112)

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 311 Anatomy and Physiology II (3 credits)

Continuation of BIO 310; systemic approach to the structure and function of the human. Organ systems studied include endocrine, circulatory, respiratory, digestive, and excretory systems. Three lecture periods. Students may also take the BIO 203L Human Structure & Function II Lab (1 credit) concurrently with this lecture. Students may count either BIO 175 plus BIO 176, or BIO 202 plus BIO 203, or BIO 260 plus BIO 261, or BIO 310 plus BIO 311, or BIO 417 toward graduation, but not more than one such combination.

Prerequisites: BIO 260 or BIO 310 or BIO 202 or BS 205 or BS 310

Attributes: Undergraduate

BIO 320 Science Communication&Outreach (1 credit)

Optional Service Learning course can be taken in conjunction with any Biology course. Guided experience in preparing and presenting hands-on science lessons to K-12 children. Time commitment is 3 hrs per week.

Attributes: Undergraduate

BIO 335 Virology (3 credits)

The study of bacterial, plant, and animal viruses is presented with an emphasis on animal virology. Viral taxonomy, mechanisms of viral reproduction and replication, and the pathology of selected viral families are presented.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 337 Pharmacognosy (3 credits)

This course aims to provide an in-depth perspective about the use of natural product as drugs. The course will cover the fundamentals of pharmacognosy, details on the phytomedicines used in pharmacy, chemistry of secondary metabolites of organisms used in drug therapies, characterization and standardization of phytomedicines and nutraceuticals and the use of natural products as complementary or alternative medicine.

Restrictions: Enrollment is limited to students with a major in Biological Studies, Biology, Biomedical Sciences, Chemical Biology, Environmental Science or Medical Laboratory Science.

Attributes: Undergraduate

BIO 348 Applied Clinical Microbiology (4 credits)

A survey of the various bacteria that cause human infections. The type of infection caused, portal of entry, molecular basis of the infection process, treatment, and laboratory identification are discussed for each group of organisms. Three hours of lecture and three hours of lab (BIO 348L). Students may count only one of the following courses towards their graduation requirements: BIO 348, BIO 270, BIO 416, BIO 422, BIO 425, BIO 453, BS 244, BS 342, BS 343, BS 347, BS 348, BS 350, BS 375, or BS 453.

Prerequisites: (BIO 201 or BIO 243 or BS 243) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Restrictions: Enrollment is limited to students with a major in Microbiology or Medical Laboratory Science.

Attributes: Undergraduate

BIO 348L Adv Clinical Microbio Lab (0 credits)

Students who register for BIO 348 must also register for a BIO 348L lab section. For example, if you register for BIO 348 you must, at the same time, register for a section of BIO 348L.

Restrictions: Enrollment is limited to students with a major in Microbiology or Medical Laboratory Science.

Attributes: Undergraduate

BIO 358 Principals &App of Immunology (3 credits)

Study of the principles and mechanisms of immunology and their applications to infection, hypersensitivity, autoimmunity, transplantation, cancer and AIDS. Students may count BIO 358 or BIO 415 towards their graduation requirements, but not both.

Prerequisites: (BIO 201 or BIO 243 or BS 243) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 360 God and Evolution (3 credits)

This course considers a major topic in academic discourse and society at large, the relationship between religion/theology and biological evolution. This course explores the thesis that the two can be compatible- including from an informed scientific point of view. Students in this course learn evolutionary biology, theological account of creation, and how they can be compatible. This course does not fulfill requirements for a Biology, Biomedical Science, or Medical Laboratory Science major or minor.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: GEP: Faith-Reason Course, Undergraduate

BIO 372 Aquatic Biology (4 credits)

A lecture and field course concerning the biological, physical, and chemical aspects of freshwater ecosystems. Includes collection, preservation, and recognition of aquatic organisms other than vertebrates and the study of those aspects of their biology that are important adaptations to aquatic life. Students who register for BIO 372 must also register for BIO 372L lab section. For example, if you register for BIO 372 you must, at the same time, register for a section of BIO 372L.

Prerequisites: (BIO 201 or BIO 243 or BS 243) and (CH 102 or CHM 125 or CHM 126 or CH 112)

Attributes: Undergraduate

BIO 372L Aquatic Biology Lab (0 credits)

Students who register for BIO 372 must also register for BIO 372L lab section. For example, if you register for BIO 372 you must, at the same time, register for a section of BIO 372L.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

BIO 376 Pathophysiology (3 credits)

This course examines the etiology, signs, symptoms, diagnosis, therapy, and prognosis of common disease states. Organized by system, the course will review the normal physiology then explore common pathologies within those systems. In addition, students will examine how disease affects the body as a whole.

BIO 380 Epidemiology (3 credits)

This course introduces the basic principles of epidemiology and the methods used to address public health problems. Descriptive and analytic epidemiology techniques used to investigate outbreaks will be covered.

Prerequisites: BIO 185 or BIO 240

BIO 390 Biology Seminar (0 credits)

Attendance at three seminars is required each semester during sophomore, junior, and senior years. Approved seminars are posted in the Department.

Restrictions: Enrollment is limited to students with a major in Biology or Biomedical Sciences.

Attributes: Undergraduate

BIO 400 Developmental Genetics (3 credits)

Students will learn about the principles governing plant and animal development and the underlying cellular and genetic mechanisms. This includes: gametogenesis and fertilization, sex determination, embryogenesis and early development, ectoderm development (nervous systems, skin and appendages), mesoderm development (muscle, bone, blood and cardiovascular), endoderm development (organogenesis, tube formation and reproduction) and an introduction to common developmental disorders. Students will read primary literature and learn about the techniques employed in developmental genetics research using model systems.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 401 Animal Behavior (4 credits)

The study of animals and their behaviors, with a strong emphasis on evolutionary relationships and ecology. Live animals will be studied in the classroom, laboratory, and field. Two 50-minute lecture periods, one four-hour laboratory period (BIO 41L). Students may only count one of the following courses towards their graduation requirements: BS 305 or BIO 305, or BIO 401.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 401L Animal Behavior Lab (0 credits)

Students who register for BIO 401 must also register for a BIO 401 laboratory. For example, if you register for BIO 401 you must, at the same time, register for a section of BIO 401L.

Attributes: Undergraduate

BIO 402 Advanced Cell Biology (4 credits)

An in-depth analysis of eukaryotic cell structure and function, including membrane structure and transport, cellular organelles, the cytoskeleton, and cell communication. Emphasis will be on experimental approaches to understanding concepts in cell biology. Two 50-minute lecture periods, one four-hour laboratory period (BIO 402L). Students may count only one of the following courses towards their graduation requirements: BIO 306, or BS 306, or BIO 402.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 402L Advanced Cell Biology Lab (0 credits)

Students who register for BIO 402 must also register for a BIO 402 laboratory. For example, if you register for BIO 402 you must, at the same time, register for a section of BIO 402L.

Attributes: Undergraduate

BIO 404 Biochemistry (3 credits)

An introduction to the chemistry of living systems. The study of important molecules, metabolic pathways, and control systems will be emphasized. Students may count only one of the following courses towards their graduation requirements: BIO 404, or CHM 340, or CHM 335, or CHM 341, or CHM 343, or CHM 346.

Prerequisites: (BIO 201 or BIO 119 or BIO 133 or BS 119 or BS 133) and (CHM 215 (may be taken concurrently) or CH 202 or CH 212) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 405 Biomechanics (4 credits)

The role of physics in biological systems and the organismal and super-organismal level. Lectures will cover a range of biomechanics disciplines, presenting underlying physical principles and their biological ramifications. Laboratories will provide experience with the experimental techniques available to measure forces relevant to biological systems. Two 75-minute lecture periods, one three-hour laboratory period (BIO 405L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112) and (PHY 101 or PHY 105 or PY 212 or PY 202)

Attributes: Undergraduate

BIO 405L Biomechanics Lab (0 credits)

Students who register for BIO 405 must also register for a BIO 405 laboratory. For example, if you register for BIO 405 you must, at the same time, register for a section of BIO 405L.

Attributes: Undergraduate

BIO 406 Human Anatomy (4 credits)

An in depth look into anatomic and histological features of the human body, with correlation to clinical significance where applicable. This one semester course will focus on the major body systems, including but not limited to, integumentary, skeletal, muscular, nervous systems, cardiovascular, respiratory, digestive, urinary, and reproductive systems. The associated lab (BIO 406L) will reinforce the lecture content with the use of models, cat dissection, and dissection of select organs. Students may count either BIO 175 plus BIO 176, BIO 260 plus BIO 261, or BIO 406 plus BIO 417 but not more than one of these combinations.

Prerequisites: (BIO 201 or BIO 119 or BIO 133 or BS 119 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 406L Human Anatomy Lab (0 credits)

Laboratory associated with BIO 406, an in depth look into anatomic and histological features of the human body, with correlation to clinical significance where applicable. This one semester course will focus on the major body systems, including but not limited to, integumentary, skeletal, muscular, nervous systems, cardiovascular, respiratory, digestive, urinary, and reproductive systems. Students who register for BIO 406 must also register for a BIO 406 laboratory. For example, if you register for BIO 406 you must, at the same time, register for a section of BIO 406L.

Prerequisites: BIO 201 and CHM 125

Attributes: Undergraduate

BIO 409 Ecology (4 credits)

A study of the complex interrelationship between organisms and their environment. The course will include discussions on fundamental themes in ecology such as food webs and population growth, as well as topics of current interest such as oil spills and the destruction of the rain forest. Two 50-minute lecture periods, one four-hour laboratory period (BIO 409L). Students may count only one of the following courses towards their graduation requirements: BIO 377, or BS 377, or BIO 409.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 409L Ecology Lab (0 credits)

Students who register for BIO 409 must also register for a BIO 409 laboratory. For example, if you register for BIO 409 you must, at the same time, register for a section of BIO 409L.

Attributes: Undergraduate

BIO 411 Molecular Genetics (4 credits)

Study of the molecular biology of the genetic material, its structure, expression, regulation, and its dynamic nature. Two 50-minute lecture periods, one four-hour laboratory period (BIO 411L). Students may count only one of the following courses towards their graduation requirements: BIO 343, or BS 343, or BIO 411, or CHM 342, or CHM 356.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126) and ENG 101

Attributes: CCC: Writing Intensive, Undergraduate, GEP Writing Intensive

BIO 411L Molecular Genetics Lab (0 credits)

Students who register for BIO 411 must also register for a BIO 411 laboratory. For example, if you register for BIO 411 you must, at the same time, register for a section of BIO 411L.

Attributes: Undergraduate

BIO 412 Neurobiology (4 credits)

Introduction to the structure and function of the vertebrate nervous system. Major topics will include neuronal function, sensory and motor systems, behavior, and higher mental processes. Laboratory work will include hands-on experience of several neurobiological techniques to measure molecular and biochemical changes in a mouse brain. Two 50-minute lecture periods, and two 2-hour laboratory periods (BIO 412L). Students may count only one of the following courses towards their graduation requirements: BIO 412 or BIO 460 or BS 460. Students may count BIO 412 or BIO 460 towards their graduation requirements, but not both.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 412L Neurobiology Lab (0 credits)

Students who register for BIO 412 must also register for a BIO 412 laboratory. For example, if you register for BIO 412 you must, at the same time, register for a section of BIO 412L.

Attributes: Undergraduate

BIO 413 Plant Physiological Ecology (4 credits)

This course will focus on the physiological mechanisms plants use to respond to their environment. Major topic areas include the basic environmental physiology of carbon, water, and mineral nutrient exchange, and the adaptive mechanisms plants use to survive the variety of global environments. Labs will cover common physiological research methods ranging from cellular to whole organism level measurements and will involve both laboratory and field work. Two 75-minute lecture periods, two 90-min laboratory periods (BIO 413L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 413L Plant Physiological Eco Lab (0 credits)

Students who register for BIO 413 must also register for a BIO 413 laboratory. For example, if you register for BIO 413 you must, at the same time, register for a section of BIO 413L.

Attributes: Undergraduate

BIO 414 Plant Systematics (4 credits)

Students will learn to recognize vascular plant families and understand how taxonomists study evolutionary relationships among plant groups. Economic, medical, and ecological importance of various seed plants will be emphasized. Two 75-minute lecture periods, two 90-minute laboratory periods (BIO 414L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 414L Plant Systematics Lab (0 credits)

Students who register for BIO 414 must also register for a BIO 414 laboratory. For example, if you register for BIO 414 you must, at the same time, register for a section of BIO 414L.

Attributes: Undergraduate

BIO 415 Immunology (4 credits)

An introductory course providing students with an overview of how the immune system works, including molecules, cells and organs of the immune system and their functions and interactions. Discussion of the experimental techniques used to understand the cell-cell interactions that occur in immunity as well as the differentiation and activation of the immune response will be included. Two 50-minute lecture periods, one four-hour laboratory period (BIO 415L). Students may count BIO 350 or BIO 415 towards their graduation requirements, but not both.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 415L Immunology Lab (0 credits)

Students who register for BIO 415 must also register for a BIO 415 laboratory. For example, if you register for BIO 415 you must, at the same time, register for a section of BIO 415L.

Attributes: Undergraduate

BIO 416 Microbiology (4 credits)

The structural, cultural, and physiological characteristics of microorganisms and their role in the economy of nature. The principles of immunity, serology, and virology are also considered. Three 50-minute lecture periods, one three-hour laboratory period (BIO 416L). Students may count only one of the following courses towards their graduation requirements: BIO 185 or BIO 243 or BIO 270 or BIO 416 or BIO 453 or BS 453.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 416L Microbiology Lab (0 credits)

Students who register for BIO 416 must also register for a BIO 416 laboratory. For example, if you register for BIO 416 you must, at the same time, register for a section of BIO 416L.

Attributes: Undergraduate

BIO 417 Systemic Physiology (4 credits)

A study of the fundamental mechanisms of vertebrate physiology. The basis for the function of the various organ systems and the biological controls that result in the integration of these systems will be discussed. Two 50-minute lecture periods, one four-hour laboratory period (BIO 417L). Students may count only one of the following courses towards their graduation requirements: BS 412, or BIO 440, or BIO 417.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 417L Systemic Physiology Lab (0 credits)

Students who register for BIO 417 must also register for a BIO 417 laboratory. For example, if you register for BIO 417 you must, at the same time, register for a section of BIO 417L.

Attributes: Undergraduate

BIO 419 Invertebrate Zoology (4 credits)

A study of the morphology, physiology, behavior, and phylogenetic relationships of the major groups of invertebrates. Participants will compare and contrast the physical and biological challenges facing the invertebrates that live on land, in water, and inside other organisms. The laboratory will include observations and experiments on live and preserved animals. Two 50-minute lecture periods, and two 2-hour lab periods (BIO 419L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 419L Invertebrate Zoology Lab (0 credits)

Students who register for BIO 419 must also register for a BIO 419 laboratory. For example, if you register for BIO 419 you must, at the same time, register for a section of BIO 419L.

Attributes: Undergraduate

BIO 420 Bioinformatics (4 credits)

Introduction to the use of computers in biology. Students learn about important scientific questions and the contemporary tools used to answer them. Topics include genome sequence assembly and annotation, database mining, genome organization, phylogenetics and genetics of human disease. Students who register for BIO 420 must also register for a BIO 420 laboratory. For example, if you register for BIO 420 you must, at the same time, register for a section of BIO 420L.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 420L Bioinformatics Lab (0 credits)

Students who register for BIO 420 must also register for a BIO 420 laboratory. For example, if you register for BIO 420 you must, at the same time, register for a section of BIO 420L.

Attributes: Undergraduate

BIO 421 Molecular&Cellular Biophysics (4 credits)

The course is designed to show students how the integration of physics, chemistry and molecular biology are used to explain and predict molecular and cellular processes such as protein-protein interactions, protein folding, diffusion, and signaling. The course will also provide students with a basic understanding and hands-on experience of several biophysical and biochemical laboratory techniques. Two 50-minute lecture periods, one four-hour lab period (BIO 421L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126) and (PHY 101 or PY 202 or PY 212 or PHY 105)

Attributes: Undergraduate

BIO 421L Mol & Cell Biophysics Lab (0 credits)

Students who register for BIO 421 must also register for a BIO 421 laboratory. For example, if you register for BIO 421 you must, at the same time, register for a section of BIO 421L.

Attributes: Undergraduate

BIO 422 Applied & Environ Microbiology (4 credits)

The course will introduce us to the complex relationships between microbes and their environment, including other organisms. In the frame of these relationships, we will explore how microbial activities are key to geochemical cycles and to human-engineered processes that are essential part of our lives. Two 50-minute lecture periods, one four-hour lab period (BIO 422L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 422L Applied & Environ Micro Lab (0 credits)

Students who register for BIO 422 must also register for a BIO 422 laboratory. For example, if you register for BIO 422 you must, at the same time, register for a section of BIO 422L.

Attributes: Undergraduate

BIO 423 Evolution (4 credits)

This course covers the major concepts of evolutionary biology, including natural selection, adaptation, genetic drift, and phylogenetic trees. The course trains students to know how to generate and test evolutionary hypotheses using data and inference. The lab portion of the course (BIO 423L) encourages hands-on learning through computer simulation and problem-solving.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 423L Evolution Lab (0 credits)

Students who register for BIO 423 must also register for a BIO 423 laboratory. For example, if you register for BIO 423 you must, at the same time, register for a section of BIO 423L.

Attributes: Undergraduate

BIO 424 Biotechnology (4 credits)

A course in which students will learn how basic cell and molecular biology are used to develop products for biomedical, agricultural and industrial applications. The course will also cover fundamental and emerging techniques in the biotechnology field. The lab section (BIO 424L) will focus on the steps involved in the production and purification of recombinant proteins expressed in bacterial cells. Two 50-minute lecture periods, one four-hour laboratory period (BIO 424L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CH 102 or CH 112 or CHM 126)

Attributes: Undergraduate

BIO 424L Biotechnology Lab (0 credits)

Students who register for BIO 424 must also register for a BIO 424 laboratory. For example, if you register for BIO 424 you must, at the same time, register for a section of BIO 424L.

Attributes: Undergraduate

BIO 425 Bacterial Pathogenesis (4 credits)

A study of the physiological, genetic, and biochemical basis underlying some of the commonly encountered bacterial diseases. The course also addresses the roles of antimicrobial compounds and the host immune system in counteracting disease. Finally, in the lab module for the course, students perform discovery-oriented research as they identify novel genes in enteropathogenic *Escherichia coli* (EPEC) that affect bacterial virulence in a *C. elegans* (roundworm) model of disease. Two 75-minute lecture periods, one three-hour laboratory period (BIO 425L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 425L Bacterial Pathogenesis Lab (0 credits)

Students who register for BIO 425 must also register for a BIO 425 laboratory. For example, if you register for BIO 425 you must, at the same time, register for a section of BIO 425L.

Attributes: Undergraduate

BIO 426 Fermentation Science (3 credits)

This course will provide students with an overview of various fermentation processes and their use in producing fermented foods and beverages. Fermentation will be considered from biochemical, microbiological, food science, historical and cultural points of view.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 426L Fermentation Science Lab (0 credits)

Students who register for BIO 426 must also register for a BIO 426 laboratory. For example, if you register for BIO 426 you must, at the same time, register for a section of BIO 426L.

Attributes: Undergraduate

BIO 427 Human Genetics (4 credits)

This course explores human genetics, covering various topics, including Mendelian and complex diseases, chromosomal abnormalities, heritability, genetic variations, and methods for investigating disease associations. Additional focus areas include population, quantitative, developmental genetics, genetics in cancer and neurodegenerative disease, and epigenetics. Students who register for BIO 427 must also register for a BIO 427 laboratory. For example, if you register for BIO 427 you must, at the same time, register for a section of BIO 427L.

Prerequisites: (BIO 201 or BIO 119 or BIO 133 or BS 119 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Restrictions: Enrollment is limited to students with a major in Biological Studies, Biology, Biomedical Sciences, Chemical Biology, Environmental Science or Medical Laboratory Science.

Attributes: Undergraduate

BIO 427L Human Genetics Lab (0 credits)

The human genetics laboratory will consist of exercises that train students in the mechanisms of inheritance and gene action from the molecular to the organismic and population levels. Additionally, the exercises would train all students in commonly used genetic diagnostic tools and apply the principles of human genetics learned in the lecture. Students who register for BIO 427 must also register for a BIO 427 laboratory. For example, if you register for BIO 427 you must, at the same time, register for a section of BIO 427L.

Attributes: Undergraduate

BIO 428 Histopathology (4 credits)

A study of the microscopic structure and function of normal and diseased cells, tissues and organs, focusing on vertebrates, with a special emphasis on humans. Using prepared slides and computer images, students will learn to identify and differentiate healthy and pathological samples and relate this to abnormal or disrupted organ function. Two 50-minute lecture periods, two, two-hour lab periods (BIO 428L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 428L Histopathology Lab (0 credits)

Students who register for BIO 428 must also register for a BIO 428 laboratory. For example, if you register for BIO 428 you must, at the same time, register for a section of BIO 428L.

Attributes: Undergraduate

BIO 429 Environmental Science (4 credits)

An overview of the relationship between humans, their activities, and the environment around them. Though focused on the biological impacts from pollution, overpopulation, climate change, and resource exploitation, this course will also address the chemical and physical mechanisms that drive those changes and possible solutions to the challenges they present. Three, 50-minute lecture periods, one three-hour laboratory period (BIO 429L).

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 429L Environmental Science Lab (0 credits)

Students who register for BIO 429 must also register for a BIO 429 laboratory. For example, if you register for BIO 429 you must, at the same time, register for a section of BIO 429L.

Attributes: Undergraduate

BIO 430 Neurological Disorders (4 credits)

Students will learn about the molecular and cellular mechanisms underlying various human nervous system disorders, such as autism, addiction, trauma, and neurodegenerative disorders. There will be a focus on the reading of primary literature and writing. Laboratory work will include a semester-long investigative research project. Two 50-minute lecture periods, and two 2-hour laboratory periods (BIO 430L). Students may count BIO 430 or BIO 455 towards their graduation requirements, but not both.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112) and ENG 101

Attributes: CCC: Writing Intensive, Undergraduate

BIO 430L Neurological Disorders Lab (0 credits)

Students who register for BIO 430 must also register for a BIO 430 laboratory. For example, if you register for BIO 430 you must, at the same time, register for a section of BIO 430L.

Attributes: Undergraduate

BIO 433 Parasitology (3 credits)

Survey of the geographic distribution, incidence, symptoms, diagnosis, treatment, prevention, control, and immunology of important parasitic diseases in humans. Emphasis is placed on relationship of culture and social customs to the life cycles of the parasites. Class discussions and presentations will focus on ethical implications of diagnoses, as well as related Western interventions in developing countries. Students who register for BIO 433 must also register for a BIO 433 laboratory. For example, if you register for BIO 433 you must, at the same time, register for a section of BIO 433L.

Prerequisites: BIO 201

Attributes: Undergraduate

BIO 433L Parasitology Lab (1 credit)

Students who register for BIO 433 must also register for a BIO 433 laboratory. For example, if you register for BIO 433 you must, at the same time, register for a section of BIO 433L.

BIO 470 Special Topics (1-4 credits)

Advanced study on a topic or problem to be arranged with any of the Departmental faculty members.

Prerequisites: BIO 201 and CHM 125

Attributes: Undergraduate

BIO 472 Aquatic Biology (4 credits)

A lecture and field course concerning the biological, physical, and chemical aspects of freshwater ecosystems. Includes collection, preservation, and recognition of aquatic organisms other than vertebrates and the study of those aspects of their biology that are important adaptations to aquatic life. Students who register for BIO 472 must also register for BIO 472L lab section. For example, if you register for BIO 472 you must, at the same time, register for a section of BIO 472L.

Prerequisites: (BIO 201 or BIO 243 or BS 243) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 472L Aquatic Biology Lab (0 credits)

Students who register for BIO 472 must also register for BIO 472L lab section. For example, if you register for BIO 472 you must, at the same time, register for a section of BIO 472L.

Attributes: Undergraduate

BIO 473 Biological Sciences Seminar I (1 credit)

Reports and seminars on topics of current biological interest presented by students or outside speakers. Depending on the instructor, topic may be one of students' or instructor's choice. Required of all senior biological sciences majors; open to all qualified students. This course is only open to legacy University of the Sciences students.

Prerequisites: (BIO 119 or BS 119) or (BIO 133 or BS 133)

Restrictions: Enrollment is limited to Undergraduate Division level students. Enrollment limited to students with the University Sciences Legacy attribute.

Attributes: Undergraduate

BIO 474 Emrg Bio Threat & Glbl Sustain (3 credits)

Biological threats such as emerging human/animal diseases, food insecurity, and population growth are examined in connection with causes and effects on global changes in climate, land use, decline in biodiversity, etc. Topics are covered through journal readings, reports, presentations, and student blogs.

Prerequisites: (BIO 201 or BIO 119 or BS 119 or BIO 133 or BS 133) and (CHM 125 or CHM 126 or CH 102 or CH 112)

Attributes: Undergraduate

BIO 475 Biological Sciences Seminar II (1 credit)

Continuation of BIO 473 - Biological Sciences Seminar I. Students will integrate knowledge and ideas within biology and across other fields.

Prerequisites: (BIO 473 or BS 493)

Attributes: Undergraduate

BIO 491 Biology Internship (1-3 credits)

Internships enable the student to gain first-hand experience working in some field of biology. Interns should work a minimum of 10 hours weekly for 14 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship. Permission of the Chair of Biology required.

Prerequisites: BIO 201 and (CHM 125 or CHM 126)

Attributes: Undergraduate

BIO 492 Biology Internship II (1-3 credits)

Internships enable the student to gain first-hand experience working in some field of biology. Interns should work a minimum of 10 hours weekly for 14 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship. Permission of the Chair of Biology required.

Prerequisites: BIO 201 and (CHM 125 or CHM 126)

Attributes: Undergraduate

BIO 493 Undergraduate Research in Bio (1-6 credits)

Laboratory or field work on a specific biological problem in cooperation with a faculty member of the department. Normally requires three hours of work per week for each unit of credit. This course may be taken for credit multiple semesters but only one semester counts as a biology elective. In subsequent semesters this course will count as a general elective.

Prerequisites: BIO 201 and (CHM 125 or CHM 126)

Attributes: Undergraduate

BIO 494 Undergraduate Research in Bio (1-6 credits)

Laboratory or field work on a specific biological problem in cooperation with a faculty member of the department. Normally requires three hours of work per week for each unit of credit. This course may be taken for credit multiple semesters but only one semester counts as a biology elective. In subsequent semesters this course will count as a general elective.

Prerequisites: BIO 201 and (CHM 125 or CHM 126)

Attributes: Undergraduate

BIO 499 Independent Study in Biology (1-3 credits)

By permission only, must be arranged with the Biology department chair.

Attributes: Undergraduate

BIO 550 Research Techniques (3 credits)

An introduction to techniques commonly used in life science research laboratories. Weekly meetings by different faculty members on their area of specialty. One lecture period.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 550L Research Techniques Lab (1 credit)

Students who register for BIO 550 must also register for a BIO 550 laboratory. For example, if you register for BIO 550 you must, at the same time, register for a section of BIO 550L.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 552 Graduate Seminar (1 credit)

Presentations and discussions of primary literature articles. Topic varies by semester. One period.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 600 Developmental Genetics (3 credits)

Students will learn about the principles governing plant and animal development and the underlying cellular and genetic mechanisms. This includes: gametogenesis and fertilization, sex determination, embryogenesis and early development, ectoderm development (nervous systems, skin and appendages), mesoderm development (muscle, bone, blood and cardiovascular), endoderm development (organogenesis, tube formation and reproduction) and an introduction to common developmental disorders. Students will read primary literature and learn about the techniques employed in developmental genetics research using model systems.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 601 Animal Behavior (4 credits)

Study of animals and their behaviors with strong emphasis on evolutionary relationships and ecology. Two lecture periods, one four hour laboratory period (BIO 601L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 601L Animal Behavior Lab (0 credits)

Students who register for BIO 601 must also register for a BIO 601L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 602 Advanced Cell Biology (4 credits)

In depth analysis of eukaryotic cell structure and function. Emphasis is on experimental approaches to understanding concepts in cell biology. Two lecture periods, one four-hour laboratory period (BIO 602L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 602L Advanced Cell Biology Lab (0 credits)

Students who register for BIO 602 must also register for a BIO 602L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 604 Biochemistry (3 credits)

An introduction to the study of the chemistry of living systems. The study of important macromolecules, metabolic pathways, and control systems will be emphasized. Two lecture periods.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 605 Biomechanics (4 credits)

Students are introduced to the ways in which the behavior, morphology and material composition of plants and animals are affected by and take advantage of physical forces. This course will include lectures given by the members of the Biology and Physics Department, as well as an integrated laboratory section where students will observe and measure the effect of physical forces on organisms in both aquatic and terrestrial systems. Two 75-minute lecture periods, one three-hour laboratory period (BIO 605L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 605L Biomechanics Lab (0 credits)

Students who register for BIO 605 must also register for a BIO 605L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 606 Comparative Anatomy (4 credits)

An integrated comparative study of vertebrate structure and development. A synthesis of the embryological development, the gross anatomy, and the histology of selected forms. Two lecture periods, one four-hour laboratory period (BIO 606L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 606L Comparative Anatomy Lab (0 credits)

Students who register for BIO 606 must also register for a BIO 606L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 609 Ecology (4 credits)

Study of complex interrelationship between organisms and their environment. Two lecture periods, one four-hour laboratory period (BIO 609L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 609L Ecology Lab (0 credits)

Students who register for BIO 609 must also register for a BIO 609L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 611 Molecular Genetics (4 credits)

Study of the molecular biology of the genetic material, its structure, expression, regulation, and its dynamic nature. Two lecture periods, one four-hour laboratory period (BIO 611L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 611L Molecular Genetics Lab (0 credits)

Students who register for BIO 611 must also register for a BIO 611L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 612 Neurobiology (4 credits)

Introduction to the structure and function of the vertebrate nervous system. Major topics will include neuronal function, sensory and motor systems, behavior, and higher mental processes. Laboratory work will include hands-on experience of several neurobiological techniques to measure molecular and biochemical changes in a mouse brain. Two 50-minute lecture periods, and two 2-hour laboratory periods (BIO 612L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 612L Neurobiology Lab (0 credits)

Students who register for BIO 612 must also register for a BIO 612L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 613 Plant Physiological Ecology (4 credits)

This course will focus on the physiological mechanisms plants use to respond to their environment. Major topic areas include the basic environmental physiology of carbon, water, and mineral nutrient exchange, and the adaptive mechanisms plants use to survive the variety of global environments. Labs will cover common physiological research methods ranging from cellular to whole organism level measurements and will involve both laboratory and field work. Two 75-minute lecture periods, two 90 minute lab periods (BIO 613L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 613L Plant Physiological Eco Lab (0 credits)

Students who register for BIO 613 must also register for a BIO 613L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 614 Plant Systematics (4 credits)

Students will learn to recognize vascular plant families and understand how taxonomists study evolutionary relationships among plant groups. Economic, medical, and ecological importance of various seed plants will be emphasized. Two 75-minute lecture periods, two 90-minute laboratory periods (BIO 614L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 614L Plant Systematics Lab (0 credits)

Students who register for BIO 614 must also register for a BIO 614L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 615 Immunology (4 credits)

An introductory course providing students with an overview of how the immune system works, including molecules, cells and organs of the immune system and their functions and interactions. Discussion of the experimental techniques used to understand the cell-cell interactions that occur in immunity as well as the differentiation and activation of the immune response will be included. Two 50-minute lecture periods, one four-hour laboratory period (BIO 615L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 615L Immunology Lab (0 credits)

Students who register for BIO 615 must also register for a BIO 615L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 616 Microbiology (4 credits)

The structural, cultural, and physiological characteristics of microorganisms and their role in the economy of nature. Three 50-minute lecture periods, one three-hour laboratory period (BIO 616L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 616L Microbiology Lab (0 credits)

Students who register for BIO 616 must also register for a BIO 616L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 617 Systemic Physiology (4 credits)

A study of the fundamental mechanisms of vertebrate physiology. The basis for the function of the various organ systems and the biological controls that result in the integration of these systems will be discussed. Two lecture periods, one four-hour laboratory period (BIO 617L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 617L Systemic Physiology Lab (0 credits)

Students who register for BIO 617 must also register for a BIO 617L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 619 Invertebrate Zoology (4 credits)

A study of the morphology, physiology, behavior, and phylogenetic relationships of the major groups of invertebrates. Participants will compare and contrast the physical and biological challenges facing the invertebrates that live on land, in water, and inside other organisms. The laboratory will include observations and experiments on live and preserved animals. Two 50-minute lecture periods; two two-hour lab periods (BIO 619L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 619L Invertebrate Zoology Lab (0 credits)

Students who register for BIO 619 must also register for a BIO 619L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 620 Bioinformatics (4 credits)

Introduction to the use of computers in biology. Students learn about important scientific questions and the contemporary tools used to answer them. Topics include genome sequence assembly and annotation, database mining, genome organization, phylogenetics and genetics of human disease. Two 50-minute lecture periods, one four-hour lab period (BIO 620L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 620L Bioinformatics Lab (0 credits)

Students who register for BIO 620 must also register for a BIO 620L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 621 Molecular&Cellular Biophysics (4 credits)

The course is designed to show students how the integration of physics, chemistry and molecular biology are used to explain and predict molecular and cellular processes such as protein-protein interactions, protein folding, diffusion, and signaling. The course will also provide students with a basic understanding and hands-on experience of several biophysical and biochemical laboratory techniques. Two 50-minute lecture periods, one four-hour lab period (BIO 621L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 621L Mol & Cel Biophysics Lab (0 credits)

Students who register for BIO 621 must also register for a BIO 621L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 622 Applied & Environ Microbiology (4 credits)

The course will introduce us to the complex relationships between microbes and their environment, including other organisms. In the frame of these relationships, we will explore how microbial activities are key to geochemical cycles and to human-engineered processes that are essential part of our lives. Two 50-minute lecture periods, one four-hour lab period (BIO 622L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 622L Applied & Environ Micro Lab (0 credits)

Students who register for BIO 622 must also register for a BIO 622L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 623 Evolution (4 credits)

This course covers the major concepts of evolutionary biology, including natural selection, adaptation, genetic drift, and phylogenetic trees. The course trains students to know how to generate and test evolutionary hypotheses using data and inference. The lab portion of the course encourages hands-on learning through computer simulation and problem-solving. Two 50-minute lecture periods, one four-hour lab period (BIO 623L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 623L Evolution Lab (0 credits)

Students who register for BIO 623 must also register for a BIO 623L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 624 Biotechnology (4 credits)

A course in which students will learn how basic cell and molecular biology are used to develop products for biomedical, agricultural and industrial applications. The course will also cover fundamental and emerging techniques in the biotechnology field. The lab section will focus on the steps involved in the production and purification of recombinant proteins expressed in bacterial cells. Two 50-minute lecture periods, one four-hour lab period (BIO 624L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 624L Biotechnology Lab (0 credits)

Students who register for BIO 624 must also register for a BIO 624L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 625 Bacterial Pathogenesis (4 credits)

A study of the physiological, genetic, and biochemical basis underlying some of the commonly encountered bacterial diseases. The course also addresses the roles of antimicrobial compounds and the host immune system in counteracting disease. In the lab module for the course, students perform discovery-oriented research as they identify novel genes in enteropathogenic *Escherichia coli* (EPEC) that affect bacterial virulence in a *C. elegans* (roundworm) model of disease. Two 75-minute lecture periods, one three-hour laboratory period (BIO 625L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 625L Bacterial Pathogenesis Lab (0 credits)

Students who register for BIO 625 must also register for a BIO 625L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 626 Fermentation Science (4 credits)

This course will provide students with an overview of various fermentation processes and their use in producing fermented foods and beverages. Fermentation will be considered from biochemical, microbiological, food science, historical and cultural points of view.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 626L Fermentation Science Lab (0 credits)

Students who register for BIO 626 must also register for a BIO 626L lab section.

Attributes: Graduate

BIO 627 Human Genetics (4 credits)

This course explores human genetics, covering various topics, including Mendelian and complex diseases, chromosomal abnormalities, heritability, genetic variations, and methods for investigating disease associations. Additional focus areas include population, quantitative, developmental genetics, genetics in cancer and neurodegenerative disease, and epigenetics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 627L Human Genetics Lab (0 credits)

The human genetics laboratory will consist of exercises that train students in the mechanisms of inheritance and gene action from the molecular to the organismic and population levels. Additionally, the exercises would train all students in commonly used genetic diagnostic tools and apply the principles of human genetics learned in the lecture. Students who register for BIO 627 must also register for a BIO 627 laboratory. For example, if you register for BIO 627 you must, at the same time, register for a section of BIO 627L.

Attributes: Graduate

BIO 628 Histopathology (4 credits)

A study of the microscopic structure and function of normal and diseased cells, tissues and organs, focusing on vertebrates, with a special emphasis on humans. Using prepared slides and computer images, students will learn to identify and differentiate healthy and pathological samples and relate this to abnormal or disrupted organ function. Two 50-minute lecture periods, two, two-hour lab periods (BIO 628L).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 628L Histopathology Lab (0 credits)

Students who register for BIO 628 must also register for a BIO 628 laboratory. For example, if you register for BIO 628 you must, at the same time, register for a section of BIO 628L.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 629 Environmental Science (4 credits)

An overview of the relationship between humans, their activities, and the environment around them. Though focused on the biological impacts from pollution, overpopulation, climate change, and resource exploitation, this course will also address the chemical and physical mechanisms that drive those changes and possible solutions to the challenges they present. Three, 50-minute lecture periods, one three-hour laboratory period (BIO 629L).

Attributes: Graduate

BIO 629L Environmental Science Lab (0 credits)

Students who register for BIO 629 must also register for a BIO 629L lab section.

Attributes: Graduate

BIO 630 Neurological Disorders (4 credits)

Students will learn about the molecular and cellular mechanisms underlying various human nervous system disorders, such as autism, addiction, trauma, and neurodegenerative disorders. There will be a focus on the reading of primary literature and writing. Laboratory work will include a semester-long investigative research project. Two 50-minute lecture periods, and two 2-hour laboratory periods (BIO 630L).

Attributes: Graduate

BIO 630L Neurological Disorders Lab (0 credits)

Students who register for BIO 630 must also register for a BIO 630L lab section.

Attributes: Graduate

BIO 672 Aqua Ecology (4 credits)

A lecture and field course concerning the biological, physical, and chemical aspects of freshwater ecosystems. Includes collection, preservation, and recognition of aquatic organisms other than vertebrates and the study of those aspects of their biology that are important adaptations to aquatic life. Students who register for BIO 672 must also register for a BIO 672 laboratory. For example, if you register for BIO 672 you must, at the same time, register for a section of BIO 672L.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 672L Aqua Ecology Lab (0 credits)

This course will combine both laboratory exercises on the Hawk Hill campus as well as field trips to local aquatic ecosystems for hands-on collections and analysis of the systems and their associated organisms. Students who register for BIO 672 must also register for a BIO 672 laboratory. For example, if you register for BIO 672 you must, at the same time, register for a section of BIO 672L.

Attributes: Graduate

BIO 710 Fundamentals of Brewing Scienc (3 credits)

Comprehensive course in the brewing process and its underlying scientific principles. Students will learn methods of brewing beer from grain to glass as instructed by industry experts. There will be a focus on raw ingredient quality, assessment, application, and processing in the brewery.

BIO 711 Brewery Engineering (3 credits)

Designed to inform students of key engineering principles with application to best brewery practices. A combination of theory and application will enable the student to better understand the function, theory, and design of brewery process, equipment, and layout.

Prerequisites: BIO 710 or BS 770

BIO 712 Microbiology of Beer (2 credits)

Through laboratory exercises, students will learn general concepts in cell and molecular biology as it pertains to yeast, bacteria, and fermentation including microscopy, culturing techniques, identification, and yeast management. Through the Yeast Hunters program, students will learn essential techniques while isolating wild yeast strains.

Restrictions: Enrollment is limited to students with a major in Brewing Science.

BIO 713 Quality Control Lab (2 credits)

In this laboratory, students will practice and demonstrate the theory behind common analytical techniques as described by the American Society of Brewing Chemists. Many of these techniques can be incorporated into the brewery, while alternative / more advanced methods will inform the student of possible analytical lab expansion or outsourcing.

BIO 714 Project in Brewing Science (3 credits)

This course is an opportunity to study a topic or establish a skill set as determined by the student with program director oversight. It is meant to prepare students for the industry internship. This will likely be a team-based project that asks a research-based question, utilizing the pilot brewing system.

Restrictions: Enrollment is limited to students with a major in Brewing Science.

BIO 715 Brewing Science Internship (1-3 credits)

Internships enable the student to gain first-hand experience working in brewing science. Interns should work a minimum of 10 hours weekly for 14 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship. Permission of the Chair of Biology required.

Restrictions: Enrollment is limited to students with a major in Brewing Science.

Attributes: Graduate

BIO 720 Science Communication&Outreach (1 credit)

Optional Service Learning course can be taken in conjunction with any Biology course. Guided experience in preparing and presenting hands-on science lessons to K-12 children. Time commitment is 3 hrs per week.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 770 Advanced Topics in Biology (3-4 credits)

Topics, course format, and instructors may vary each semester.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 770L Adv Topics in Biology Lab (0 credits)

Depending on the nature of the course, BIO 770 may also have a lab component. When it does, students who register for BIO 770 must also register for a BIO 770L lab section.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 772 Current Topics in Zymology (3 credits)

This course focuses on current research and techniques in fermentation science through primary literature review, discussion, and analysis.

Additional material will cover current issues such as supply chain management, regulatory compliance, and safety.

Prerequisites: BIO 710

BIO 785 Introduction to Research (1-2 credits)

This course is designed for students who are beginning the research phase of their thesis project or who are deciding between the thesis and non-thesis options. The course consists of at least two rotations in the laboratories of department faculty.

BIO 786 Research Ethics (1 credit)

This course will provide an examination of ethical behavior and practice in research in the scientific research. The course will follow a case study format in which students will be expected to present and participate in group discussions.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

BIO 790 Independent Study (3 credits)

By permission only, must be arranged with the Biology Graduate Director.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 791 Graduate Internship (1-4 credits)

Internships enable the student to gain first-hand experience working in some field of biology. Interns should work a minimum of 10 hours weekly for 14 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship. Permission of the Biology Graduate Director required.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 793 Research (1-6 credits)

Research project undertaken in the laboratory of a member of the graduate faculty. Meeting times arranged.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BIO 799 Master's Research (1-9 credits)

Candidates for the master of science in cell biology and biotechnology (thesis option) are required to complete a research project under the direction of an advisor chosen from within the department.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

BIO 801 Scientific Discourse (1 credit)

Graduate students will learn and improve upon their skills in presentation and debate of primary scientific data. The course will take the format of student presentations about their own ongoing research to their peers.

Students will be expected to actively participate in the presentation of others through discussion and critical evaluation of the work presented. General presentation skills and strategies will be covered and feedback will be provided to students on an individual basis. All levels of graduate students are welcome and those without a significantly advanced research project may, at the discretion of the instructor, present current literature related to their research topic.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

BIO 887 Graduate Colloquium (1 credit)

This course is focused on those skills required by the graduate scientist and consideration of career options.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

BIO 897 Scientific Proposals (2 credits)

The course is focused on writing and peer assessment of grant proposals. Thesis students will use their approved research prospectus to compose the Specific Aims page and Research Plan sections of a federally-supported funding opportunity. Non-thesis graduate students will develop a grant application focused on a research project of interest.

BIO 899 Doctoral Research (1-9 credits)

Candidates for the doctor of philosophy degree are required to fulfill their research requirements under the direction of a graduate faculty member of the department.

Business (BUS)

BUS 160 Power of Sport for Socl Chang (3 credits)

This course will introduce students to the historical and contemporary use of sport as a vehicle for social change and development. Students will examine the myriad ways in which sport produces social change, both within sport itself and through sport (using sport as a platform to effect social change in the larger society). Students will critically assess the use of sports globally to explore topics such as, race, gender, LGBTQIA, politics, and the relationship between protest and national attachment. This course has a weekly service learning component. Each student will engage with the Anderson Monarchs, a Philadelphia sports based, youth development non-profit, which provides athletic, academic, leadership, and character building opportunities to thousands of under served youth.

Attributes: Service Learning Course, Undergraduate

BUS 170 Special Topics in Business (3 credits)

Advanced study on a topic or problem to be arranged with any of the Departmental faculty members.

Attributes: Undergraduate

BUS 270 Special Topics in Business (3 credits)

Advanced study on a topic or problem to be arranged with any of the Departmental faculty members.

Attributes: Undergraduate

BUS 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP, Writing Intensive

BUS 470 Special Topics in Business (3 credits)

Advanced study on a topic or problem to be arranged with any of the Departmental faculty members.

Attributes: Undergraduate

BUS 495 Business Strategy (3 credits)

This is a senior-level business capstone course for the undergraduate core curriculum in the Haub School focusing on enterprise-level strategy. The course introduces the most important concepts and frameworks of strategy and helps you develop critical thinking skills for formulating and implementing strategy. We will focus on the perspectives and skills required to identify and diagnose critical strategic issues affecting firm performance, and examine how firms can gain and sustain competitive advantage in the face of uncertainty and competition. To be successful, a firm's strategy must permeate all departments and functional areas. As such, we integrate and apply knowledge and skills gained from your prior studies (e.g., accounting, economics, finance, data analytics, management, marketing) to teach you to be a better—meaning a more systematic, logical, complete, critical—thinker about strategy. In doing so, we apply a comprehensive and integrated business perspective.

Prerequisites: ACC 101 and ACC 102 and (MGT 110 or MGT 120) and MKT 201 and DSS 100 and DSS 200 and DSS 210 and DSS 220 and (FIN 200 or FIN 225)

Attributes: Undergraduate

BUS 570 Strategic Management & Mktg (2 credits)

Introductory survey course on strategic marketing and management. This course focuses on the creation, implementation and management of strategy from a corporate management perspective and from the perspective of a marketing manager. A variety of teaching techniques will be used to cover the material, including discussion of assigned readings, analyses of business situations, "mini cases," and written assignments and oral presentations.

Restrictions: Enrollment is limited to students with a major in Executive MBA Program (1-year) or Executive MBA Program.

Attributes: Graduate

BUS 571 Global Business (3 credits)

This course focuses on understanding the opportunities and challenges facing multinational corporations as they compete in the global economy. The course follows an interdisciplinary approach examining how the institutional environment of a host country may influence the strategic options available and how MNCs manage the risks associated with exchange rates, currency restrictions, and tax regulations. Students work on a team associated with the expansion by an MNC in the region to be visited during the EMBA Global Residency.

Restrictions: Enrollment is limited to students with a major in Executive MBA Program (1-year) or Executive MBA Program. Enrollment limited to students in the MBAEX program. Enrollment is limited to Graduate level students.

Attributes: Graduate

BUS 572 Global Residency (2 credits)

This course expands upon BUS 571 Global Business utilizing live case studies of multinational companies (MNC's). Under the guidance of EMBA faculty members, students may visit businesses in a variety of industries, speak with executives, and attend lectures during a multi-day study tour. This experience provides first-hand exposure to the impact of culture, competition and market forces on international commerce. Required travel destinations and project assignments for this course are given by EMBA faculty.

Restrictions: Enrollment is limited to students with a major in Executive MBA Program (1-year) or Executive MBA Program.

Attributes: Graduate

BUS 582 Business Ethics (2 credits)

One of the most distinctive features of Saint Joseph's Executive Master's in Food Marketing Program is its emphasis on business ethics. This course will explore the general background of moral theory followed by discussion of business ethics in specific situations. Decision scenarios, both written and video, as well as cases, will be evaluated. In addition, students will have the opportunity to discuss the ethical dilemmas which confront food marketers.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

BUS 800 Introduction to Research (3 credits)

This seminar will prepare students to design and conduct scholarly research. The focus is on the practical application of research theory to issues that are relevant in today's global business environment. Topics covered include: basic principles of research design, an introduction to various types of research methodologies, formulation of a research topic, completion of the literature review and the development of a plan for collecting data. This seminar serves as the foundation for the more in-depth quantitative and qualitative research courses in the program.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 801 Quantitative Res. Methods I (3 credits)

This course will teach students how to collect, analyze and interpret data using various descriptive and inferential statistical techniques such as sampling, Central Limit Theorem, Random Variables, Covariance, and hypothesis testing (mean, variance and correlation). Methods for determining the reliability and validity of research designs will also be explored.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 802 Quantitative Res. Methods II (3 credits)

This course builds on students' knowledge of quantitative methods by introducing advanced statistical techniques such as Multivariate Regression with Indicator Variables, Stepwise Regression, and Logistic Regressions with Odds Ratios. Students will have the opportunity to design, implement and assess quantitative research by completing a project that is foundational to their dissertation.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 803 Qualitative Res. Methods I (3 credits)

Explores the history of research, basic principles, types of research, and qualitative methods to assist professionals in applied business settings. Various instruments (surveys and tests) used to conduct applied research will also be discussed. Students will learn how to assess qualitative research reports and will explore several techniques to gather information, including interviews, case studies and observation.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 804 Qualitative Res. Methods II (3 credits)

This course builds on the concepts and methods from Qualitative Research Methods I. It will introduce mixed-methods and quasi-experimental design, cost benefit analysis, industry benchmarking, and appropriate analytical methods (Analytical Methods: t tests, Chi Square, Contingency tables, ANOVA, correlation). The key aspect of this course is on designing, implementing and assessing a broader qualitative research agenda.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 805 Financial Markets and Policies (3 credits)

This course helps students develop a foundation in basic free market concepts essential to understanding business, public policy and consumer decision making. Areas of study include market forces of supply and demand, competition, business organization, consumer behavior, strength of economies, international trade and government interactions.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 806 Seminar: Innovative Pedagogy (2 credits)

In this seminar, students will examine techniques for creating an innovative business pedagogy. Topics in business pedagogy will include: methods to encourage reflection on learning, alternatives to traditional course structure, leveraging technology and social media, course design, course delivery, and developing a relevant curriculum. topics within Ignatian pedagogy will include the introduction of various theories and frameworks to investigate a broad range of ethical issues encountered in organizations.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 807 Business Projects Practicum (3 credits)

Students will work with a mentor to design and conduct a practicum project that focuses on specific business problems. The practicum proposal must be completed in collaboration with the mentor. At the end of the project, the student will submit evidence of completion including self-reflection and assessment.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 808 Applied Accounting Research (3 credits)

Students will explore current issues related to managerial and financial accounting. The focus of the course is the use of applied research methods to develop a solution that addresses a practical accounting issue.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 809 Applied Data Analytic Research (3 credits)

Business intelligence and analytics are more important than ever in the changing competitive landscape. Students will use applied research methods to investigate practical business intelligence issues and prepare a research paper that provides empirical evidence supporting conclusions. Students will learn topics such as wrangling and cleaning data, data visualization, decision trees, clustering, and factor analysis/principal components analysis.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 810 Applied Finance Research (3 credits)

This course provides an opportunity for students to identify an open question in the literature related to a topic in economics or financial management and prepare a research paper that presents a solution using empirical evidence.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 811 Applied Marketing Research (3 credits)

The focus of this course is on marketing strategy and the application of research techniques. Students will review the existing literature and generate a research question that has practical application in business. Students will be expected to gather, analyze and assess data and formulate a research report.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 812 Applied Strategy Research (3 credits)

In this course, students will investigate relevant strategic issues facing organizations. Representative topics include: corporate governance, economic trends, cultural diversity, competing in a global market and change management. Students will be expected to apply research theory to assess empirical evidence on a topic and re-frame it in a new or extended way that enhances the understanding of the issue.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 813 Organizational Behavior Res. (3 credits)

This course discusses several theoretical frameworks to assess the behavior of individuals and groups in domestic and global organizations. The focus will be on practical application of the theories and will cover topics such as perception, decision making, and motivation. Students will use research techniques to explore emerging issues affecting today's complex organizations and produce a report of the findings.

Restrictions: Enrollment is limited to Doctoral level students.

BUS 814 Research Writing (1 credit)

This course discusses aspects of research writing including the dissertation journey, style in writing, components of an academic thesis (introduction, literature review, methodology, application of methodology), making time to write, writer's block and preparing for publication.

Restrictions: Enrollment limited to students in the BUDBA program.

Attributes: Doctoral

BUS 850 Dissertation Development I (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is a dissertation proposal.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

BUS 851 Dissertation Development II (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is a dissertation proposal defense.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

BUS 852 Dissertation Development III (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is dissertation progress - nearing completion.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

BUS 853 Dissertation Development IV (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is a final dissertation defense.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

BUS 854 Diss Research Develop L1 (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is a dissertation proposal. This course is reserved for students who have taken leave and are returning to the program to defend their dissertation proposal and may also complete their final defense during the same semester.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

BUS 855 Diss Research Develop L2 (3 credits)

This seminar provides doctoral candidates with the knowledge and skills to design, conduct and report the findings of research studies. The expected outcome is a dissertation defense. This course is reserved for students who have taken leave, and have already defended their dissertation proposal. Students register for these credits when completing their final dissertation defense.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

Cancer Biology (CBI)

CBI 815 Cancer Biology (3 credits)

This course is focused on the basic pathways and mechanisms of cancer development and progression as well as current approaches for the identification of therapies for the treatment of cancer.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

CBI 880 Molecular Screening (2 credits)

The goal of this course is to provide hands-on planning, conceptualization, and assay development of a molecular screening strategy relevant to cancer biology and cancer therapeutics. The wet lab component of the course is designed to leverage the existing collaboration between Wistar centered on the Molecular Screening Facility at The Wistar Institute.

CBI 890 Journal Club (2 credits)

The journal club will be offered each fall and spring semester. Journal club will be taken for zero credits each semester; journal club will receive two credits in the student's final semester.

CBI 899 Doctoral Research (1-9 credits)

Students must complete a minimum of at least 20 credits of CBI 899 - Doctoral Research. While the stated minimum for research is 20 credits, at least two additional years of research after completion of coursework is expected of the students. Students propose, develop, and perform an independent research project under the guidance of a faculty advisor and Advisory Committee.

Cardiac Sonography (CAS)

CAS 113L Echo Lab I (1 credit)

This course will introduce the student to the skills needed to perform sonograms of normal cardiac structures.

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

CAS 206 Ultrasound Cardiac Anat & Phys (3 credits)

This course will prepare the student to recognize and describe the construction and dynamics of the cardiovascular system.

Prerequisites: BIO 175 and BIO 176 and (CAS 222 (may be taken concurrently) or VAS 235L (may be taken concurrently) or VAS 238L (may be taken concurrently))

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography or Vascular Sonography.

CAS 220 Cardiac Pathophysiology I (3 credits)

This course will prepare the student to recognize and describe ventricular and valvular pathologies and their ultrasound appearance.

Prerequisites: DMS 111

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

CAS 222 Echo Hemodynamics (1 credit)

This course will prepare the student to recognize and describe normal and abnormal cardiac hemodynamics and perform hemodynamic calculations.

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 223 Cardiac Pathophysiology II (3 credits)

This course will prepare the students to recognize and describe aortic, pericardial, and systemic cardiovascular pathologies with cardiac manifestations to include their ultrasound appearance.

Prerequisites: CAS 220

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

CAS 224C Echo Clinical I (3-4 credits)

This course will prepare the student to perform cardiac sonograms and develop their scanning skills in a clinical setting

Prerequisites: CAS 113L or (CAS 233L or CAS 225L)

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 225L Echo Lab II (1 credit)

This course will prepare the student to apply hemodynamics and pathology concepts to cardiac sonograms while developing scanning skills.

Prerequisites: CAS 113L

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 226 Adv Echo & Therapeutic Techniq (1-2 credits)

This course will provide the student with an understanding of advanced cardiac techniques and cardiac procedures.

Prerequisites: (CAS 225L or CAS 233L) or (CAS 228C or CAS 228)

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 227 Introduction to Pediatric Echo (2 credits)

This course will provide the student with an understanding of the embryonic formation of the heart and abnormalities that occur during heart development

Prerequisites: CAS 206

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

CAS 228C Echo Clinical II (3-6 credits)

This course will prepare the student to perform a 2D and Doppler cardiac sonogram and further develop their scanning skills in a clinical setting.

Prerequisites: (CAS 225L or CAS 233L) or (CAS 224C or CAS 224)

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 229L Echo Lab III (1 credit)

This course will prepare students to apply advanced measuring techniques to a cardiac sonogram while further developing their scanning skills.

Prerequisites: (CAS 225L or CAS 233L)

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 232 Echo Clinical III (4 credits)

This course will provide continued clinical experience to perfect the student's scanning skills. The student will apply knowledge learned throughout the Cardiac Sonography Program to demonstrate clinical competency in specific cardiac ultrasound procedures.

Prerequisites: CAS 229L and CAS 228

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

CAS 232C Echo Clinical III (4-8 credits)

This course will provide continued clinical experience to develop the student's scanning skills. The student will apply knowledge learned throughout the Cardiac Sonography Program to demonstrate clinical competency in specific cardiac ultrasound procedures.

Prerequisites: CAS 228 or CAS 228C

Attributes: Undergraduate

CAS 233L Echo Lab II (2 credits)

This course will prepare the student to apply hemodynamics and pathology concepts and advanced measurements techniques to cardiac sonograms while developing scanning skills.

Prerequisites: CAS 113L

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography.

Attributes: Undergraduate

Cardiovascular Technology (CVT)

CVT 200 Advanced Cardiac Life Support (1 credit)

Students will learn appropriate early treatment for cardiopulmonary arrest and cerebrovascular stroke using the Advanced Cardiac Life Support algorithms.

CVT 202 Intro to Rad Physics & Safety (1 credit)

Students will study the science of x-ray imaging and the basics of radiation safety and protection for patients and health care workers.

CVT 203 Rhythm & 12 Lead ECG Analysis (3 credits)

Students will learn to analyze and interpret cardiac rhythms.

CVT 204L Cardiovascular Simulation Lab (1 credit)

Students will apply entry level skills to perform diagnostic procedures in a simulated cardiac lab environment and will be introduced to other cardiac care areas within the health system.

Prerequisites: CVT 205 (may be taken concurrently)

CVT 205 Cardiac Invasive Procedures (3 credits)

Students will learn necessary skills to enter and safely function in the cardiovascular lab.

Prerequisites: CVT 204L

CVT 206 Cardiac A&P (3 credits)

Students will enhance their knowledge of cardiac and vascular anatomy.

CVT 207 Advanced Procedures (3 credits)

Students will be introduced to the equipment, mechanics, function and deployment of interventional equipment.

Prerequisites: CVT 205

Restrictions: Enrollment is limited to Undergraduate Division level students.

CVT 208 Introduction to Radiology (2 credits)

Students will study the science of x-ray imaging and the resultant biological effects to patients and health care workers.

CVT 212C Cardiovascular Clinical I (6 credits)

Students will apply theoretical concepts to clinical practice, while performing procedures to demonstrate competence.

Prerequisites: (HSC 160 or CVT 203) and CVT 204L and CVT 205

Attributes: Undergraduate

CVT 216 Cardiac Device Theory (3 credits)

Students will learn the fundamentals of internal cardiac devices.

CVT 217 Cardiovascular Hemodynamics (3 credits)

Students will learn normal and abnormal hemodynamic waveforms, provide analysis and perform hemodynamic calculations.

Prerequisites: CVT 205

CVT 218 Implantable Cardiac Device (3 credits)

Students will learn the fundamentals of internal cardiac devices.

Prerequisites: CVT 215

CVT 219 Cardiac Arrhythmia Therapies (3 credits)

Students will build upon their knowledge of cardiac rhythms and identify best practices for the treatment of cardiac arrhythmias.

CVT 221 Cardiac Arrhythmias & Treatmen (3 credits)

Students will build upon their knowledge of cardiac rhythms and identify best practices for the treatment of cardiac arrhythmias.

Prerequisites: CVT 215

CVT 222C Cardiovascular Clinical II (6 credits)

Students will build upon prior clinical practice and apply theoretical concepts while performing procedures to master skills and demonstrate competence in the cardiovascular lab and electrophysiology lab.

Prerequisites: (CVT 212 or CVT 212C)

Attributes: Undergraduate

CVT 225 Cardiac Pharmacology (3 credits)

Students will learn the fundamentals of pharmacology and the most frequently used drugs in the cardiovascular laboratory.

Prerequisites: CVT 217

CVT 228 Radiation Biology (1 credit)

Students will study the damage electromagnetic

Prerequisites: CVT 202

CVT 232C Cardiovascular Clinical III (3 credits)

Students will continue to apply theoretical concepts and build upon prior clinical experiences to master skills to become competent in select procedures

Prerequisites: CVT 222 or CVT 222C

Attributes: Undergraduate

Chemical Biology (CMB)

CMB 390 Chemical Biology Seminar (0 credits)

Lectures by outside and local speakers and discussions of special topics in chemical biology.

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major in Chemical Biology.

Attributes: Undergraduate

CMB 490 Introduction to Research (0 credits)

Literature and laboratory tasks under the supervision of a departmental faculty member. Requires four hours each week in the research laboratory. Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the Chemistry Department chair or the Biology Department chair and the Associate Dean in order to register.

Attributes: Undergraduate

Chemistry (CHM)

CHM 101 Chemistry for Allied Health (3 credits)

This course introduces topics in both general and organic chemistry, including atomic structure, dimensional analysis, the mole, organic nomenclature, chemistry of gases, and introduces equilibrium. Students who register for CHM 101 must also register for a CHM 101 laboratory. For example, if you register for CHM 101 you must, at the same time, register for a section of CHM 101L.

CHM 101L Chemistry Allied Health Lab (0 credits)

Students who register for CHM 101 must also register for a CHM 101 laboratory. For example, if you register for CHM 101 you must, at the same time, register for a section of CHM 101L.

CHM 112 Food Chemistry (4 credits)

The study of chemistry as it specifically relates to food. Underlying basic chemical principles will allow the study of particular molecules found in food (carbohydrates, proteins, lipids) and the changes these molecules undergo as they are cooked and absorbed. Topics will also include preservation, food safety, and food additives. This laboratory course will introduce students to the use of laboratory techniques to study food, including the measurement of food properties including pH, flavor, color, and texture. Students will learn how chemical and physical changes can alter food quality. Students who register for CHM 112 must also register for a CHM 112 laboratory. For example, if you register for CHM 112 you must, at the same time, register for a section of CHM 112L.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

CHM 112L Food Chemistry: Lab (0 credits)

Students who register for CHM 112 must also register for a CHM 112 laboratory. For example, if you register for CHM 112 you must, at the same time, register for a section of CHM 112L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

CHM 118 Chemical Sciences Orientation (1 credit)

Introduction to all aspects of the chemical sciences, including biochemistry. Students are presented with an overview of the department, the University, the curricula, active research areas, career opportunities, and scientific ethics, as well as information on how they can maximize their educational experience.

Attributes: Undergraduate

CHM 120 General Chemistry I (3 credits)

Topics included are chemical formulas, stoichiometry, balancing reactions, ideal gases, thermodynamics, atomic structure, chemical bonding and molecular structure, kinetics, equilibrium, the chemistry of acids and bases, entropy, free energy, and electrochemistry. Students who register for CHM 120 must also register for a CHM 120 laboratory. For example, if you register for CHM 120 you must, at the same time, register for a section of CHM 120L.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

CHM 120L General Chemistry Lab I (1 credit)

A laboratory course to accompany CHM 120 with emphasis upon concepts in chemistry, quantitative and qualitative analysis, and introduction to instrumental methods. One four-hour period. Students who register for CHM 120 must also register for a CHM 120 laboratory. For example, if you register for CHM 120 you must, at the same time, register for a section of CHM 120L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

CHM 125 General Chemistry II (3 credits)

Topics included are chemical formulas, stoichiometry, balancing reactions, ideal gases, thermodynamics, atomic structure, chemical bonding and molecular structure, kinetics, equilibrium, the chemistry of acids and bases, entropy, free energy, and electrochemistry. Students who register for CHM 125 must also register for a CHM 125 laboratory. For example, if you register for CHM 125 you must, at the same time, register for a section of CHM 125L.

Prerequisites: CHM 120 or CHM 121 or CH 101 or CH 111

Attributes: GEP. Science Course w/Lab, Undergraduate

CHM 125L General Chemistry Lab II (1 credit)

A laboratory course to accompany CHM 125 with emphasis upon concepts in chemistry, quantitative and qualitative analysis, and introduction to instrumental methods. One four-hour period. Students who register for CHM 125 must also register for a CHM 125 laboratory. For example, if you register for CHM 125 you must, at the same time, register for a section of CHM 125L.

Prerequisites: CHM 120L or CH 103 or CH 113

Attributes: Undergraduate

CHM 170 Special Topics in Chemistry (3 credits)

Advanced study on a topic that is arranged with a Chemistry faculty member.

Attributes: Undergraduate

CHM 204 Literature of Chemistry (1 credit)

The study of the nature and uses of the primary, secondary, and tertiary literature of chemistry and biochemistry and of modern information-retrieval techniques. Students who register for CHM 204 must also register for CHM 210.

Attributes: Undergraduate

CHM 210 Organic Chemistry I (3 credits)

Modern organic chemistry in which the treatment of aliphatic and aromatic compounds is integrated as much as possible. Reactions of the functional groups are explained in terms of electronic mechanisms. Students who register for CHM 210 must also register for a CHM 210 laboratory. For example, if you register for CHM 210 you must, at the same time, register for a section of CHM 210L.

Prerequisites: CHM 125 or CHM 126 or CH 102 or CH 112

Attributes: Undergraduate

CHM 210L Organic Chemistry Lab I (1 credit)

This semester concentrates on experiments designed to introduce students to the various techniques used in the organic laboratory. Students who register for CHM 210 must also register for a CHM 210 laboratory. For example, if you register for CHM 210 you must, at the same time, register for a section of CHM 210L.

Prerequisites: CHM 125L or CH 114 or CH 104

Attributes: Undergraduate

CHM 215 Organic Chemistry II (3 credits)

Modern organic chemistry in which the treatment of aliphatic and aromatic compounds is integrated as much as possible. Reactions of the functional groups are explained in terms of electronic mechanisms. Students who register for CHM 215 must also register for a CHM 215 laboratory. For example, if you register for CHM 215 you must, at the same time, register for a section of CHM 215L.

Prerequisites: CHM 210 or CH 201 or CH 211

Attributes: Undergraduate

CHM 215L Organic Chemistry Lab II (1 credit)

A continuation of CHM 210L utilizing micro scale laboratory techniques in organic chemistry for the preparation, purification and analysis of organic compounds. Students who register for CHM 215 must also register for a CHM 215 laboratory. For example, if you register for CHM 215 you must, at the same time, register for a section of CHM 215L.

Prerequisites: CHM 210L or CH 203 or CH 213

Attributes: Undergraduate

CHM 230 Basic Inorganic Chemistry (3 credits)

Introduction to basic inorganic chemistry, including elementary bonding theories, the chemistry of elements other than carbon, coordination chemistry, acid-base chemistry, organometallic chemistry, and solid-state chemistry.

Prerequisites: (CH 102 or CH 112 or CHM 125) and (CH 104 or CH 114 or CHM 125L)

Attributes: Undergraduate

CHM 270 Special Topics in Chemistry (3 credits)

Advanced study on a topic that is arranged with a Chemistry faculty member.

Attributes: Undergraduate

CHM 300 Discussions in Chemistry (1 credit)

Discussion of ethical issues and research opportunities in the chemical sciences as well as career planning.

Attributes: Undergraduate

CHM 310 Physical Chemistry I (3 credits)

Covers thermodynamic principles and applications to gases, liquids, and ideal and non-ideal solutions; thermodynamics of chemical reactions and equilibria, electrochemistry and reaction kinetics.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 310L Physical Chemistry Lab I (2 credits)

Experiments are performed to reinforce the concepts learned in CHM 310

Attributes: Undergraduate

CHM 315 Physical Chemistry II (3 credits)

Quantum Chemistry. The fundamental postulates of quantum mechanics are introduced in the form of historical narrative to illustrate the logical progression to quantization in natural theory. Eigenvalue problems, operator mathematics, uncertainties and orthonormality are discussed as essential portions of quantum mechanical calculations. The Schrodinger equations for the harmonic oscillator and rigid rotor are solved and related specifically to molecular spectroscopy techniques. The course ends with the description of the hydrogen atom in terms of quantum mechanics, with emphasis on the origin of the familiar atomic orbitals.

Prerequisites: CHM 310

Attributes: Undergraduate

CHM 318 Essentials of Physical Chem (4 credits)

Fundamental concepts of physical chemistry: aspects of thermodynamics including the first and second laws, chemical equilibria, solutions, surface chemistry, reaction kinetics, introduction to quantum chemistry including QM postulates/Schrodinger equation/particle in a box, rigid rotor and harmonic oscillator/hydrogen atom/many electron atom, chemical bond, molecular structure, introduction to statistical mechanics including Boltzmann distribution/partition functions.

Prerequisites: PY 212 or PHY 212

Attributes: Undergraduate

CHM 320 Physical Chem for Chem Bio (3 credits)

Study of atomic and molecular structure; chemical thermodynamics; states of matter; kinetics and mechanisms of reactions; phase and chemical equilibria; emphasis on applications in biological systems.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 322 Physical Chemistry II (4 credits)

Part of Physical Chemistry Sequence, includes quantum chemistry, reaction kinetics, spectroscopy, photochemistry, statistical mechanics, and theories of reaction rates.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 330 Instrumental Analysis (3 credits)

This course covers the theory, methodology, and instrumentation for the study of atomic and molecular species and/or processes. Students who register for CHM 330 must also register for a CHM 330 laboratory. For example, if you register for CHM 330 you must, at the same time, register for a section of CHM 330L.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 330L Instrumental Analysis Lab (2 credits)

Students who register for CHM 330 must also register for a CHM 330 laboratory. For example, if you register for CHM 330 you must, at the same time, register for a section of CHM 330L.

Prerequisites: CHM 215L

Attributes: Undergraduate

CHM 340 Biochemistry (3 credits)

A basic introduction to the chemistry of living systems emphasizing their major metabolic activities. Structure and function of proteins, lipids, and carbohydrates. Basic principles of intermediary metabolism and photosynthesis.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 340L Biochemistry Lab (2 credits)

Students who register for CHM 340 Lab must also register for a CHM 340. For example, if you register for CHM 340L you must, at the same time, register for a section of CHM 340.

Prerequisites: CHM 215L

Attributes: Undergraduate

CHM 341 Molecular Structure Biochemist (3 credits)

This introduction to biochemistry covers protein structure and function, enzyme kinetics and mechanisms, membranestructure and function, and principles of biological regulation.

Prerequisites: CH 212 or CH 202 or CHM 215

Attributes: Undergraduate

CHM 342 Nucleic Acid Biochemistry (3 credits)

Focused on molecular genetics. Topics include structure, replication, transcription, translation, repair, recombination, and processing of nucleic acids; control of gene expression; and modern recombinant methods of DNA splicing, cloning, and sequencing.

Prerequisites: CH 341 and BS 462 and BS 462L

Attributes: Undergraduate

CHM 343 Metabolic Biochemistry (3 credits)

Catabolic and anabolic pathways with emphasis on chemical logic, mechanisms, and regulatory control. Also includes carbohydrate, lipid, amino acid, and nucleotide metabolism, and oxidative and photosynthetic phosphorylation.

Prerequisites: CHM 340 or CHM 341

Attributes: Undergraduate

CHM 350 Inorganic Chemistry (3 credits)

This course includes the study of atomic structure, bonding, molecular orbital theory, symmetry and group theory, the chemistry of the main group elements, and the structure and reactivity of transition metal complexes. Students who register for CHM 350 must also register for a CHM 350 laboratory. For example, if you register for CHM 350 you must, at the same time, register for a section of CHM 350L.

Prerequisites: CHM 215 or CH 212 or CH 331

Attributes: Undergraduate

CHM 350L Inorganic Chemistry Lab (2 credits)

Students who register for CHM 350 must also register for a CHM 350 laboratory. For example, if you register for CHM 350 you must, at the same time, register for a section of CHM 350L.

Prerequisites: CHM 215L

Attributes: Undergraduate

CHM 360 Nanochemistry (3 credits)

This course covers the synthesis, characterization and physical properties of materials chemistry systems on the length scale of individual molecules. Emphasis is placed on the distinction between macro- and nanoscale properties of matter. Course topics to include (but not limited to): quantum confinement in semiconductor nanocrystals; localized surface plasmon resonance (LSPR), superhydrophobicity in self-assembled monolayers; electronic and mechanical properties of 2D materials

Prerequisites: CHM 215 and (MAT 161 or MAT 155) and (PHY 102 (may be taken concurrently) or PHY 106 (may be taken concurrently))

Attributes: Undergraduate

CHM 361 Analytical Chemistry (3 credits)

Introductory analytical chemistry with emphasis on relevant chemical principles, combining both classical and modern instrumental techniques. Students who register for CHM 361 must also register for a CHM 361 laboratory. For example, if you register for CHM 361 you must, at the same time, register for a section of CHM 361L.

Prerequisites: (CH 102 or CH 112 or CHM 125) and (CH 104 or CH 114 or CHM 125L)

Attributes: Undergraduate

CHM 361L Analytical Chemistry Laborator (1 credit)

Students who register for CHM 361 must also register for a CHM 361 laboratory. For example, if you register for CHM 361 you must, at the same time, register for a section of CHM 361L.

Prerequisites: CH 104 or CH 114 or CHM 125L

CHM 370 Special Topics in Chemistry (3 credits)

Advanced study on a topic that is arranged with a Chemistry faculty member.

Attributes: Undergraduate

CHM 390 Chemistry Seminar (0 credits)

Lectures by outside and local speakers and discussions of special topics in chemistry. Enrollment is required each semester for junior and senior chemistry majors.

Attributes: Undergraduate

CHM 401 Seminar in Chemistry I (1 credit)

Chemical and biochemical topics of current interest presented orally by students and invited guest speakers. Writing, speech, delivery, and use of visual aids are critiqued. All biochemistry, chemistry, and pharmaceutical chemistry majors, and other interested persons are invited to attend.

Attributes: Undergraduate

CHM 402 Seminar in Chemistry II (1 credit)

Lectures by outside and local speakers and discussions of special topics in Chemistry

Prerequisites: CH 401 or CHM 401

Attributes: Undergraduate

CHM 410 Biophysical Chemistry (3 credits)

This course utilizes the concepts of physical chemistry to understand the properties of biological systems. Students who register for CHM 410 must also register for a CHM 410 laboratory. For example, if you register for CHM 410 you must, at the same time, register for a section of CHM 410L.

Prerequisites: CHM 310 or CHM 320

Attributes: Undergraduate

CHM 411 Medicinal Chemistry (3 credits)

A study of the biochemical mechanisms of drug action in order to develop a rational approach to the analysis of drugs and their metabolites and to design new drugs.

Prerequisites: CH 341 or CHM 341

Attributes: Undergraduate

CHM 414 Structure-Activity Relationships (3 credits)

Selected classes of medicinal agents are examined, stressing general structures, synthesis, and, in particular, the relationships between structure and pharmacological activity.

Prerequisites: CH 212 or CHM 215

Attributes: Undergraduate

CHM 420 Atmospheric Environmental Chem (3 credits)

This course examines the behavior of chemical species in the atmosphere. Topics include: stratospheric chemistry and the role of ozone, tropospheric chemistry and photochemical smog formation, precipitation, aerosol chemistry, indoor and urban air quality and regulatory efforts, energy, the chemistry of global climate and potential mitigation strategies, biogeochemical cycling of elements, and green chemistry.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 430 Mechanisms in Organic Chem (3 credits)

Application of the electron pushing formalism for manipulating Lewis structure representations of organic structures. Emphasis is placed on mechanistic rationalization of complex organic transformations. Classes of mechanisms include elimination, substitution, rearrangement, oxidation-reduction, enolate alkylation, and others.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 440 Organometallic Chemistry (3 credits)

This course will focus on the structure and reactivity of organometallic transition metal complexes. Topics include catalysis, reaction mechanisms, applications to organic chemistry, and characterization by spectroscopic methods.

Prerequisites: CHM 350

Attributes: Undergraduate

CHM 444L Biochemistry Laboratory I (1 credit)

Techniques of isolation, purification, and assay of representative biomolecules, particularly proteins.

Prerequisites: (CH 341 or CHM 341)

Attributes: Undergraduate

CHM 445L Biochemistry Laboratory II (1 credit)

This laboratory course focuses on advanced biochemical techniques for the analysis of proteins, nucleic acids, and metabolites. Experiments include enzyme kinetics, chromatography, electrophoresis, and spectroscopic methods for biomolecular characterization. Students will gain hands-on experience in experimental design, data collection, and interpretation of biochemical assays.

Prerequisites: CH 444 and BS 462 or BIO 462 (may be taken concurrently)

Attributes: Undergraduate

CHM 448 Computer Aided Drug Design (3 credits)

Introduction to the theory and practice of molecular modeling, especially as applied to the problem of identifying and designing bioactive and therapeutic agents, using specialized software and advanced computer hardware such as workstations and supercomputer clusters.

Prerequisites: CH 341

Attributes: Undergraduate

CHM 450 Polymer Chemistry (3 credits)

This course explores the fundamental principles of polymer science, including polymer synthesis, structure, and properties. Topics include step-growth and chain-growth polymerization, molecular weight distribution, viscoelasticity, thermal properties, and applications of polymers in industry and medicine. Special emphasis is placed on the relationship between molecular structure and macroscopic material properties.

Prerequisites: CHM 310

Attributes: Undergraduate

CHM 460 Water Chemistry (3 credits)

This course examines the behavior of chemical species in natural and engineered water systems and their interactions with the terrestrial environment. Topics include: the chemical composition of surface and subsurface water; geochemical controls on water composition; equilibrium and kinetic processes in aquatic systems; fate and reactions of inorganic and organic constituents in water; acid-base chemistry, complexation chemistry, and redox chemistry in water; the applications of isotopic and other tracers in the study of aquatic systems; water pollution and treatment.

Prerequisites: CHM 215

Attributes: Undergraduate

CHM 470 Special Topics (3 credits)

Advanced study on a topic that is arranged with a chemistry faculty member. Permission of the Department of Chemistry chair is required.

Attributes: Undergraduate

CHM 480 Inorganic Biochemistry (3 credits)

The chemical and biological properties of various metal ions in biological systems will be examined at the molecular level. Permission of the Department of Chemistry chair is required.

Prerequisites: CHM 215 and CHM 340

Attributes: Undergraduate

CHM 491 Chemistry Internship I (3 credits)

An approved internship in chemistry.

Attributes: Undergraduate

CHM 492 Chemistry Internship II (3 credits)

An approved internship in chemistry.

Attributes: Undergraduate

CHM 495 Undergraduate Research (1-3 credits)

Qualified students may elect to carry out research in analytical, inorganic, organic, or physical chemistry or biochemistry under the direction of a member of the department.

CHM 510 Organic Chemistry I (3 credits)

Modern organic chemistry in which the treatment of aliphatic and aromatic compounds is integrated as much as possible. Reactions of the functional groups are explained in terms of electronic mechanisms.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 515 Organic Chemistry II (3 credits)

Modern organic chemistry in which the treatment of aliphatic and aromatic compounds is integrated as much as possible. Reactions of the functional groups are explained in terms of electronic mechanisms.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 520 Essentials Physical Chemistry (3-4 credits)

Fundamental concepts of physical chemistry: aspects of thermodynamics including the first and second laws, chemical and phase equilibria, solutions, surface chemistry, reaction kinetics, introduction to quantum chemistry including QM postulates/Schrodinger equation/particle in a box, rigid rotor and harmonic oscillator/hydrogen atom/many electron atom, chemical bond, molecular structure, introduction to statistical mechanics including Boltzmann distribution/partition functions.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 521 Physical Chemistry I (3-4 credits)

Covers thermodynamic principles and applications to gases, liquids, and ideal and non-ideal solutions; thermodynamics of chemical reactions and equilibria, electrochemistry and reaction kinetics.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 522 Physical Chemistry II (3-4 credits)

Continuation of Physical Chemistry I, including quantum chemistry, reaction kinetics, spectroscopy, photochemistry, statistical mechanics, and theories of reaction rates.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 530 Instrumental Analysis (3 credits)

This course covers the theory, methodology, and instrumentation for the study of atomic and molecular species and/or processes. Students who register for CHM 530 must also register for a CHM 530 laboratory. For example, if you register for CHM 530 you must, at the same time, register for a section of CHM 530L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 530L Instrumental Analysis Lab (2 credits)

This course covers the theory, methodology, and instrumentation for the study of atomic and molecular species and/or processes. Students who register for CHM 530 must also register for a CHM 530 laboratory. For example, if you register for CHM 530 you must, at the same time, register for a section of CHM 530L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 560 Nanochemistry (3 credits)

This course covers the synthesis, characterization and physical properties of materials chemistry systems on the length scale of individual molecules. Emphasis is placed on the distinction between macro- and nanoscale properties of matter. Course topics to include (but not limited to): quantum confinement in semiconductor nanocrystals; localized surface plasmon resonance (LSPR), superhydrophobicity in self-assembled monolayers; electronic and mechanical properties of 2D materials

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 570 Special Topics (3-4 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 610 Biophysical Chemistry (3 credits)

This course utilizes the concepts of physical chemistry to understand the properties of biological systems.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 620 Atmospheric Environmental Chem (3 credits)

This course examines the behavior of chemical species in the atmosphere. Topics include: stratospheric chemistry and the role of ozone, tropospheric chemistry and photochemical smog formation, precipitation, aerosol chemistry, indoor and urban air quality and regulatory efforts, energy, the chemistry of global climate and potential mitigation strategies, biogeochemical cycling of elements, and green chemistry.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 630 Mechanisms in Organic Chem (3 credits)

Application of the electron pushing formalism for manipulating Lewis structure representations of organic structures. Emphasis is placed on mechanistic rationalization of complex organic transformations. Classes of mechanisms include elimination, substitution, rearrangement, oxidation-reduction, enolate alkylation, and others.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 640 Organometallics (3 credits)

This course will focus on the structure and reactivity of organometallic transition metal complexes. Topics include catalysis, reaction mechanisms, applications to organic chemistry, and characterization by spectroscopic methods.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 642 Nucleic Acid Biochemistry (3 credits)

Focused on molecular genetics. Topics include structure, replication, transcription, translation, repair, recombination, and processing of nucleic acids; control of gene expression; and modern recombinant methods of DNA splicing, cloning, and sequencing.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 660 Water Chemistry (3 credits)

This course examines the behavior of chemical species in natural and engineered water systems and their interactions with the terrestrial environment. Topics include: the chemical composition of surface and subsurface water; geochemical controls on water composition; equilibrium and kinetic processes in aquatic systems; fate and reactions of inorganic and organic constituents in water; acid-base chemistry, complexation chemistry, and redox chemistry in water; the applications of isotopic and other tracers in the study of aquatic systems; water pollution and treatment.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 670 Special Topics (4 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Graduate

CHM 680 Inorganic Biochemistry (3 credits)

The chemical and biological properties of various metal ions in biological systems will be examined at the molecular level. Permission of the Department of Chemistry chair is required.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 690 Spectroscopy (3 credits)

This course provides an exposure to aspects of spectroscopic theory, methods, and instrumentation that are not covered in Instrumental Analysis.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 700 Intro to Graduate Studies (1-3 credits)

Individualized coursework designed to strengthen a student's background prior to taking advanced graduate courses.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 711 Medicinal Chemistry (3 credits)

A study of the biochemical mechanisms of drug action in order to develop a rational approach to the analysis of drugs and their metabolites and to design new drugs.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 714 Structure-Activity Relationships (3 credits)

Selected classes of medicinal agents are examined, stressing general structures, synthesis, and, in particular, the relationships between structure and pharmacological activity.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 716 Chemical Synthesis Laboratory (3 credits)

Techniques of organic and inorganic synthesis, including reaction control, vacuum and fractional distillation, uniform reagent addition, controlled stirring, operation in inert atmosphere, safe handling of toxic or unstable reagents, and chromatographic purification.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 718 Heterocyclic Chemistry (3 credits)

A study of the major types of aromatic and nonaromatic heterocyclic compounds with a special interest in those having biochemical activity: their synthesis, physical properties, reactivity, and influence on living systems, etc.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 720 Apps of Computational Chem (3 credits)

Introduction to the theory and applications of computational chemistry methods, including quantum mechanics, density functional theory, and classical molecular dynamics simulation methods. Project-based exercises on applying the above methods to chemical/biochemical processes while utilizing state-of-the-art computational software packages.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 721 Chemical Kinetics (3 credits)

The study of theoretical aspects of reaction kinetics and the experimental methods used to measure the rates of reactions.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 728 Advanced Biochemistry (3 credits)

Selected topics in protein structure and function, especially enzymology.

Restrictions: Enrollment is limited to Graduate level students.

CHM 733 Computational Chemistry (3 credits)

This course will give hands on training in current computational chemistry methods. Particularly on how to manipulate large data sets through computational algorithms and programs. The course will explore and have hands on training with practical computational methods currently used in modern computational research.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CHM 748 Computer Aided Drug Design (3 credits)

Introduction to the theory and practice of molecular modeling, especially as applied to the problem of identifying and designing bioactive and therapeutic agents, using specialized software and advanced computer hardware such as workstations and supercomputer clusters.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 786 Research Ethics (1 credit)

This course will provide an examination of ethical behavior and practice in scientific research. The course will follow a case study format in which students will be expected to present and participate in group discussions.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 802 Research Seminar (2 credits)

Students present a formal seminar based on their research endeavors.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 815 Intro to Polymer Chemistry (3 credits)

This course will cover basic concepts and the most important topics in modern polymer science including synthesis, physical properties, and current applications.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 878 Introduction to Research (1 credit)

A laboratory rotation through two seven-week chemical, biochemical, or pharmacognosy research projects for graduate students matriculated in a graduate program in the Department of Chemistry & Biochemistry.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 887 Graduate Colloquium (1 credit)

This course will highlight and help students develop the skills needed to be successful graduate school. We will discuss many components of the graduate school, such as (but not limited to) reading and critiquing papers, writing papers and grants, getting along with lab mates, and being an effective instructor. We will go over some strategies for life balance which will include having fun and learning during this process. This course will help you prepare you for the next step(s) in your career.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 892 Non-trivial Problems in Chem (3 credits)

This course will discuss the practical aspects of solving everyday problems encountered in research in the physical and natural sciences. Students will apply knowledge from different fields of chemistry and various other scientific disciplines to solve chemical problems. Students will also learn the application of mathematical modeling and numerical fitting to quantitatively determine solutions to these problems.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 897 Scientific Proposals (3 credits)

This course is designed to guide students in the development of an F31 - Kirschstein NRSA grant application. The course is heavily weighted in writing and peer assessment of grant proposals. By the end of the course, students will be expected to have completed the Specific Aims page and Research Plan sections of the F31 application. For thesis students, the application must be focused on the student's approved research prospectus and build upon current research in the student's thesis laboratory. Student's without an approved research prospectus, part-time extramural thesis students and non-thesis graduate students will develop a grant application focused on a research project of interest.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

CHM 899 Graduate Research (1-9 credits)

Candidates for the Doctor of Philosophy degree, specializing in chemistry, biochemistry, or pharmacognosy, are required to fulfill their research requirement under the direction of a faculty member in the department graduate program.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

Child and Family Studies (CFS)

CFS 101 Intro to Child & Family Studies (3 credits)

This interdisciplinary course focuses on historical perspectives and current trends in the field of Human Development and Family Science (HDFS), with a focus on the subfield of Child and Family Studies (CFS). Students will examine how the influences of anthropology, education, health/hospice care, law, politics, psychology, and sociology have shaped and continue to shape the fields of HDFS and CFS. Course content, class discussions, assignments, and exams are infused with current research, theory, ethics, and standards of professionalism from the field, and it addresses key areas of child development, family systems theory, play, trauma, law, community partnerships and advocacy, and influences of digital media.

Restrictions: Enrollment is limited to students with a major in Child Family Studies.

Attributes: Undergraduate

CFS 290 CFS Professional Prep Seminar (1 credit)

Are you interested in learning more about what options you have with a Child and Family Studies major following graduation? What are the common career paths pursued by most graduates with a Child and Family Studies major? Do you know if graduate school is in your future and what programs would be appropriate to pursue? This one-credit Career Prep Seminar will enhance your knowledge about careers within your major and help you build practical skills through class instruction, assignments, and alumni exposure throughout the semester. Additionally, it will also provide instruction and skills in areas that include exploring career options, searching for and applying to graduate school, preparing a resume and cover letter, and building communication skills for interviews and networking.

Restrictions: Enrollment is limited to students with a major in Child Family Studies.

Attributes: Undergraduate

CFS 350 Crgvr Prof Prtnrshps & Advocacy (3 credits)

This course will focus on the importance of establishing nurturing and collaborative relationships between early childhood professionals and families of young children. Emphasis will be placed on research-supported practices of partnering with diverse families through the establishment of trusting/reciprocal relationships that build on families' strengths and priorities in order to support the needs of their children. Students will learn about multiple family theories, and they will become familiar with research-supported practices on ways to develop caregiver-professional relationships, access community resources, and utilize advocacy systems that are fundamental in supporting children and families.

Restrictions: Enrollment is limited to students with a major in Child Family Studies.

Attributes: Undergraduate

CFS 400 Internship: Child & Family St (3 credits)

This internship and seminar course provides students with the ability to gain experience in the field working directly with young children, families, and professionals in community-based settings. The community-based setting where the student will be placed and the focus of this semester-long experience will align with both the student's concentration area in the CFS major and their future related goals in working with young children and families following graduation from Saint Joseph's University. In addition to weekly engagement in a related community-based setting, students concurrently attend a seminar once each week where they can share their experiences in the field and relate them to the course content they have studied in the CFS program.

Restrictions: Enrollment is limited to students with a major in Child Family Studies.

Attributes: Undergraduate

Chinese (CHN)

CHN 101 Beginning Chinese I (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students with no experience with the Chinese language.

Prerequisites: Language Placement with a score of CH101

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

CHN 102 Beginning Chinese II (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension, with some focus on understanding Chinese characters. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice mid level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: CHN 101 or Language Placement with a score of CH102

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

CHN 170 Special Topics in Chinese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

CHN 201 Intermediate Chinese I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice high/intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: CHN 102 or Language Placement with a score of CH201

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

CHN 202 Intermediate Chinese II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: CHN 201 or Language Placement with a score of CH202

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

CHN 270 Special Topics in Chinese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

CHN 301 Chinese Conv and Comp I (3 credits)

This course is designed to give the student the necessary practice in spoken and written Chinese with special emphasis on the more difficult modern Chinese grammatical constructions and idioms.

Prerequisites: CHN 202 or Language Placement with a score of CH301

Attributes: Asian Studies Course, Undergraduate

CHN 302 Chinese Conv and Comp II (3 credits)

This course is designed to give the student the necessary practice in spoken and written Chinese with special emphasis on the more difficult modern Chinese grammatical constructions and idioms.

Prerequisites: CHN 301 or Language Placement with a score of CH302

Attributes: Asian Studies Course, Undergraduate

CHN 306 Advanced Chinese I (3 credits)

The course is the first course of the Advanced Chinese series (Chinese 306, 307). It is designed for students who have reached the intermediate level of the Chinese language proficiency and are interested in continuing advanced training in vocabulary, sentence structure, and rhetoric. This course aims to expand students' vocabulary by introducing about 350 new characters, to enhance their understanding of Chinese sentence patterns by focusing on more advanced linguistic structures, and to further develop their conversation and composition skills. This course aims to develop students' Chinese language proficiency to the advanced low level and to enhance the students' understanding of Chinese culture and current issues. The differences between the "written style" (## # shūmiàny#) and the "spoken style" (###k#utóuy#) Chinese will be emphasized and practiced. This course may count as 3 credit hours of upper-division course work in the Asian Studies major and/or Chinese Minor.

Prerequisites: CHN 302

Attributes: Undergraduate

CHN 307 Advanced Chinese II (3 credits)

This is the second course of the Advanced Chinese series (Chinese 306, 307). It is designed for students who have completed CHN 306 and are interested in continuing advanced training in vocabulary, sentence structure, and rhetoric. This course continues expanding students' vocabulary by introducing about 350 new characters, to enhance their understanding of Chinese sentence patterns by focusing on more advanced linguistic structures, and to further develop their conversation and composition skills. Students will also be expected to conduct a significant, relevant project including both written and oral components. This course may count as 3 credit hours of upper-division course work in the Asian Studies major and/or Chinese Minor.

Prerequisites: CHN 306

Attributes: Undergraduate

CHN 310 Selections in Chinese Lit (3 credits)

Introduction to Chinese Literature and its history. Selected readings of plays, essays, novels, short stories, and poetry. Taught in Chinese.

Prerequisites: CHN 307

Attributes: Asian Studies Course, GEP Art/Literature, Undergraduate

CHN 330 Chinese for Business (3 credits)

This course is for students interested in conducting business in a Chinese business environment. It is designed for students in their fourth year with the Chinese program. The class will be conducted in Chinese. Simplified characters will be used. The language skills covered focus on the usage of business terms, dialogues in business settings, and business related readings. The class activities will provide students with opportunities to simulate business situations and formal socializing situations, such as visiting customers, asking about prices, negotiating a contract, and arranging delivery of goods and payments. Students will be trained to write resumes, to write various forms of business correspondence, to read business related articles, and to listen to broadcasts of economic and foreign trade news. Sociol-cultural awareness in business will be discussed in depth.

Prerequisites: CHN 301 or CHN 302

Attributes: Undergraduate

CHN 370 Special Topics in Chinese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

CHN 470 Selected Topics - Chinese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

Classics (CLA)

CLA 206 Sports and Spectacles in Clas (3 credits)

The course draws on historical sources and material culture to investigate the genesis, evolution, and social importance of athletics (track and field events, combat sports, and equestrian competitions) and public spectacles (gladiatorial combats, chariot races, and reenactments of battles) in ancient Greece and Rome, respectively. Topics explored include: the history of the ancient Olympics and other Crown Games; the importance of religion, socio-economic status, and gender in ancient sports; the relation between politics and spectacles in ancient Rome; the ethical protocols of Greek athletics; and the role of ancient sports in the history of the modern Olympic Games.

Attributes: Classical Studies Course, GEP. Ethics Intensive, GEP. Art/Literature, Undergraduate

CLA 493 Ind. Research in Classics (3 credits)

The student will study a Greek or Latin author whose works are not treated in the usual sequence of courses. Or the student may undertake a research project in the Classical field that is acceptable to the Department.

Attributes: Ancient Studies Course, Classical Studies Course, Undergraduate

CLA 494 Ind. Research in Classics (3 credits)

The student will study a Greek or Latin author whose works are not treated in the usual sequence of courses. Or the student may undertake a research project in the Classical field that is acceptable to the Department.

Attributes: Ancient Studies Course, Classical Studies Course, Undergraduate

Clinical Mental Health Counseling (CNS)

CNS 500 Ethic Legal & Prof Iss in Coun (3 credits)

This course is an introduction to the counseling profession and includes the historical development of the profession, as well as ethical codes specific to the roles and functions of counselors, advocacy, current trends, and critical legal aspects of counseling practice. Systems of mental health care delivery, interdisciplinary care, and multiple clinical settings are explored. Students are oriented to professional organizations in counseling, self care for counselors, and the supervision process in the development of counselors.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 505 Coun Theories & Techniques (3 credits)

This course provides an in-depth exploration of counseling theories and models of social justice and advocacy, emphasizing the application of these frameworks to clients from diverse cultural, developmental, and contextual backgrounds. Students will enhance their case conceptualization skills by applying critical thinking and clinical reasoning to address the unique needs of clients across a variety of cultural and family systems. Through the use of culturally sustaining and responsive counseling techniques, students will learn strategies to build and maintain effective therapeutic relationships across different service delivery modalities. The course will guide students in developing collaborative, developmentally appropriate treatment plans that prioritize client-centered goals and foster the change process. Additionally, students will learn to adapt counseling techniques to accommodate client culture, abilities, and preferences, utilizing evidence-based approaches for prevention and intervention. By the end of the course, students will integrate these principles to develop a personalized counseling model grounded in theory and research, equipping them to advocate for and serve diverse client populations effectively and ethically.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 510 Counseling Across the Lifespan (3 credits)

This course addresses the application of human development theory to the profession of counseling, emphasizing the application of developmental theories and related research to clinical practice with clients at all developmental levels. The impact of systemic, environmental, and traumatic experiences on human development across the lifespan is addressed. Strategies for emphasizing optimal development are addressed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 515 Career Counseling (3 credits)

This course includes theories and models of career development combined with approaches to assessing factors that impact experiences of work and career. It includes strategies for advocating for clients' career and educational development as well strategies for program planning and evaluation. Decision making and career planning interventions are presented with opportunities for application.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 520 Group Counseling (3 credits)

This course is an introduction to group counseling processes, research, theories, and techniques. The course includes an experiential learning component during which students participate as program members will learning fundamental skills and techniques for designing and implementing group counseling activities and understanding group dynamics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 525 Counseling Skills & Techniques (3 credits)

This application-based course includes an orientation to a variety of techniques suitable for multiple settings, delivery formats, and populations. Students learn empathic listening and interviewing skills that promote therapeutic relationships. Low residency requirement.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 530 Assessment Practices for Coun (3 credits)

This course introduces counselors to the ethical use of a variety of assessment methods for assessment of abilities, behaviors, symptoms, and other characteristics relevant to counseling. It includes procedures for assessing risk of danger, harm, and suicide and procedures for identifying trauma and abuse. The use of assessment results in the diagnostic process is addressed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 535 Cult Div, Iden & Soc Justice (3 credits)

This course examines the effects of power and privilege for counselors and clients, including strategies for identifying and eliminating bias and prejudices that impact mental health. Theories of advocacy, identity development and multicultural counseling are explored. Experiential learning activities are designed to promote students' understanding of self and diverse clients.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 540 Res & Prog Eval in Coun Pract (3 credits)

This course emphasizes the importance of using research to inform counseling practice. It includes ethical and culturally relevant strategies for conducting, interpreting, and reporting research and program evaluation in counseling.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 545 Crisis Coun Trauma, Violence (3 credits)

This course addresses the origins of violence, the impact of traumatic and disaster events on development, and an understanding of interpersonal relationships to inform ethical and culturally responsive counseling interventions for individuals and families, as well as community-based intervention strategies. Models of psychological first aid are addressed

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 550 Psychopathology (3 credits)

This course focuses on the knowledge and skills required for counselors to address a variety of mental health disorders using current diagnostic classification systems and documentation practices. A study of the history, theories, symptoms and etiology of mental and emotional disorders, including sociocultural factors related to mental health, is provided.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 555 Sexuality Counseling (3 credits)

This course introduces counseling issues related to sexuality and gender in contemporary society. Through course readings, experiential activities, and asynchronous class discussions, students will critically examine their own comfort levels in discussing sexuality, analyzing challenging topics that may arise in client sessions. Students will develop an awareness of societal issues pertinent to individuals with diverse genders and sexualities and demonstrate knowledge of counseling approaches and interventions specific to the lived experiences of these populations.

This course encourages students to explore how their views on gender and sexuality have been shaped by historical and sociopolitical contexts, as well as by their own lived experiences. Students will evaluate sexuality development across the lifespan, distinguishing developmentally appropriate issues from sexual disorders and mental health concerns to inform case conceptualization and treatment. Additionally, this course addresses ethical and cultural considerations essential for working with clients on sexuality-related issues, with particular attention to applying these principles in practice. Topics include biopsychosocial development; cultural factors affecting gender socialization; sexual and affectional orientation; social and family systems considerations; and aspects of gender and sexuality in mental health. An intersectional approach, which includes awareness of multiple social locations (e.g., gender, race, class, ethnicity, religion, age, affectional/sexual orientation, ability, size, immigration status, etc.), will be central to all discussions.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 560 Family & Couples Couns Techniq (3 credits)

This course prepares counselors to work with couples and families using a variety of theories and models with attention to the impact of gender and culture on family life and the counseling process. The theories and models are critiqued in terms of family development, conditions for change, techniques, and goals of counseling.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 565 Addictions Counseling (3 credits)

This course provides an introduction to addictive use disorders and the history and development of addiction counseling. Cultural differences and ethical practices in the evaluation and treatment of addictive use disorders in a variety of settings are addressed. Current research and evidence-based practices in the treatment of addictions will be emphasized.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 570 Special Topics in Counseling (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Graduate

CNS 575 Family Systems and Addictions (3 credits)

This course provides a comprehensive overview of addiction theories, neurobiological factors, and their impact on family systems, with a focus on counseling approaches for families affected by substance use and co-occurring conditions. Students will explore foundational counseling theories and intervention models to address addiction within family dynamics, emphasizing the identification of substance use patterns and effective referral processes to support recovery. Through the relevant models, students will gain insight into the progressive stages of addiction services, including crisis intervention, treatment, and aftercare. Special considerations for counseling families affected by addiction will be highlighted, preparing students to respond to the complex needs of families navigating the challenges of substance use and recovery.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 580 Diag, Treat & Recov in Addict (3 credits)

This course provides a comprehensive study of addictions counseling practice including prevention programs, screening and assessment, diagnostic interviewing, and interventions for substance abuse and other addictions. The course includes strategies for helping clients to reduce negative effects of addictive disorders.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 585 Psychopharmacology (3 credits)

This course will introduce students to the pharmacology and dynamics of addiction. Students will learn about the effects of substance use on the brain and body, basic drug classifications, and indications and contraindications of drugs to make appropriate referrals for intervention, evaluation, and providing basic client education.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 590 Intgrtv Prac Grief Loss Counsl (3 credits)

This course is designed to prepare counselors to critically evaluate and integrate diverse grief theories, models, and evidence-informed practice to develop a comprehensive understanding of the individualized nature of grief and loss across diverse contexts. Legal and ethical considerations as well as an exploration of self-care strategies to employ when discussing grief and loss will be addressed.

Attributes: Graduate

CNS 595 Contemp Issues in Counseling (3 credits)

This course is designed to prepare counselors to critically examine and address emerging complexities in the counseling field. Course participants will apply ethical decision-making processes, integrate culturally-relevant practices, and examine contemporary issues related to diversity, equity, and inclusion within counseling practice. Technology-assisted counseling roles and procedures will be explored in the context of current day practice.

Attributes: Graduate

CNS 600 Practicum (3 credits)

This is an introductory clinical field placement course wherein students work directly with clients under the supervision of a licensed counselor for a minimum of 100 hours, including at least 70 hours of direct client interaction. The course serves as an introduction to a real world setting and each placement must be approved by the department one semester prior to enrollment. Aspects of professional work including documentation and referral, and professional credentialing are introduced. University-based weekly group supervision and weekly on site individual or triadic supervision are required.

Prerequisites: CNS 500 and CNS 505 and CNS 510 and CNS 515 and CNS 520 and CNS 525 and CNS 530 and CNS 535 and CNS 540

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 605 Foundations: School Counseling (3 credits)

This course introduces students to the profession of school counseling by providing historical and philosophical overviews. Students will learn relevant models of school counseling programs and current evidenced based practices to promote leadership and advocacy in K-12 school settings.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 610 Counseling Children in Schools (3 credits)

This course includes an overview of personal, social, behavioral, and developmental concerns within children and adolescent populations. Students will learn research based approaches and techniques applicable in school settings to promote academic success and overall wellness.

Attributes: Graduate

CNS 615 College and Career Readiness (3 credits)

This course addresses theories and models of career development appropriate for K-12 school settings. Students will learn approaches to increase promotion and graduation rates, interventions to promote college and career readiness, and strategies to promote equity in student achievement and college access.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 620 Seminar in School Counseling (3 credits)

This course addresses the multiple roles of school counselors as leaders, consultants, and advocates in the school setting. Students will learn to design, implement, and evaluate a comprehensive developmental K-12 school counseling program that promotes equity and academic achievement.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CNS 625 Rlgn&Spirituality Cnslng Prac (3 credits)

This course is designed to prepare counselors to recognize diverse religious and spiritual belief systems, apply culturally-relevant spiritual assessment and practice tools into counseling, and recognize the role of belief systems in relation to identity, mental health, and wellbeing. Ethical considerations emphasizing the importance of professional boundaries and respect for persons' autonomy in regards to religion and spirituality will be explored.

Attributes: Graduate

CNS 691 Internship I (3 credits)

This course requires completion of 300 hours of supervised counseling internship, including at least 240 hours of direct client care in a setting approved by the department one semester prior to enrollment. University-based weekly group supervision and weekly on site individual or triadic supervision are required.

Prerequisites: CNS 530 and CNS 545 and CNS 550 and CNS 600

Attributes: Graduate

CNS 692 Internship II (3 credits)

This is an advanced experience in direct client care requiring completion of 300 hours of supervised counseling internship, including at least 240 hours of direct client care. University-based weekly group supervision and weekly on site individual or triadic supervision are required.

Prerequisites: CNS 605

Attributes: Graduate

College Studies (CSS)

CSS 101 College Studies Seminar (3 credits)

This course imparts knowledge and skills in digital and information literacy, critical thinking, communication, collaboration, and engagement with diverse communities and resources in order to promote learner success.

Attributes: Undergraduate

Communications (COM)

COM 100 Introduction to Communication (3 credits)

Focuses on factors and processes involved in interpersonal communication: source and receiver variables, verbal and nonverbal messages, and strategic interaction. Prepares students to argue policy topics and make short speeches.

COM 101 Communication and Public Life (3 credits)

Students explore the relationships between media and communication in public and private settings, including culture industries, social and civic institutions and professions. The course also examines how technology shapes media and communication practices and processes.

Attributes: Undergraduate

COM 150 First Year Seminar (3 credits)

First-Year seminar course in Communications.

Attributes: First-Year Seminar, Undergraduate

COM 170 Communications Special Topics (1-4 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

COM 175 My Digital Life (3 credits)

We live in digital media, not with it. The question is no longer whether it's good or bad for us, but how we make sense of our immersion in social media, streaming and constant connection. How does it impact who we are, who we have been and who we will become - as individuals and as a society? This course tackles myriad issues related to our digital lives, from addiction and attention to free speech and the "counterfeit self." By the end of the course, students will be able to: explain the role of media in their lives, recognize the way digital media shape their understanding of the world, and analyze moral and ethical dilemmas that arise in our digital lives.

Restrictions: Students cannot enroll who have a major, minor, or concentration in Communication Studies.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Undergraduate

COM 200 Multimedia Storytelling I (3 credits)

This introductory-level creative course in the theory and practice of mediamaking exposes students to the unique storytelling capabilities of a range of digital media formats. Through a series of hands-on projects, students develop creative and critical thinking skills in topics related to self-awareness, identity, and society, as well as examine how communication technologies impact the relationships between audiences, producers, and content.

Attributes: CCC: F&P Arts, Design & Creative, Undergraduate

COM 201 Media and Society (3 credits)

This course explores ethical issues in the field of communications.

Themes include: privacy, civic media, citizen journalism, copyright, intellectual property, cyber bullying, net neutrality, social networking, global ethics, and digital divides. Students develop skills in applied ethical decision making, democratic dialogue, and civic participation through a range of projects in both online and community settings.

Attributes: Undergraduate

COM 202 Visual Design I (3 credits)

This course is an introduction to design within the discipline of communications. Framing design as a rhetorical process, student-designers create hands-on projects and make effective choices for their purpose, audience, and context. In the production of work, students consider ethical issues in design (such as accessibility, visual stereotypes, and cultural differences) and how design choices may shape emotions and contexts for others to experience. Students develop skill in visual communication, including typography, color, file organization, and layout for print and digital media using graphic design software. The course incorporates opportunities for student-centered learning, such as frequent work in small groups during class time and peer reviews of projects.

Attributes: CCC: F&P Arts, Design & Creative, Undergraduate

COM 203 Audio/Video I (3 credits)

In this course, we focus on the methods, theories, and tools of field-based audiovisual production. Students will practice videography, and audio recording in both field- and studio-based environments, and will learn how to edit and revise content in the Adobe Creative Suite. Working throughout the semester on these production skills rooted in rhetorical principles of genre, audience and purpose, students will create a multimedia portfolio of work.

Prerequisites: COM 200 and COM 201

Attributes: CCC: F&P Arts, Design & Creative, Undergraduate

COM 204 Public Speaking (3 credits)

Course covers principles and practices of effective oral presentation.

Lectures and exercises are used to enable students to develop and deliver information, demonstrations, and persuasive speeches. Emphasis placed on conceptual frameworks and specific communication skills for scientific audiences.

Restrictions: Enrollment is limited to Undergraduate Division level students.

COM 205 Race and Media (3 credits)

This course explores the co-construction of media practices and racial identity in the US. We will ask how media have shaped how we think about race. And we will explore the ways ideas about race have shaped media practices and technologies in turn. The course will examine contemporary debates as well as historical examples while analyzing the role media (films, TV, advertising, news and social media) play in shaping and challenging the social construction of race in contemporary US society.

Attributes: Undergraduate

COM 210 Sports, Media and Culture (3 credits)

Do sports matter? An estimated 1.5 billion people watched the last World Cup Final on television. In an increasingly divided society, sports may be our last shared cultural narrative. This course explores the intersection of sports, media and concepts such as globalization, race, gender, nationalism, fandom and even fashion – in the past and present. Through a variety of articles, documentaries, book chapters, and podcasts, we will critically examine issues related to media and a variety of sports - from The Premier League to the NFL to the WNBA to the Olympics.

Attributes: Undergraduate

COM 220 Professional and Academic Comm (3 credits)

This course provides students with the necessary skills to communicate effectively in professional and academic settings. The course emphasizes the importance of clear, concise, and persuasive communication in various contexts, including written, verbal, and non-verbal forms of communication. Students will learn how to tailor their communication style to different audiences, analyze and evaluate various forms of communication, and engage in critical thinking and problem-solving.

Attributes: Undergraduate

COM 240 Video Game Narrative (3 credits)

Students explore narrative concepts and strategies as they uniquely apply to video games, including the player-protagonist relationship, linear vs. open-world plot structure, narrative experiential density, ludonarrative and emergent gameplay, and narrative written for the style of immersive simulations. Building upon lectures, quizzes and the in-class playing of video games, students complete written analytical assignments and work collaboratively in small groups to develop creative narrative video game concepts.

Attributes: Undergraduate

COM 260 Strategic Communication (3 credits)

This course provides a foundational understanding of the core principles and application of strategic communication in various contexts. Through a blend of theory, practice and real-world exercises, students will craft, deliver, and evaluate effective strategies to align with client goals, values and target audiences. Examinations of messaging, media channels, and stakeholder engagement reveal issues in strategic communication including crisis, forecasting and brand reputation while integrating ethical considerations, technological acumen and cultural competence. Students are prepared to effectively articulate messaging that drives engagement, manages public perception, navigates integrated media landscapes, motivates masses, and accurately represents organizational goals and identity.

Attributes: Undergraduate

COM 270 Communications Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

COM 271 Technology and Pop Culture (3 credits)

What kinds of stories do we tell ourselves about our relationship with new technologies? Are they good, bad, or neutral? In this course, we will examine the ways in which emerging and speculative technologies have been depicted in film, television, literature, and other mass media. We will explore utopian imaginings, dystopic visions, questions of humanness itself, and more through the lens of media theory and ethics. Through group screenings and discussions, students will develop a critical vocabulary and produce final video projects that remix course material in creative and critical ways.

Attributes: Undergraduate

COM 274 Black Popular Culture (3 credits)

The Association of Popular Culture has held an annual conference since 1971 and yet the subject area of Black Popular culture is relatively new. It seems, however, that W.E.B DuBois' was writing about it as early as his 1897 essay "The Problem of Amusement." We will begin our study there and trace the trajectory of the development of Black Popular culture in the United States in film, media, and fiction.

Attributes: CCC: Diversity, Undergraduate

COM 275 Black Adaptation (3 credits)

This course focuses on diverse texts and theories regarding adaptation and intertextuality as they impact media. Centering adaptation theory, this course will examine the surge in adaptations, with a particular focus on Black adaptations. The course explores the ways in which texts are adapted from one medium into other media and the ways in which texts intersect and communicate with one another.

Attributes: CCC: Diversity, Undergraduate

COM 290 Professional Prep Seminar (1 credit)

What can you do with a degree in Communication and Media Studies? Do you know how to search for an internship or a job? And, are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance students' knowledge about internships and careers within their major and help them build practical skills through a series of steps and events throughout the semester. This one-credit course meets once a week through the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication and networking/interviewing.

Attributes: Undergraduate

COM 301 Media Law and Ethics (3 credits)

This course explores the intersection of law, ethics, and media practice. Students will examine legal frameworks governing media, including free speech, defamation, privacy, and intellectual property. Through case studies and critical analysis, we will explore ethical challenges faced by journalists, advertisers, and digital media professionals, focusing on issues like social media regulation, press freedom, and the balance between public interest and individual rights. By the end of the course, students will develop the tools to navigate legal and ethical dilemmas in a rapidly changing media landscape.

Attributes: Undergraduate

COM 303 Audio/Video II (3 credits)

In this course, we focus on intermediate-level methods, theories and tools of field-based audiovisual production. Building upon the content of Audio/Video I, this course places an additional emphasis on lighting, sound design, and field producing skills. Students work in small groups to complete media projects for campus and/or community organizations.

Attributes: Undergraduate

COM 371 Media Advocacy (3 credits)

Media advocacy focuses on the strategic use of communication and media channels for the purpose of social change and to influence public policy initiatives, including issues related to health, criminal justice, climate change, and race. Students will explore how institutions and individuals past and present have employed media to improve their communities. Advocacy media differs from traditional mass media in that it strategically empowers communities and individuals to shape public debates on issues that impact them. Traditional mass media aim to fill the "knowledge gap," while advocacy media fills the "power gap." Communication fee \$115.

Prerequisites: COM 200 and COM 201

Attributes: Undergraduate

COM 372 Intro to Web Design (3 credits)

This course explores the principles and best practices for creating web content, ranging from introductory work in HTML to design prototypes and web typography. Students will work with several types of web content (text, image, audio, video) and consider how that content is best used in the composition of usable, accessible, and attractive web sites. Students will also learn about the structure/history of the web, typical design workflows, and potential careers in web work.

Prerequisites: (COM 200 and COM 202) or ART 190

Attributes: Undergraduate

COM 382 Global Digital Media (3 credits)

Communications study tour students will study how digital media is used outside the context of the United States, and study the role it plays in other cultures. Through travel to another country students will be able to research and experience first hand differences in digital media practices. Destination varies depending on semester. As part of this course students will produce a digital media project that reflects both their in class research and study abroad experience.

Attributes: Undergraduate

COM 400 Health Communication and Educ (3 credits)

This course introduces principles and techniques of health communication to 'inform, educate and empower people about health issues.' Our focus will include communicating about health and science to the public through media channels, health advocacy, patient information and decision aids, as well emergency and crisis communication. Students will create multiple products for group critique with the goal of developing skills and competency.

Restrictions: Enrollment is limited to Undergraduate Division level students.

COM 402 Advanced Web Design (3 credits)

The class will be a mixture of web design theory and practical front-end techniques. Students are expected to have experience hand-coding websites using HTML and CSS, a basic understanding of using Git, and be familiar with basic principles of design such as color and typography. Topics covered will include: usability, accessibility, Git, Javascript/jQuery, designing for content management, and using Wordpress as a CMS. By the end of this course, students should have a solid understanding of the web design industry and modern web design techniques.

Prerequisites: COM 372 and COM 200 and COM 201

Attributes: Undergraduate

COM 410 Sports Media Production (3 credits)

This course focuses on the creation of narrative-driven sports content through audio and video production. Students will learn the techniques and processes involved in storytelling, including interviewing, capturing compelling footage, and editing to produce engaging narratives. Emphasizing both the technical and creative aspects of production, the course covers cinematography, sound design, and post-production workflows. Through hands-on projects, students will develop skills in producing sports content for digital platforms, gaining experience in creating impactful documentaries and feature pieces that showcase athletic stories and the cultural significance of sports.

Prerequisites: COM 203

Attributes: Undergraduate

COM 411 Health Literacy (3 credits)

Health literacy—or the ability to obtain, process and act on health information—is an essential patient safety and public health issue. This course provides key concepts and skills for students in health related fields to identify patients with health literacy risks; to provide clear health and medical information in oral and written formats; and to assess and modify healthcare delivery systems and environments to enhance patient access and understanding.

Restrictions: Enrollment is limited to Undergraduate Division level students.

COM 438 Advanced Media Research (3 credits)

This advanced course focuses on the principles and methods of community-engaged scholarship with an emphasis on diversity, equity, and inclusion (DEI). Students will design and execute a research or writing project addressing critical public issues in collaboration with community partners. In partnership with the John Cardinal Foley Program for Media and Civic Engagement, the course culminates in a publishable or presentable project showcasing innovative approaches to community-engaged research.

Attributes: Undergraduate

COM 439 Managing Teams and Projects (3 credits)

This course prepares students to lead digital media teams and manage projects with strategic focus in nonprofit, community-based, and professional contexts. Students will learn to create strategic plans that align media initiatives with organizational goals, assemble and manage diverse teams in inclusive environments, and apply project management principles to deliver impactful results. This course emphasizes collaborative leadership, inclusive content creation, and ethical decision-making while equipping students to tackle real-world challenges in digital media through hands-on projects.

Attributes: Undergraduate

COM 441 Media and Community Engagement (3 credits)

Not-for-profit and community-based organizations rely on strategic digital communication to drive social change. In this course, students gain in-depth knowledge of communication theories and practices while collaborating with local organizations through the John Cardinal Program for Media and Civic Engagement. Working as part of a project team, students will design and execute research-based communication strategies in partnership with nonprofit organizations to address real-world challenges.

Prerequisites: COM 200

Attributes: Undergraduate

COM 442 Non-Profit Communications (3 credits)

This course examines how not-for-profit organizations use strategic digital communication to drive social change. Students will explore communication theories and apply social media strategies while conducting research projects with local organizations through the John Cardinal Program for Media and Civic Engagement. Active participation in project teams is required as students collaborate with partners in the Greater Philadelphia area and beyond.

Prerequisites: COM 200

Attributes: CCC: Writing Intensive, Undergraduate

COM 443 Justice By Design (3 credits)

This course explores how systems of oppression and inequity are designed—and can be redesigned. Students will examine equity-based design approaches that address power, privilege, and oppression, ensuring fair distribution of benefits and burdens, inclusive participation, and recognition of diverse design practices. Through methods like asset-based community building, mutuality, and co-creation, students will learn to cultivate equity and justice. By the course's end, students will apply these methods to their own work and develop actionable strategies for equity by design.

Attributes: CCC: Diversity, GEP: Diversity Course, Undergraduate

COM 444 Mindful Communication (3 credits)

In this experiential course, we combine the study of communication theory with mindfulness training. Mindfulness is about paying attention on purpose to what's happening in the present moment –without judgment. We will explore a range of research topics related to mindful communication, including attention, presence, deep listening, perspective taking, relational awareness, communication goals, conversational dynamics, and emotional intelligence. We will also examine real-world examples of mindful (and mindless) communication in relationships, school, public, and social media. With these skills, we can increase our ability to communicate effectively in each unique situation we encounter and modify unproductive communication habits.

Prerequisites: COM 200 and COM 201

Attributes: Undergraduate

COM 445 Advanced Media Research (3 credits)

This advanced course focuses on the principles and methods of community-engaged scholarship with an emphasis on diversity, equity, and inclusion (DEI). Students will design and execute a research or writing project addressing critical public issues in collaboration with community partners. In partnership with the John Cardinal Foley Program for Media and Civic Engagement, the course culminates in a publishable or presentable project showcasing innovative approaches to community-engaged research.

Attributes: Undergraduate

COM 451 Privacy/Surv in the Dig Era (3 credits)

Based on your cell phone history researchers can predict where you will be 24 hours from now. You can download and install software onto a computer to monitor and capture everything a user does. Nearly every thing you buy is recorded in a database. Corporations track every page view and click. Your email is easily read by third parties. Target knows when a customer is pregnant. Even the post office scans and digitally images every piece of mail it sends. It is impossible to not leave a digital trace, and all of these traces are being collected. In this class we will look at how our digital lives intersect with and effect our privacy. Is privacy dead in the age of constant surveillance? Should we even care? And who benefits from all this data collection? We will look to answer these question both on a technological level, what is possible, and a critical level, what does this mean for democracy and society. We will also seek to put this knowledge into practice, understanding and using what tools and techniques citizens can employ to regain privacy both in their lives as individuals and citizens.

Prerequisites: (COM 200 and COM 201)

Attributes: Justice Ethics and the Law , Undergraduate

COM 452 Podcasting (3 credits)

Students focus on producing podcasts, from understanding form and genre to techniques in working with digital sound production. Students will learn advanced audio recording and post-processing techniques and tools, integrate music, write and revise scripts, publish and promote their work digitally, learn and practice interviewing techniques, and work collaboratively to create a cohesive series. Previous experience working with audio recording and editing will be helpful, though it is not a prerequisite. Communications Lab Fee \$115

Attributes: Undergraduate

COM 453 Visual Design II (3 credits)

In this course, students will develop a graphic design portfolio and deepen their knowledge of typography, color theory, the graphic design profession, and more. As a communications course, it emphasizes rhetorical dimensions of design, including purpose and audience. During the creative process, students will move through phases of research, planning, drafting, feedback, revision, and reflection-with an emphasis on sketching as a means of paying attention and gathering inspiration. Class projects may include branding materials, illustrations, posters, and magazine layouts for both print and digital formats. The primary goal of the course is to produce portfolio-quality work in graphic design and to build on skills and concepts covered in previous courses. Students should have at least a working knowledge of Adobe software products, including Photoshop, Illustrator, and InDesign. Qualified students may seek instructor approval

Prerequisites: (COM 202 or ART 190 or MKT 325 or CSC 341)

Attributes: Undergraduate

COM 455 Music Protest & Social Justice (3 credits)

Popular musicians use their platform to release songs, videos, and statements that reveal, condemn, and inspire action in response to perceived social, political, and military injustices. These songs, videos, and statements exist within a complex system of power, cultures, values, politics, entertainment, music, and texts. In this course, we will consider that complex system by analyzing protest and social justice songs that cover important issues, including race, civil rights, sexual orientation, war, labor, and immigration, from Slavery Spirituals to the present moment. In doing so, we will see how protest music works within social movements, fights power, encourages activism, and, perhaps, inspires change.

Attributes: Undergraduate

COM 457 Black Women Content Creators (3 credits)

Linked by race, gender, and fate, but arguably little else, how do Black women content creators write themselves into the idea of America? This course examines, exclusively, Black women's media creations to answer this question. Covering a wide array of approaches, students are positioned to effectively question notions of privilege and power driven by the intersectionalities of gender and race. Some background in Black history, culture, and/or literature is recommended, but not required.

Attributes: Undergraduate

COM 460 Health Communication Advocacy (3 credits)

This course will address the topic of health as it is enacted and defined within the discipline of communication studies. This course systematically explores and elaborates key concepts, principles, and underlying theories pertinent to public health communication campaigns and advocacy practices. Specifically, this course will provide students with conceptual and applied knowledge about communication interactions and its effects on health care, health practitioners, and patients. Topics include but are not limited to patient-provider interaction, social and cultural issues of health, mass media representations of health and healthy behaviors, and communication within health organizations.

Attributes: Undergraduate

COM 465 Bear Witness: Images/Soc Change (3 credits)

For most of us the visual experience of war comes from images. We will likely never see war first-hand so photographs, movies, video games and graphic novels help shape our collective understanding and memory of armed conflict. This course will investigate images of war from the United States, Iran, Spain, Rwanda, both World Wars, the war in Vietnam and the recent wars in Iraq and Afghanistan. We will examine photographs, films and video games and discuss the dual purpose of war images - as pieces of art and as the documentation of an event.

Attributes: Undergraduate

COM 470 Communications Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in English.

Attributes: Undergraduate

COM 473 Special Topics/ Com&Digi Media (3 credits)

This special topics course will explore a specialized area at the intersection of technology and rhetoric.

Attributes: Undergraduate

COM 475 Crime, Justice, & Media (3 credits)

This course examines media narratives of crime and justice in the United States. We will analyze and discuss how these narratives impact incarceration, sentencing, policing and criminal justice policy. We will also consider how to produce new narratives, stories of redemption, through meetings and interviews with men and women who have or are serving life-without-parole sentences in Pennsylvania prisons, their families and advocacy groups lobbying for criminal justice reform. The course includes at least one group visit to a prison, accompanied by the instructor, to talk to men serving life sentences. Media production experience is helpful, but not required.

Restrictions: Enrollment limited to students with a class of Junior or Senior.

Attributes: GEP. Diversity Course, Faith Justice Course, Justice Ethics and the Law, Undergraduate

COM 480 Senior Capstone (3 credits)

This required course provides department majors an opportunity to propose, plan, create and present a project to demonstrate what they have learned during their time at the university. The course focuses on an individual, semester-long creative and/or research project. The project scope and logistics will be negotiated between the student and instructor. The project is designed to serve as a transition from undergraduate to professional work and/or graduate school. The course includes a public presentation at the end of the semester.

Restrictions: Enrollment limited to students with a class of Senior.

Enrollment is limited to students with a major in Communication Studies.

Attributes: Undergraduate

COM 491 Communications Internship (1-3 credits)

An on-the-job learning experience in which students spend 12-15 hours a week over a semester, with opportunities to develop further their understanding of communications, ideally in a career field close to their own interests. Normally taken in the junior or senior years, after career interests have clarified through diverse courses in the curriculum.

Prerequisites: COM 200 and COM 201

Attributes: Undergraduate

COM 492 Independent Study (6 credits)

Students will study a topic in communications with a faculty mentor.

Attributes: Undergraduate

COM 493 Indep Research Project I (3 credits)

Directed independent reading and research with a faculty mentor. Open to senior Communication and Media Studies majors and minors and other senior students by permission of the Chair. Includes Honors Thesis.

Attributes: Undergraduate

COM 494 Indep Research Project II (3 credits)

Directed independent reading and research with a faculty mentor. Open to senior Communication and Media Studies majors and minors and other senior students by permission of the Chair. Includes Honors Thesis.

Attributes: Undergraduate

COM 700 Health Communication and Educ (3 credits)

This course introduces principles and techniques of health communication to 'inform, educate and empower people about health issues.' Our focus will include communicating about health and science to the public through media channels, health advocacy, patient information and decision aids, as well emergency and crisis communication. Students will create multiple products for group critique with the goal of developing skills and competency.

COM 711 Health Literacy (3 credits)

Health literacy—or the ability to obtain, process and act on health information—is an essential patient safety and public health issue. This course provides key concepts and skills for students in health related fields to identify patients with health literacy risks; to provide clear health and medical information in oral and written formats; and to assess and modify healthcare delivery systems and environments to enhance patient access and understanding.

Computer Science (CSC)

CSC 110 Building Virtual Worlds (3 credits)

A gentle introduction to programming with user-friendly software (Alice). Students will use 3D animated interactive virtual worlds to develop an understanding of basic programming constructs. Open to all students. Computer science majors may take this course to prepare for CSC 120. This course presupposes no previous programming experience.

Attributes: Undergraduate

CSC 115 Intro to Computer Science (3 credits)

A gentle introduction to computer science. Students will be introduced to basic programming constructs in a language such as Python. Open to all students. Computer science majors may take this course to prepare for CSC 120. This course presupposes no previous programming experience.

Attributes: Undergraduate

CSC 116 Comp'I Thinking & Data Sci (3 credits)

The course aims to provide students with an understanding of the role computation can play in solving problems and to help students, regardless of their major, feel justifiably confident of their ability to write small programs that allow them to accomplish useful goals. The class uses the Python programming language.

Prerequisites: CSC 115

Attributes: Undergraduate

CSC 120 Computer Science I (4 credits)

Computer programming for beginners. Very little prior knowledge regarding how computers work is assumed. Learn how to write understandable computer programs in a programming language widely used on the Internet. Go beyond the routine skills of a computer user and learn the programming fundamentals: data, variables, selection, loops, arrays, input/output, methods and parameter passing, object and classes, abstraction. Take what is learned and write programs for use on the Internet. One hour per week of the course is a required laboratory.

Attributes: Undergraduate

CSC 121 Computer Science II (4 credits)

The course covers intermediate programming techniques emphasizing advanced object oriented techniques including inheritance, polymorphism, and interfaces. Other topics include recursion, exception handling, design patterns, simple GUI programming, and dynamic containers such as linked lists, stacks, queues, and trees.

Prerequisites: CSC 120

Attributes: Undergraduate

CSC 125 CSC I:Programming Fundamentals (3 credits)

Computer programming for beginners. Very little prior knowledge regarding how computers work is assumed. Learn how to write understandable computer programs in a programming language widely used on the Internet. Go beyond the routine skills of a computer user and learn the programming fundamentals: data, variables, selection, loops, arrays, input/output, methods and parameter passing, object and classes, abstraction. Take what is learned and write programs for use on the Internet. One hour per week of the course is a required laboratory.

Attributes: Undergraduate

CSC 126 CSC II:Intermed Prog Technique (3 credits)

The course covers intermediate programming techniques emphasizing advanced object oriented techniques including inheritance, polymorphism, and interfaces. Other topics include recursion, exception handling, design patterns, simple GUI programming, and dynamic containers such as linked lists, stacks, queues, and trees.

Attributes: Undergraduate

CSC 131 Web Design for All (3 credits)

This course will attempt to give you experience in designing Internet applications. A student finishing this course should be able to design, implement, and maintain a website using HTML, CSS, JavaScript, etc.

Attributes: Undergraduate

CSC 132 Artificial Intellig for All (3 credits)

This course will cover the fundamental concepts in artificial intelligence, machine learning and robotics. Learn about deep learning systems that mimic biological or societal models to learn and perform challenging tasks.

Attributes: Undergraduate

CSC 133 Python Programming for All (3 credits)

Programming fundamentals using the Python programming language: data, variables, selection, loops, arrays, input/output, basic graphics, functions and data visualization.

Attributes: Undergraduate

CSC 134 Databases for All (3 credits)

Learn about data, organizing data into databases. Learn how to create Entity Relationship diagrams, create databases and use SQL to find what you want. Learn about Big data and unstructured data.

Attributes: Undergraduate

CSC 135 Cybersecurity for All (3 credits)

This course introduces students with no computer science background to the basic concepts and techniques associated with cybersecurity. Specifically, the course will cover information security, network security, data privacy, smartphone security, and legal and political issues.

Attributes: Undergraduate

CSC 136 eSports Game Design (3 credits)

This course will cover the tools and techniques for designing interactive games and virtual reality simulations.

Attributes: Undergraduate

CSC 150 First Year Seminar (3 credits)

This First Year Seminar course for majors and non-majors will introduce the basics of computer programming using Python (Joy of Computing) or Alice (Computational Thinking Through 3D Animation). Through programming practice the students will gain an appreciation of computer programs and algorithm development that can be applied in many fields.

Attributes: First-Year Seminar, Undergraduate

CSC 196 Computer Science Elective (3 credits)**CSC 201 Data Structures (4 credits)**

The course covers fundamental data structures, algorithms for manipulating and retrieving information from these data structures, and techniques for analyzing their efficiency in terms of space and time. The distinction between an Abstract Data Type and its implementation is emphasized. Topics include lists, vectors, trees (general trees, binary search trees, and balanced trees), priority queues, hashing, graphs, and various searching and sorting algorithms.

Prerequisites: CSC 121

Attributes: Undergraduate

CSC 202 Computer Architecture (3 credits)

Overview of computer system organization, hardware, and communications. Introduction to combinational and sequential logic, arithmetic, CPU, memory, microprocessors, and interfaces. CISC vs. RISC processors. Assembly language programming, microarchitecture, and microprogramming on a variety of processors.

Prerequisites: CSC 121

Attributes: Undergraduate

CSC 240 Discrete Structures (3 credits)

Topics include finite probability space, conditional probability, Bayes' theorem, permutations and combinations, statistics and sampling distributions, the Central Limit Theorem, hypothesis testing, correlation, regression analysis, data encoding, channel capacity, the Shannon coding theorem. Data analysis projects using an appropriate statistical package will be assigned.

Prerequisites: CSC 121

Restrictions: Graduate level students may **not** enroll.

Attributes: Undergraduate

CSC 261 Principles of Programming Lang (3 credits)

The general principles underlying programming languages, including such topics as syntax and its specification, data types, data control, flow control, storage management and support for design patterns. Examples drawn from a variety of programming languages, including functional, logical and procedural languages, will be presented.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 281 Design & Analysis Algorithms (3 credits)

This course presents fundamental techniques for designing efficient computer algorithms and analyzing their running times. Topics include asymptotics, solving summations and recurrences, sorting and selection, graph algorithms (depth-first and breadth-first search, minimum spanning trees, and shortest paths), algorithm design techniques (divide-and-conquer, dynamic programming, and greedy algorithms), and introduction to NP-completeness.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 290 Career Prep Seminar (1 credit)

What can you do with a degree in Mathematics, Computer Science, Information Technology, or Actuarial Science? Do you know how to search for an internship or a job? And, are you ready to apply for a position should the opportunity arise? Have you practiced your elevator pitch? This professional development seminar will enhance students' knowledge about internships and careers within their major and help them build practical skills through a series of steps and events throughout the semester. This one-credit course meets once a week through the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication, and networking/interviewing.

Attributes: Undergraduate

CSC 310 Computer Systems (3 credits)

An overview of operating systems and the software required to integrate computer hardware into a functional system. Topics include operating systems structure, interrupt driven systems, concurrency, memory management, file systems and security, and system calls.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 315 Software Engineering (3 credits)

Principles of designing large programs, including issues of specification, documentation, design strategies, coding, testing and maintenance. Students work in small groups to design and implement a major software project.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 330 Generative AI (3 credits)

The course aims to investigate the role and various architectures of transformers which rely heavily on the self-attention mechanism. Topics include text classification and generation, transformer anatomy, document analysis, fake text and image generation.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 340 Intro to Cybercrime (3 credits)

The course covers the evolution of cybercrimes and the evolution of the laws used to prosecute those who commit them. We will examine the fact-patterns of significant cybercrimes that have occurred in modern history, including notable prosecutions in hacking, illegal enterprise, and child exploitation. We will explore the (current) categories of cybercrimes and delve into the crimes that did not exist prior to the proliferation of the personal computer. We will explain the role of digital evidence in these prosecutions and will also look closely at the laws (both at the federal and state levels) that are used to hold cybercriminals accountable.

Attributes: Undergraduate

CSC 341 Introduction to Graphics (3 credits)

Principles of designing large programs, including issues of specification, documentation, design strategies, coding, testing and maintenance. Students work in small groups to design and implement a major software project.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 342 Computer Vision (3 credits)

Computer vision is the science of analyzing images and videos in order to recognize or model 3D objects, persons, and environments. Topics include the underlying image formation principles, extracting simple features like prominent points or lines in images, projecting a scene to a picture, tracking features and areas in images and make a mosaic, making an image-based positioning system, obtaining 3D models from two or more images, and techniques to recognize simple patterns and objects. The class includes programming exercises and hands-on work with digital cameras and laser scanners.

Prerequisites: CSC 281

Attributes: Undergraduate

CSC 343 Interactive 3D Game Developmt (3 credits)

This course will cover the tools and techniques for programming interactive games and virtual reality simulations. The focus is primarily on programming aspects, including event loops and execution threads, rendering and animation in 3D, terrain/background representation, polygonal models, texturing, collision detection and physically-based modeling, game AI, and multi-user games and networking. Although this course has a significant programming focus, other topics briefly covered will include the history of computer/video game technology, game genres and design principles, and the social impact of games.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 344 Human Computer Interaction (3 credits)

User models: conceptual, semantic and syntactic considerations; cognitive and social issues for computer systems; evaluating the interface; direct manipulation; architectures for Interaction; Students will design and implement a GUI based application.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 345 Image Data Science (3 credits)

Image Data Science is the science of analyzing images including video in order to recognize or model 3D objects, persons, and environments. Topics include the underlying image formation principles, extracting simple features like prominent points or lines in images, projecting a scene to a picture, tracking features and areas in images to make a mosaic, making an image-based positioning system, obtaining 3D models from two or more images, and techniques to recognize simple patterns and objects. The class includes programming exercises and hands-on work with C#, Python, and Google's Tensorflow machine learning framework.

Prerequisites: CSC 281

Attributes: Undergraduate

CSC 346 Introduction to Data Science (3 credits)

This course will introduce students to the various aspects of data science such as data collection and integration, exploratory data analysis, predictive modeling, descriptive modeling, data product creation, evaluation, and effective communication. The focus in the treatment of these topics will be on breadth, rather than depth, and emphasis will be placed on integration and synthesis of concepts and their application to solving problems. To make the learning contextual, real datasets from a variety of disciplines will be used. Course includes programming projects in a Python and/or R.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 347 Advanced Data Science (3 credits)

The course introduces most recent tools for performing predictive analytics, data visualization, data wrangling, statistical inference, deep machine learning, and software engineering. The main focus of the course is to introduce students to most important aspects of data science by reinforcing writing efficient code, testing, and debugging while working with large software systems. The course includes several programming projects.

Prerequisites: CSC 346

Attributes: Undergraduate

CSC 348 Advanced Machine Learning (3 credits)

The course will present machine learning algorithms for supervised and unsupervised learning with an emphasis on recent advances in deep learning with neural networks, decision trees, and various stochastic models. Application areas in data science, computer vision, natural language understanding, and engineering optimization will reinforce the covered topics. The course includes several programming projects.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 349 Machine Learning (3 credits)

This course provides a comprehensive introduction to machine learning, covering fundamental concepts, algorithms, and practical applications. Students will learn the basics of supervised and unsupervised learning, including regression, classification, clustering, and dimensionality reduction. They will also explore advanced topics such as neural networks, deep learning, and reinforcement learning. Through hands-on programming projects and exercises, students will gain practical experience in implementing machine learning algorithms and analyzing real-world datasets.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 351 Database Management Systems (3 credits)

The course will cover the concepts and structures necessary to design and implement a relational database system. Topics to be covered: entity-relationship and relational data models, relational algebra, SQL, normalization, file organization, indexing, hashing, and enterprise-wide web-based applications.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 352 Data Communication & Networks (3 credits)

Topics include mathematical foundations of data communications, logical and physical organization of computer networks, the ISO and TCP/IP models, communication protocols, circuit and packet switching, the Internet, LAN/WAN, client/server communications via sockets, routing protocols, data encryption/decryption and network security issues.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 353 Internet Application Development (3 credits)

This course will attempt to give you experience in designing Internet applications. A student finishing this course should be able to design, implement, and maintain a large community or e-commerce web site. They should leave the course with an understanding of a variety of Internet protocols and markup languages, a knowledge of at least one common scripting tool, an understanding of how to implement a database back-end into a large-scale site, and the ability to critically assess the usability of both their design and the design others.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 354 Web Technologies (3 credits)

Topics include organization of Meta-Markup languages, Document Type Definitions (DTD), document validity and well-formedness, style languages, namespaces, Transformations, XML parsers, and XQuery. Course includes programming projects.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 355 Cryptography & Network Security (3 credits)

Topics include classical cryptosystems, public and symmetric cryptography, key management, digital signatures, cipher techniques, authentication and federated identity management. Course also covers concepts relating to crypto-virology, malware, viruses, Trojan horses, worms and other types of infectors as they relate to network security. Course includes programming projects.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 356 Mobile App Design (3 credits)

This course is designed for students who wish to start developing mobile applications on Android platforms, and through the process understand the concepts relating to Computer Science on a mobile platform. The course will include the basics of mobile and wireless technology with Android programming and will cover the most recent version of Android. Students will learn how to develop feature-rich Android applications using various development platforms and learn the basic concepts in Computer Science such as algorithmic thinking, abstractions, logic, flow control, and data representation, storage and manipulation. The primary language used in the course will be Java.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 357 Internet of Things (3 credits)

By 2020, the number of smartphones, tablets, and PCs in use will reach about 7.3 billion units. In contrast, the IoT (Internet of Things) will have expanded at a much faster rate, resulting in a population of about 26 billion units at that time. The IoT is the network of physical objects that contains embedded technology to communicate and sense or interact with their internal states or the external environment. In this course, students will use two of the most popular IoT platforms (Arduino and Raspberry Pi) to develop their own "things."

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 358 Big Data and Web Intelligence (3 credits)

The course explores the concepts of big data, the use of Artificial Intelligence data exploration techniques, map-reduce parallel computing paradigm, distributed file systems, NoSQL databases, and stream computing engines. The course includes programming projects on a cluster of Hadoop servers.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 359 Security in Mobile App Design (3 credits)

The course introduces students on how to implement and enforce access and data protection measures for mobile applications using data encryption standards, VPN policies, and authentication. The focus of the course is on the integration between the mobile application and remote authentication services. The course includes Android programming projects using security specific SDK's

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 360 Intro to Cloud Computing (3 credits)

Cloud Computing is concerned with the use and architecture of this model of computation. This course covers the services provided by clouds, their internal structure, and their possibilities and limitations. Topics include Infrastructure as a Service, Middleware (Platform) as a Service, Software as a Service, Service-oriented architectures, Web Services and standards, cloud security, reliability, governance, and wireless clouds.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 362 Artificial Intelligence (3 credits)

The course covers fundamental concepts such as production systems, uniformed and informed search techniques, the role of heuristics, adversarial game playing, and admissibility. Additional topics may include inductive learning, genetic algorithms, decision trees, natural language processing, and perceptron learning. Course includes programming assignments in Java, Python, and R.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 363 Theoretical Foundations (3 credits)

Introduction to formal models of languages and computation. Topics covered include finite automata, regular languages, context-free languages, pushdown automata, Turing machines, computability, and NP-completeness.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 364 Network Forensics (3 credits)

This course is a broad introduction to the field of Digital Forensics. It covers various fundamental topics necessary for digital forensics investigation, and a variety of hardware and software tools that are commonly used during the investigation. The course begins with foundations of electronic evidence including cybercrime laws, the 4th Amendment, compliance and requirements, collection and handling, analysis, and reporting. The course also covers fundamentals of file systems with specific details pertaining to Microsoft FAT file systems. Students will learn two important forensics techniques -file recovery and file carving-among other things. In addition, basic techniques used in Network-based digital forensics will also be covered. Finally, Anti-forensics will also be discussed. Hands-on lab activities familiarize students with several relevant investigation techniques.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 365 Intro to Security (3 credits)

Topics include fundamental concepts in confidentiality, integrity, and availability, access control methods, cryptographic concepts, physical security, malware, computer viruses, privacy-invasive software, malware detection, network security, web security, security models, software vulnerability assessment.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 366 Intro to Ethical Hacking (3 credits)

This course introduces students to the basic principles and techniques used in penetration testing, also known as Ethical Hacking. The course covers the methods used in penetration testing process and the corresponding remedial techniques while emphasizing the key factors that differentiate a malicious attacker from an ethical hacker, stressing the importance of being within legal confines. Students will develop a broad understanding of current cybersecurity problems by completing projects on the topic of Ethical Hacking.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 367 Intro Soc Net Anlys & Modlmg (3 credits)

The Analysis and Modeling of Social Networks is a very hot topic in Computer Science. Considering that mobile devices, as smartphones and laptops, are physically carried by human beings, the data generated by these devices actually possesses certain social features. By analyzing the social features and modeling social networks, we are able to design better applications, in terms of the functionality and efficiency. This course will include methods for analyzing and modeling the following aspects of social networks: the small-world network models, social network search algorithms, power-laws and preferential attachment, diffusion and information propagation in social networks, community detection in social networks, models of network cascades, models of evolving social networks, links and attributes prediction. In addition, the course will introduce a set of tools for visually presenting and studying different social networks and their unique features.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 370 Topics in Computer Science (3 credits)

The course introduces students to recent theoretical or practical topics of interest in computer science. Content and structure of the course are determined by the course supervisor. The special topic(s) for a given semester will be announced prior to registration.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 372 Game AI (3 credits)

This course provides an introduction to the field of Game AI using the Unity Engine and C#. Students will learn how to create intelligent game agents that exhibit complex behaviors such as pathfinding, decision making, and goal-oriented behavior. Through hands-on projects and assignments, students will gain practical experience implementing AI algorithms in Unity, preparing them to design and develop interactive game experiences. No prior experience with Unity or C# is required.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 470 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

CSC 490 Internship (3 credits)

The course goals are: to gain first-hand experience of the daily activities of professionals in computer science and related fields, to verify an interest in a particular area of computer science, to develop and hone skills required for computer science professions, to establish contacts outside the academic community who will facilitate a career in computer science. An internship journal and a report are also required.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 492 Honors Research, Non-Thesis (3 credits)

Supervised independent research mentored by a faculty member. Students must complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair, Associate Dean, and Honors Program Director to register.

Prerequisites: CSC 315

CSC 493 Independent Study (3 credits)

A one- or two-semester, independent research project on a topic selected by the student and a faculty research advisor, and approved by the department. The student may undertake the two-semester option to graduate with departmental honors, in which case he/she must notify the department by spring of his/her junior year. Students need to complete the application form for independent study (available in the Dean's Office), meet the GPA and other requirements, and have the approval of the Computer Science Department chair and Associate Dean in order to register.

Prerequisites: CSC 281

Attributes: Undergraduate

CSC 494 Independent Study (3 credits)

A one- or two-semester, independent research project on a topic selected by the student and a faculty research advisor, and approved by the department. The student may undertake the two-semester option to graduate with departmental honors, in which case he/she must notify the department by spring of his/her junior year. Students need to complete the application form for independent study (available in the Dean's Office), meet the GPA and other requirements, and have the approval of the Computer Science Department chair and Associate Dean in order to register.

Prerequisites: CSC 281

Attributes: Undergraduate

CSC 495 Senior Project (3 credits)

Students will work on a substantial application based upon their prior knowledge.

Prerequisites: CSC 201

Attributes: Undergraduate

CSC 496 Honors Thesis I (3 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the Department Chair, Associate Dean and the Honors Program Director in order to register.

Prerequisites: CSC 315

Attributes: Undergraduate

CSC 497 Honors Thesis II (3 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the Department Chair, Associate Dean and the Honors Program Director in order to register.

Prerequisites: CSC 315

Attributes: Undergraduate

CSC 500 Discrete Structures (3 credits)

Mathematics needed for Computer Science. Topics covered include: functions, relations, propositional and first order predicate logic, set theory, proofs and their construction, counting and elementary probability. The course will use a declarative language as a tool to support concrete implementations of the mathematical ideas.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 503 Java Programming (3 credits)

This course provides students with the necessary background in programming for the graduate program. Students will learn general principles of program design at first by using libraries of predefined program units, and later by constructing complete programs. Intermediate programming techniques including the use of recursion are covered. An introduction to encapsulated data structures and algorithm efficiency.

Restrictions: Graduate level students may **not** enroll.

Attributes: Graduate

CSC 549 Computing Essentials (3 credits)

This course provides students, who have minimal or no prior knowledge of computational environments, with an understanding of modern computers and operating systems. Students will also learn general principles of programming design in an appropriate computational environment such as Python. Emphasis is on developing techniques for program design that lead to correct and secure programs.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 550 Object Oriented Design & Data Structures (3 credits)

The course combines a strong emphasis on Object-Oriented Design principles and design patterns with the study of data structures. Fundamental Abstract Data Types, their implementations and techniques for analyzing their efficiency will be covered. Students will design, build, test, debug and analyze medium-size software systems and learn to use relevant tools.

Prerequisites: CSC 502

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 551 Design and Analysis (3 credits)

Concepts of program complexity; basic approaches to complexity reduction: data structures and techniques; worst cases and expected complexity. Topics to be covered may include sorting, set manipulation, graph algorithms, matrix multiplication, and finite Fourier transforms, polynomial arithmetic, and pattern matching.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 552 Computer Architecture (3 credits)

Overview of computer system organization, hardware components, and communications. Introduction to Boolean algebra, combinational and sequential logic, arithmetic, the CPU, memory, microprocessors, and interfaces. CISC vs. RISC processors. Practical assembly language programming will be the emphasis with an introduction to micro architecture and microprogramming on a variety of processors.

Prerequisites: CSC 501

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 553 Computer Systems (3 credits)

An overview of the software required to integrate computer hardware into a functional system. The following topics are covered. Operating systems as resource managers and as virtual machines. System calls, in particular those required for process and file management; interrupt driven systems; concurrency; memory management; file systems and security.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 554 Theory of Computation (3 credits)

Formal languages, formal grammars, abstract machines; models of computation (e.g. Turing machines); computational complexity (NP completeness); undecidability and uncomputability.

Prerequisites: CSC 500

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 610 Software Engineering (3 credits)

The purpose of this class is to teach the process of developing software. It combines a study of methods, tools, and techniques for creating and evolving software products, with the practical skills needed to deliver high- quality software products on schedule. The methods that are studied include requirements, specification, design, implementation, testing, and maintenance. The course includes a substantial group project.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 611 Human Computer Interaction (3 credits)

User models: conceptual, semantic and syntactic considerations; cognitive and social issues for computer systems; evaluating HCI; direct manipulation; the model view controller architecture; widgets and toolkits. Students will design a GUI based application.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 618 Semantic Web (3 credits)

This course covers a range of semantic web technologies, including RDF (Resource Description Framework - a model for data interchange), OWL (Web Ontology Language) and SPARQL Query Language. Students will apply course concepts to an in-depth project (using Semantic Tools) in an area of personal or professional interest. The course will allow students to build a substantial body of work and an industry-ready Graph Knowledge Engineer/Ontology Engineer portfolio.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 619 Advanced Programming Tech (3 credits)

This course thoroughly examines many of the sophisticated features of Object Oriented Programming (using Java), including interfaces, advanced graphics, string manipulation, exception handling, some data structures, file I/O techniques, multithreading, generics, string formatters and wrappers. Students demonstrate their mastery of the material through a series of graded projects and assignments that challenge at an extremely high level.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 620 Internet Application Development (3 credits)

This course will attempt to give you experience in designing Internet applications. A student finishing this course should be able to design, implement, and maintain a large community or e-commerce web site. They should leave the course with an understanding of a variety of Internet protocols and markup languages, a knowledge of at least one common scripting tool, an understanding of how to implement a database back-end into a large-scale site, and the ability to critically assess the usability of both their design and the design others.

Prerequisites: CSC 502

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 621 Database Systems (3 credits)

This course covers the concepts and structures necessary to design and implement a database management system. Topics to be covered: data models (entity-relationship and relational), SQL, normalization, storage structures, enterprise applications and database integrity.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 622 Advanced Database Concepts (3 credits)

Topics include stored procedures, triggers, query processing and optimization, web-based enterprise data applications, transaction management, concurrency control, distributed databases, data mining and web mining. The course includes programming projects involving SQL.

Prerequisites: CSC 621

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 623 Data Communication & Networks (3 credits)

Topics include mathematical foundations of data communications, logical and physical organization of computer networks, the ISO and TCP/IP models, communication protocols, circuit and packet switching, the Internet, LAN/WAN, client/server communications via sockets, routing protocols, data encryption/decryption and network security issues.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 626 Web Technologies (3 credits)

Topics include organization of Meta-Markup languages, Document Type Definitions (DTDs), document validity and well-formedness, style languages, namespaces, Transformations, XML parsers, Web Services, and Web Security Specifications. Course includes programming projects.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 627 Introduction to Security (3 credits)

Topics include fundamental concepts in confidentiality, integrity, and availability, access control methods, cryptographic concepts, physical security, malware, computer viruses, privacy-invasive software, malware detection, network security, web security, security models, software vulnerability assessment.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 628 Advanced Security (3 credits)

Topics include classical cryptosystems, public and symmetric cryptography, key management, digital signatures, cipher techniques, authentication and federated identity management. Course also covers concepts relating to cryptovirology, malware, viruses, Trojan horses, worms and other types of infectors as they relate to network security. Course includes programming projects.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 629 Mobile App Design (3 credits)

This course is designed for students who wish to start developing mobile applications on Android platforms, and through the process understand the concepts relating to Computer Science on a mobile platform. The course will include the basics of mobile and wireless technology with Android programming and will cover the most recent version of Android. Students will learn how to develop feature-rich Android applications using various development platforms and learn the basic concepts in Computer Science such as algorithmic thinking, abstractions, logic, flow control, and data representation, storage and manipulation. The primary language used in the course will be Java.

Prerequisites: CSC 550

Attributes: Graduate

CSC 630 Introduction to Graphics (3 credits)

The course provides an introduction to the principles of computer graphics. The emphasis will be placed on understanding how various elements that underlie computer graphics interact in the design of graphics software systems. Topics include pipeline architecture, graphics programming, 3D geometry and transformations, modeling, viewing, clipping and projection, lighting, shading and texture mapping and visibility determination. A standard graphics API will be used to reinforce concepts and the study of basic graphics algorithms. Students need some proficiency in C language and basic concepts from Linear Algebra.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 631 Computer Vision (3 credits)

Computer vision is the science of analyzing images and videos in order to recognize or model 3D objects, persons, and environments. Topics include the underlying image formation principles, extracting simple features like prominent points or lines in images, projecting a scene to a picture, tracking features and areas in images and make a mosaic, making an image-based positioning system, obtaining 3D models from two or more images, and techniques to recognize simple patterns and objects. The class includes programming exercises and hands-on work with digital cameras and laser scanners.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 632 Interactive 3D Game Development (3 credits)

This is a technology-based course that uses the latest computer games technology to teach advanced programming, mathematics, and software development. The course is ideal for students with an interest in computer games who plan to seek employment in one of the country's more profitable industries, or students looking for a career in new technologies or software development. The interactive entertainment industry in the US and throughout the world is entering a new phase. New technology platforms are forcing existing development firms to diversify. There are many aspects of game design, development, production, finance, and the distribution process.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 635 Image Data Science (3 credits)

Image Data Science is the science of analyzing images including video in order to recognize or model 3D objects, persons, and environments. Topics include the underlying image formation principles, extracting simple features like prominent points or lines in images, projecting a scene to a picture, tracking features and areas in images to make a mosaic, making an image-based positioning system, obtaining 3D models from two or more images, and techniques to recognize simple patterns and objects. The class includes programming exercises and hands-on work with C#, Python, and Google's Tensorflow machine learning framework.

Prerequisites: CSC 551

Attributes: Graduate

CSC 643 Big Data and Web Intelligence (3 credits)

The course explores the concepts of big data, the use of Artificial Intelligence data exploration techniques, the map-reduce parallel computing paradigm, distributed file systems, NoSQL databases, and stream computing engines. The course includes programming projects on a cluster of Hadoop servers.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 644 Security in Mobile App Design (3 credits)

The course introduces students on how to implement and enforce access and data protection measures for mobile applications using data encryption standards, VPN policies, and authentication. The focus of the course is on the integration between the mobile application and remote authentication services. The course includes Android programming projects using security specific SDK's

Prerequisites: CSC 551

Attributes: Graduate

CSC 645 Intro to Ethical Hacking (3 credits)

This course introduces students to the basic principles and techniques used in penetration testing, also known as Ethical Hacking. The course covers the methods used in penetration testing process and the corresponding remedial techniques while emphasizing the key factors that differentiate a malicious attacker from an ethical hacker, stressing the importance of being within legal confines. Students will develop a broad understanding of current cybersecurity problems by completing projects on the topic of Ethical Hacking.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 647 Internet of Things (3 credits)

By 2020, the number of smartphones, tablets, and PCs in use will reach about 7.3 billion units. In contrast, the IoT (Internet of Things) will have expanded at a much faster rate, resulting in a population of about 26 billion units at that time. The IoT is the network of physical objects that contains embedded technology to communicate and sense or interact with their internal states or the external environment. In this course, students will use two of the most popular IoT platforms (Arduino and Raspberry Pi) to develop their own "things."

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 648 Distributed Computing (3 credits)

With the growth of technological expansion of computer networking, distributed systems are becoming more and more widespread. A distributed computer system consists of multiple autonomous computing devices that do not share primary memory but cooperate by sending messages over a communication network. This course systematically studies the special problems in distributed systems, including distributed control such as election and mutual exclusion, routing, data management Byzantine agreement, and deadlock handling. The course also introduces several basic parallel/distributed algorithms and typical applications in distributed shared memory, database, file systems, web applications, cloud, and block-chain.

Attributes: Graduate

CSC 652 Network Forensics (3 credits)

This course is a broad introduction to the field of Digital Forensics. It covers various fundamental topics necessary for digital forensics investigation, and a variety of hardware and software tools that are commonly used during the investigation. The course begins with foundations of electronic evidence including cybercrime laws, the 4th Amendment, compliance and requirements, collection and handling, analysis, and reporting. The course also covers fundamentals of file systems with specific details pertaining to Microsoft FAT file systems. Students will learn two important forensics techniques -file recovery and file carving-among other things. In addition, basic techniques used in Network-based digital forensics will also be covered. Finally, Anti-forensics will also be discussed. Hands-on lab activities familiarize students with several relevant investigation techniques.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 653 Intro to Soc Net Anlys and Mdl (3 credits)

The Analysis and Modeling of Social Networks is a very hot topic in Computer Science. Considering that mobile devices, such as smartphones and laptops, are physically carried by human beings, the data generated by these devices actually possesses certain social features. By analyzing the social features and modeling social networks, we are able to design better applications, in terms of the functionality and efficiency. This course will include methods for analyzing and modeling the following aspects of social networks: the small-world network models, social network search algorithms, power-laws and preferential attachment, diffusion and information propagation in social networks, community detection in social networks, models of network cascades, models of evolving social networks, links and attributes prediction. In addition, the course will introduce a set of tools for visually presenting and studying different social networks and their unique features.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 655 Social Network Security Issues (3 credits)

Since the arrival of the first generation of social networks in the 2000s, online social network platforms have expanded exponentially and many social network-based applications have been designed. However, the massive amount of personal information is stored and used by these platforms and applications, which inevitably causes security and privacy concerns. This course systematically studies the unique features of social networks and their data and applications, discusses the security problems and privacy leakage issues of social networks, and further introduces the cutting-edge techniques to solve those security and privacy problems.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 656 Info Security Mgmt Systems (3 credits)

An information security management system (ISMS) is a documented management system that consists of a set of security controls that protect the confidentiality, availability, and integrity of company/business assets from threats and vulnerabilities. The course covers the importance of an ISMS to any given organization in light of the multiple cybersecurity threats in the world today. It also explains the components of an ISMS, the methods used to create one, and complete exercises that show the relationship between technical cybersecurity skills; and, what makes those skills of value to businesses and other organizations.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 657 Incident Response Management (3 credits)

This course will explain the core components of creating a successful Computer Security Incident Response Plan (CSIRP) and maintaining it in response to changes at the organization. It will also detail how a well-maintained CSIRP can mitigate and offset the losses to an organization and lessen their legal liabilities in the event of a breach. The student will learn the hardware and software resources that exist to assist organizations in preventing incidents, and that collect data to properly investigate such incidents. The student will also learn how to properly execute the procedures within a CSIRP, and see how the plan will dictate information flow to the critical parties within the organization. Lastly, the program will connect Incident Response Management to an Information Security Management System.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 658 Applied Digital Forensics (3 credits)

The course introduces the core terminology and concepts regarding the proper preservation of digital evidence. It will explain Locard's Exchange Principle, the importance of precise chain-of-custody and detailed documentation during the data collection efforts, the importance of proper metadata preservation and the investigative use of that metadata. The course will transition to hands-on work using actual digital forensic tools. The students will collect pre-created evidence (email and file system), document their work with the tools and in their own notes. They will perform basic analyses, they will complete chain-of-custody forms, supply the logs generated by their use of the tools, and then answer questions on the evidence, their findings, and these processes over the course of the semester.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 659 Intro to Cloud Computing (3 credits)

Cloud Computing is concerned with the use and architecture of this model of computation. This course covers the services provided by clouds, their internal structure, and their possibilities and limitations. Topics include Infrastructure as a Service, Middleware (Platform) as a Service, Software as a Service, Service-oriented architectures, Web Services and standards, cloud security, reliability, governance, and wireless clouds.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 665 Intro to Cybercrime (3 credits)

The course covers the evolution of cybercrimes, and the evolution of the laws used to prosecute those who commit them. We will examine the fact-patterns of significant cybercrimes that have occurred in modern history, including notable prosecutions in hacking, illegal enterprise, and child exploitation. We will explore the (current) categories of cybercrimes and delve into the crimes that did not exist prior to the proliferation of the personal computer. We will explain the role of digital evidence in these prosecutions and we will also look closely at the laws (both at the federal and state levels) that are used to hold cybercriminals accountable.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 667 Info Govern, Risk & Compliance (3 credits)

This course discusses Information Governance (IG) and the policies and procedures needed within an organization to avert risk and stay compliant. The objectives of this course are to help students look at Information Governance in theory, practice, and policy. This is one of the primary drivers behind an organization's cybersecurity program and efforts is the goal of proper Information Governance.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 668 Cybersecurity Core Domains (3 credits)

This course is intended to orient the student on the ten core domains in the practice of cybersecurity. These domains were defined by the International Information System Security Certification Consortium, Inc. for their CISSP certification (Certified Information Systems Security Professional). The content presented in this course will offer a successful student the dual-benefit of being prepared for further study and possible certification as a CISSP, and also will provide them broad background knowledge on the technical and business needs that drive the practice of cybersecurity.

Prerequisites: CSC 656

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 670 Topics in CS (3 credits)

The course introduces students to recent theoretical or practical topics of interest in computer science. Content and structure of the course are determined by the course supervisor. The special topics for a given semester will be announced prior to registration. With permission of the Graduate Director the course may be taken more than once.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 671 Computer Science Education (3 credits)

Candidates will learn subject-specific standards for competencies based upon the Computer Science Teachers Association (CSTA) standards. The CSTA academic standards detail a core set of learning objectives providing the foundation for a rigorous K-12 computer science curriculum. The standards introduce the foundation concepts of computer science making them accessible for all learners. Topics will include the following: Algorithms and Programming, Computing Systems, Data and Analysis, Impacts of Computing, Networks and the Internet and Pedagogy.

Attributes: Graduate

CSC 672 Machine Learning (3 credits)

This course provides a comprehensive introduction to machine learning, covering fundamental concepts, algorithms, and practical applications. Students will learn the basics of supervised and unsupervised learning, including regression, classification, clustering, and dimensionality reduction. They will also explore advanced topics such as neural networks, deep learning, and reinforcement learning. Through hands-on programming projects and exercises, students will gain practical experience in implementing machine learning algorithms and analyzing real-world datasets.

Prerequisites: CSC 550

Attributes: Graduate

CSC 673 Game AI (3 credits)

This course provides an introduction to the field of Game AI using the Unity Engine and C#. Students will learn how to create intelligent game agents that exhibit complex behaviors such as pathfinding, decision making, and goal-oriented behavior. Through hands-on projects and assignments, students will gain practical experience implementing AI algorithms in Unity, preparing them to design and develop interactive game experiences. No prior experience with Unity or C# is required.

Prerequisites: CSC 500

Attributes: Graduate

CSC 680 Artificial Intelligence (3 credits)

The course covers fundamental concepts such as production systems, uniformed and informed search techniques, the role of heuristics, adversarial game playing, and admissibility. Additional topics may include inductive learning, genetic algorithms, decision trees, natural language processing, and perceptron learning. Course includes programming assignments in Java, Python, and R.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 681 Programming Paradigms (3 credits)

An exploration of the relationships between computational paradigms and the computer languages that support them. The Lambda calculus and functional programming, resolution and logic based languages, machine based models and imperative languages. The impact of the computational model on program structure and language design. A mid-sized programming project will be used to illustrate the concepts.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 682 Numerical Algorithms (3 credits)

Exposition and analysis of numerical methods for modern computers; review of basic concepts in linear algebra; direct and interactive methods for solving linear and nonlinear problems in numerical algebra; basic problems in approximation theory, numerical differentiation and integration; numerical solutions of different equations; forward and backward error analysis of algorithms; criteria for comparing the efficiency and suitability of numerical methods.

Prerequisites: CSC 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 683 Information Theory and Coding (3 credits)

Data encoding and transmission; variable length coding; the Kraft inequality for noiseless transmission channels; channel capacity; noise channels and channel capacity; the Shannon coding theorem; algebraic coding schemes.

Prerequisites: CSC 500

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 684 Complexity of Computation (3 credits)

P and NP problems; NP-complete classes; concrete complexity and the P class of combinatorial problems; complexity reduction on graph and string problems; complexity of algebraic computations.

Prerequisites: CSC 551

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 685 Advanced Machine Learning (3 credits)

The course will present machine learning algorithms for supervised and unsupervised learning with an emphasis on recent advances in deep learning with neural networks, decision trees, and various stochastic models. Application areas in data science, computer vision, natural language understanding, and engineering optimization will reinforce the covered topics. The course includes several programming projects.

Prerequisites: CSC 550

Attributes: Graduate

CSC 686 Introduction to Data Science (3 credits)

The course covers the fundamental concepts in data science including mathematical tools needed to analyze large data sets, data visualization, inferential techniques, cloud computation, and applying analytical methods to real-world business and industry data.

Prerequisites: CSC 550

Attributes: Graduate

CSC 687 Advanced Data Science (3 credits)

The course introduces most recent tools for performing predictive analytics, data visualization, data wrangling, statistical inference, deep machine learning, and software engineering. The main focus of the course is to introduce students to most important aspects of data science by reinforcing writing efficient code, testing, and debugging while working with large software systems. The course includes several programming projects.

Prerequisites: CSC 550

Attributes: Graduate

CSC 688 Generative AI (3 credits)

The course aims to investigate the role and various architectures of transformers which rely heavily on the self-attention mechanism. Topics include text classification and generation, transformer anatomy, document analysis, fake text and image generation.

Prerequisites: CSC 550

Attributes: Graduate

CSC 690 Computer Science Internship (3 credits)

An approved internship in advanced computer science.

Attributes: Graduate

CSC 791 Research Project I (3 credits)

Supervised independent research mentored by a graduate faculty member. Students must have a GPA of 3.5 and permission of the Graduate Director to enroll in this course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 792 Research Project II (3 credits)

Supervised independent research mentored by a graduate faculty member. Students must have a GPA of 3.5 and permission of the Graduate Director to enroll in this course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CSC 793 Research Project III (6 credits)

Supervised independent research mentored by a graduate faculty member. Students must have a GPA of 3.5 and permission of the Graduate Director to enroll in this course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Criminal Justice (CRJ)

CRJ 550 Research Methods and Analysis (3 credits)

The functions of concepts, hypotheses, and theories for an empirical discipline; the operationalization of theoretical variables; the principles of research design; and the problems of inference. The association between criminological theories and research methods used to study crime is explored through the utilization of a variety of related data sources. Also covered are basic quantitative techniques, relevant statistics, data interpretation, and an overview of SPSS. Required of all students unless CRJ 575 is taken.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 560 Criminological Theory (3 credits)

A systemic and critical analysis of the major theories of criminality, including an examination of both traditional and contemporary theories. Consideration will be given to conceptualizations of crime, the relationship of criminological theories to crime on the streets, and specific aspects of criminal behavior.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 565 Ethics and Criminal Justice (3 credits)

This course will address ethical issues in the criminal justice system at both the theoretical and applied levels. Typical theoretical issues addressed might include the following: the relationship between law and morality; theories of punishment; conditions for the moral and/or legal responsibility of individuals; notions of procedural justice. Typical applied ethics issues might include the following: search and seizure rules; the insanity defense and the "guilty but mentally ill" verdict; plea bargaining; capital punishment; mandatory sentencing; civil disobedience; limits on the use of deadly force.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 570 Prof Writ for Criminal Justice (3 credits)

The course is designed to develop the cognitive and technical skills of effective writing across the field of criminal justice. Primary emphasis will be given to the "craft of writing," thus learning the techniques and skills of effective professional communication in criminal justice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 575 Adv Resrch Methds & Analysis (3 credits)

In-depth coverage of data collection including questionnaire construction, advanced quantitative techniques and statistics, interpretation and drawing inferences, comprehensive use of SPSS, function of the SJU Institutional Review Board, and research report formulation. Students will select a topic, complete the literature review, and develop a research methodology that may later be used as the initial components of the master's thesis. Prerequisite: recent coursework and present working knowledge of basic research methods. Required of students intending to complete a master's thesis via CRJ 793. May be substituted for CRJ 550 as a core course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 600 Drugs and Society (3 credits)

Alcohol and drug use and abuse are a part of life in contemporary America. This course examines their role from the standpoints of sociology, criminology, and public health. What social factors such as gender, race, and class shape substance use? How do major social institutions such as the legal system and healthcare deal with substance use and misuse? What public policies and programs exist to regulate or reduce substance use, and how well do they work? Examples of topics discussed include why people take drugs, the various ways we respond to drug use and distribution, and the nonmedical use of prescription drugs. The course will also explore the contemporaneous issues of the opiate crisis, how the COVID-19 pandemic impacts substance use, treatment, and law enforcement, including in the context of police reforms.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 607 Multiculturalism & Justice (3 credits)

This course critically examines the experiences of underrepresented social groups in the criminal justice system through a lens of social justice and the sociological imagination. In furtherance of these goals, we will discuss: (1) the social construction of various social groups; (2) how society shapes the experiences of underrepresented social groups within the criminal justice system as professionals, offenders, and victims in a way that produces social injustices; and (3) how the criminal justice system can operate in a socially just way for all parties.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: On-Line Program Course, Graduate

CRJ 611 Crime Analys Using GIS Mapping (3 credits)

This course will examine the role of geographic information systems (GIS) in crime analysis by covering the basic components of a GIS and examining the use of GIS in police departments throughout the US. Special attention will be given to the use of GIS at the Philadelphia Police Department and will include techniques used to analyze crime patterns as well as a review of the way crime maps influence tactical deployment decisions. Finally, a visit to the Philadelphia Police Department's Crime Analysis Unit and/or Compstat meeting will illustrate the relationship of GIS to current crime problems in Philadelphia.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 615 Youth Cultures and Deviance (3 credits)

This course offers economic, cultural, political, and social perspectives on American youth based on sociological theory. Special attention will be paid to youth popular culture and the unique social problems facing young adults (e.g. gangs, drugs, suicide, and teen pregnancy).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 616 Juvenile Justice & Delinquency (3 credits)

This course provides a contemporary overview of theoretical and programmatic issues and concerns in juvenile delinquency and the juvenile justice system, including a review of recent research. The course also focuses on a critical review of the trends in problem solving and delivery of services to this population.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 617 Mental Health & The Law (3 credits)

The purpose of this course is to acquaint criminal justice professionals with the mental health field and to serve as a primer for understanding mental health and mental health professionals. In addition, particular areas of interplay between mental health and criminal justice will be emphasized to provide a historical and up-to-date factual background.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 618 Therapeutic Strat Crim Justice (3 credits)

An examination of the application of basic counseling principles to varied criminal justice settings, from adult correctional institutions to post-release situations. Special emphasis is given to innovative methods and programs.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 619 Fnds of Addiction:CRJ Profess (3 credits)

The course is designed to meet the needs of the criminal justice professional in dealing with the human and social consequences of addiction. The course will provide an understanding of substance abuse problems and addiction in American society. It is designed to provide a framework for exploring the effects of these problems on the many aspects of American culture including: the individual, family, criminal justice system, healthcare system, and the workplace. Course content will also include a critical analysis of current and past treatment interventions.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 620 Evid Bas Prac Subt Ab/Beh Hlth (3 credits)

Increasingly the Substance Abuse/Behavioral Healthcare field is being asked to prove that it offers a valuable treatment service for the funds it receives. This course will explore "best practices" including practice guidelines, treatments that are efficacious and evidence based treatments for substance abuse/addiction. The course will look at the level of energy needed and the complexities to transport "Evidence Based Scientific Knowledge" into a "real" clinical environment.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 621 Co-Occurring Disorders (3 credits)

The widespread prevalence of individuals suffering from concurrent psychiatric and substance use disorders has been increasingly recognized within the behavioral healthcare field, with a consequent need for well-trained professionals to be proficient in dealing with these clients, as well as able to function competently in the sophisticated, multidisciplinary programs which are evolving to treat co-occurring disorders. This course will provide the requisite foundational knowledge and skills for the student who will be faced with these challenges. The focus will be on evaluation, treatment planning and delivery, case management, aftercare, and self-help recovery groups. The characteristics and unique needs of each disorder will be addressed, accompanied by an examination of the impact of substance abuse and addiction.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 628 Victimology (3 credits)

The course focuses on the contemporary concept and status of the victim, juxtaposed with their historical evolution in terms of compensation, retribution, and vengeance. Current victim assistance programs are evaluated. The definition of the victim is broadened to include currently undervalued categories. Other issues addressed are child abuse, environmental casualties, and controversies over recovered memories.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 629 Violence and Victims (3 credits)

This course is designed to explore the serious problem of violence in our society from a sociological perspective. Violence is prevalent in homes and on the streets of the United States. This course will address a variety of types of violence, its causes, consequences, and theories for prevention. Topics which will be addressed include wife abuse, rape, child abuse, gang warfare, street violence and serial murder. An emphasis will be placed on understanding the structural causes of violence such as gender, race, and social class inequality as well as the effect of pornography, the media, and drugs/alcohol on violence. Particular attention will be given to the consequences of violence for both individual victims and society as a whole.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 632 Crime and Cities (3 credits)

From the beginning of the study of sociology in the United States, sociologists have studied life within a community context, documenting how space matters. The physical and social aspects of neighborhoods affect how likely crime is to occur in them and how residents can fight this crime. In addition to learning how space affects crime, we will learn key theories and concepts which sociologists use in studying crime in city neighborhoods, we will discuss current major issues related to crime, and we will study crime-fighting strategies.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 633 Federal Criminal Justice (3 credits)

This course will examine the criminal justice at the federal level. The main areas are the role of each branch of government; how agencies are funded; the major investigation, prosecution, probation, and correction elements; and individual investigative agencies including Inspector General. The course will cover the mission of and interrelationships among individual agencies.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 634 Fed Criminal Law & Prosecution (3 credits)

This covers federal criminal law and its enforcement. Major areas include an overview of federal crimes, elements of the United States Code, origin and scope of federal criminal law, and the role of federal agents in the support of prosecutions. Specific topics include mail and wire fraud, the Hobbs Act, official bribery and corruption, organizational crime, drug enforcement, money laundering, criminal civil rights violations and remedies, interference with witnesses, federal versus state prosecution, sentencing guidelines, and asset forfeiture.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 635 White Collar Crime (3 credits)

The course provides an understanding of the accounting and financial bases of embezzlement, fraud, corruption, and misapplication of funds. Legislation and regulation in government and business are examined. Consumer protection and corporate responsibility are discussed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 636 Federal Search and Seizure (3 credits)

This course is designed to teach the law of search and seizure as it is defined and applied in federal court. Instruction will focus on the requirements of the Fourth Amendment and the proper means by which a federal agent may obtain evidence through searches and seizures. This course will address legal and evidentiary issues associated with search warrants, exceptions to the warrant requirement, warrantless searches, frequent problems that confront federal agents, as well as emerging trends in the law of search and seizure.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 639 Org Crime:Targets & Strat (3 credits)

This course will investigate the social, economic, and political impact organized crime has on our society. We will target specific industries where organized crime has influence/control (e.g. construction, waterfront, garment, trucking, and convention centers). The course will explore criminal, civil, and administrative strategies to control and/or remove the influence of organized crime in those industries.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 640 Terrorism: Threats and Strateg (3 credits)

This course is designed to give the student an understanding of the concepts of terrorism, both domestic and international. Lecturer will address the causes and effects of terrorism as they relate to political structures from both religious and historical perspectives; noting its impact on the world today.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 641 Homeland Security (3 credits)

This course focuses on the consolidation of responsibilities and functions across agencies, at various jurisdictional levels, that have the charge of mitigating hostilities, threats, hazards, and consequences. Further, this course incorporates the pillars of robust response systems. This course is designed to develop analytical skills that will prepare students to identify, evaluate and resolve complex policy issues and initiate practical actions. Though the range of relevant issues extends from local matters to national security, this course will concentrate on preparedness strategies for state, urban and local areas.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 642 Law Enforc Intel Analysis (3 credits)

This course pursues the deliberative and cognitive activities and methodologies that surround the production of intelligence information, in support of decision-making at the strategic, tactical, and operational levels of law enforcement. Also examined are the structure and supervision of the intelligence analysis unit at various levels of law enforcement, and the role of the analyst.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 643 L.E. Intelligence:Policy & Pro (3 credits)

This course provides insights into the contemporary functions of law enforcement strategic, tactical, and operational intelligence and its influence upon crime prevention policy. The discussion will include the intelligence process in the context of intelligence unit structure and supervision, operating procedures, and resources. The course will examine how law enforcement intelligence relates to organizational relationships, planning, and decision-making.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 644 Elec Intelligence Analysis (3 credits)

This course will use the latest computer technology to train students in the use of Analyst Notebook 7, an electronic version of link analysis, telephone toll analysis and flow charts. Analyst Notebook 7 is the program currently being used by the CIA, FBI, NSA, US ARMY, INS, CUSTOMS, SECRET SERVICE, HOMELAND SECURITY, DEA, and more than 1500 other National, State and Local Law Enforcement agencies throughout the world, to combat Terrorism, Drug Smuggling, Money Laundering and Organized Crime. It is a hands-on training course and is limited to twenty-five students.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 645 Sociology of Disasters (3 credits)

This course is designed to provide the graduate student advanced knowledge and understanding of the sociological issues and concerns related to both man-made and natural disasters. The purpose is to present the current research pertaining to community resilience and the effects on individuals who witness, become victimized, or are otherwise affected by disasters. Each student will be expected to increase their capacity in both oral and written communication through their individual and group participation. The course will also improve the student's analysis of the sociological implications related to disasters.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 646 Risk Assessment (3 credits)

This course is designed to provide the graduate student advanced knowledge and understanding in the area of risk assessment and management. The focus is on the recognition of real and perceived threats, sharing information between communities and agencies, the collaboration of resources, and the management of risk. Students will examine the concepts of risk assessment, risk analysis, and the impacts of actual and suspected threats.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 647 Prob Contemporary Corrections (3 credits)

The major problems of adult corrections, including prison and jail overcrowding, population forecasting, judicial intervention in correctional operations, prison disturbances, mental health and incarceration, pretrial and post-conviction alternatives to traditional incarceration, ethics and corrections, and the death penalty. Case study materials are employed, and current and ongoing correctional issues are discussed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 648 Con Prob Probation & Parole (3 credits)

This course is designed to analyze the current legal, managerial, and political factors which impact upon the probation and parole system. It will examine organizational innovations, caseload management techniques, and technological advances used to confront such problems.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 649 Interrogation (3 credits)

Broadly defined as "the use of human beings to collect or confirm information through overt, covert, or clandestine methodologies," human intelligence (HUMINT) gathering is an essential component in military, national security, and law enforcement contexts. This course will begin with situating HUMINT in the broader intelligence cycle and to understand the critical role of intelligence analysis. The course will then focus on the more overt form of HUMINT collection where information, intelligence, and/or admissions are elicited from targets, subjects, or suspects. In common parlance, seeking information for tactical or strategic purposes, or to lead to arrest and prosecution, is referred to as interrogation, and the interrogation tactics, techniques, and procedures from the Army Field Manual, law enforcement manuals and elsewhere will be thoroughly reviewed for their effectiveness. The course will also cover the ethical issues related to HUMINT, including torture, and introduce the emerging practice of "investigative interviewing" as an alternate model to accusatory and coercive interrogation.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 650 Victim-offender Mediation (3 credits)

The introduction of restorative justice philosophy into the traditional criminal justice system has resulted in the adoption of a number of dialogue processes, which will be the focus of this new offering. The course will explore the humanistic mediation model and the community mediation model used by many local mediation groups. The course will also cover other processes such as community sentencing circles, restorative conferencing, reparative boards and family group conferencing. Participants will not only learn the theories behind these practices, but will have an opportunity to experience them through role-plays. Resolving conflict and dealing with the aftermath of crime through dialogue is a highly valued skill in restorative justice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 655 Inside/Out Exp Crime & Justice (3 credits)

This class is a unique opportunity to explore issues of crime and justice from inside a correctional facility, where the classes take place throughout the semester. The Inside-Out Prison Exchange Program brings together students from universities and adult students who are incarcerated to learn about and discuss topics such as the causes of crime, victims, the rationale of the criminal justice system, and restorative justice. Through the readings and dialogue, inside and outside students will be able to integrate their theoretical knowledge with lived experiences. It is through this exchange that we hope to critically analyze and challenge the current system in the U.S. that has resulted in a higher incarceration rate than other similar countries.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 656 Criminal Justice System (3 credits)

Provides a foundation and overview of the criminal justice system and process. The major components are discussed including crime, law, criminology, law enforcement, adjudication by the courts, corrections, juvenile justice, current issues and policies. This course is designed for students with only limited prior study in American criminal justice and little or no professional Criminal Justice experience in the United States. Permission of the Program Director required.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 659 Rest Justice: Theory Practice (3 credits)

Restorative justice is a new movement in the fields of victimology and criminology. Acknowledging that crime causes injury to people and communities, it insists that justice repair those injuries and that the parties are permitted to participate in that process. This course will provide the student with a strong foundation in restorative justice through the use of text, supplemental readings, videos and guest speakers. Students will also gain an understanding of how restorative justice differs from our traditional justice process.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 660 Foundations of Cybersecurity (3 credits)

This course offers cultural, scientific, and social perspectives on the use of technology in counterterrorism, specifically the impact of the Artificial Intelligence (AI) revolution on areas of intelligence and security, as well as other technologies most effective in the fight against terrorism.

Restrictions: Enrollment is limited to students with a major in Cyber Intelligence. Enrollment limited to students in the MSCRJ program.

Enrollment is limited to Graduate level students.

Attributes: On-Line Program Course, Graduate

CRJ 661 21st Century Policing (3 credits)

This course examines best practices for enhancing law enforcement tools in reducing crime and building and sustaining legitimacy through public trust and procedural justice. It draws on and expands upon the six pillars in the final report of the President's Task Force on 21st Century Policing to prepare officers to navigate an evolving societal landscape using a guardian mindset instead of a warrior mindset.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 770 Spec Topic/Independent Study (3 credits)

An opportunity to conduct extensive literature review or research project under the supervision of the Graduate Director. Such work must be preceded by a proposal that must be approved by the Director of the Graduate Criminal Justice program.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 789 Criminal Justice Internship (3 credits)

An opportunity to carry out supervised field experience under the supervision of a subject matter expert and facilitated by the Graduate Director. Such work must be preceded by a proposal that must be approved by the Director of the Graduate Criminal Justice program.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 793 Thesis Supervision I (3 credits)

An integrative course in which the student is expected to complete a research paper toward the completion of a Masters thesis, utilizing the research methods and subject matter competence obtained in previous courses. This is the first of two required courses for completing a Masters thesis. Thesis credits are encouraged for students who plan to pursue a Ph.D. or who want to work in a research field. Permission of the Director required.

Prerequisites: CRJ 570 and CRJ 575

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

CRJ 794 Thesis Supervision II (3 credits)

An integrative course in which the student is expected to complete a Masters thesis, utilizing the research methods and subject matter competence obtained in previous courses. This course is the second of two thesis supervision courses required for the Masters Thesis. Students should only enroll in this if they have successfully completed CRJ 793. A thesis is encouraged for students who plan to pursue a Ph.D. or a career in research. Permission of the Director required.

Prerequisites: CRJ 793

Attributes: Graduate

Data Science (DSC)

DSC 223 Intro Math of Data Science (3 credits)

This course provides an introduction to basic mathematical and statistical topics needed to understand data science. It includes elementary set theory and counting techniques, discrete probability, descriptive statistics, simple linear regression, basic inferential statistics, and an introduction to linear algebra. This course also provides an introduction to the R statistical software and programming language.

Prerequisites: MAT 155 or MAT 161 or MAT 123

Attributes: GEP: Math Beauty, Undergraduate

DSC 225 Data Science for Sports (3 credits)

This course covers player/team performance assessment and comparisons using historical and online data. To explore various sports-related data sets, students will learn methods of data cleaning, data visualization, statistical tests, statistical modeling, predictive analysis, and simulation. The focus will be on Tennis, Soccer, Basketball, and Volleyball. Students will learn to code in Python and/or R.

Prerequisites: (MAT 118 or MAT 128 or MAT 134 or DSC 223 or DSS 210)

Attributes: GEP: Math Beauty, Undergraduate

DSC 325 Essentials of Data Science (3 credits)

This course covers the basic topics in data science. It includes descriptive and inferential statistics, introduction to simple and multiple regression, data visualization, and data cleaning or scrubbing. It also includes an introduction to machine learning topics such as decision trees, k-nearest neighbors, neural networks and clustering. The R software or the Python programming language will be used to visualize and analyze datasets.

Prerequisites: MAT 223 or DSC 223

Attributes: GEP: Math Beauty, Undergraduate

DSC 326 Advanced Data Science (3 credits)

This course covers some advanced topics in data science, including recent tools for performing predictive analytics, data visualization, data wrangling, statistical inference, deep machine learning, and software engineering. Various software packages, including TensorFlow, will be used to build predictive models. Whenever appropriate, the mathematical background of predictive models will be covered. Also, one of the main goals is to introduce students to the most important aspects of data science by reinforcing writing efficient code, testing, and debugging while working with large software systems. The course includes several programming projects in Python and/or R.

Prerequisites: DSC 325 or CSC 346

Attributes: GEP: Math Beauty, Undergraduate

DSC 424 Regression and Time Series (3 credits)

The first part of the course covers Generalized Linear Models (GLMs). Topics include exponential family, important link functions, estimations (maximum likelihood estimation, generalized moment matching), diagnostic tests for model validations (graphical methods, chi-square statistics, t and F tests, AIC and BIC, likelihood ratio test), applications of GLMs on real data, prediction and confidence intervals. It also includes penalized regression (ridge and lasso regression, k-nearest neighbors algorithm). The second part of the course covers Time Series Analysis. Topics include an introduction to discrete stochastic processes, random walks, stationary processes, autocorrelation functions, and partial autocorrelation functions, various time series models (exponential smoothing, autoregressive (AR) model, moving average (MA) model, ARMA model), autoregressive conditional heteroskedastic (ARCH) model, generalized ARCH (GARCH) model, variants of GARCH, predictions and their confidence intervals using time series models.

Prerequisites: MAT 223 or (MAT 128 and MAT 155) or (MAT 128 and MAT 161)

Attributes: GEP: Math Beauty, Undergraduate

DSC 425 Machine Learning/Data Science (3 credits)

This course provides an introduction to Machine Learning, Data Science and Predictive Analytics. It includes linear regression, logistic regression, nearest neighbor methods, decision trees, neural networks, deep learning methods, clustering, principal components analysis, and resampling methods such as cross-validation and bootstrapping. If time permits, it will also include support vector machines and machine learning methods for numerical optimization such as genetic and evolutionary algorithms and swarm intelligence algorithms. The Python programming language or the R software will be used to apply statistical and machine learning methods to real data sets. Whenever appropriate, the mathematical background of machine learning methods will be covered. Students will be required to work on a final data analysis project and present their findings in class. This course and DSC 424 (Regression and Time Series) together cover the topics in the SOA (Society of Actuaries) exam in SRM (Statistics for Risk Modeling) and provide an intro to the PA (Predictive Analytics) exam. Also, this course and DSC 424 cover several topics in the CAS (Casualty Actuarial Society) exams in MAS (Modern Actuarial Statistics) I and II.

Prerequisites: MAT 223 or DSC 223

Attributes: GEP: Math Beauty, Undergraduate

DSC 470 Special Topics: Data Science (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

DSC 471 Independent Study (3 credits)

Students will study a topic in data science with a faculty mentor.

Attributes: Undergraduate

DSC 491 Data Science Internship I (3 credits)

The course goals are: to gain first-hand experience of the daily activities of professionals in data science and related fields, to verify an interest in a particular area of data science, to develop and hone skills required for data science professions, to establish contacts outside the academic community who will facilitate a career in data science. An internship journal and an academic paper are also required.

Attributes: Undergraduate

DSC 492 Data Science Internship II (3 credits)

The course goals are: to gain first-hand experience of the daily activities of professionals in data science and related fields, to verify an interest in a particular area of data science, to develop and hone skills required for data science professions, to establish contacts outside the academic community who will facilitate a career in data science. An internship journal and an academic paper are also required.

Attributes: Undergraduate

DSC 493 Independent Research I (3 credits)

Students need to complete the application form for independent study and have the approval of the department chair / program director and Associate Dean in order to register. Honors Research (6 credits) must be elected in junior year to allow adequate research time. Honors Students need to complete the application form for Honors Thesis and have the approval of the department chair / program director, Associate Dean and the Honors Program Director in order to register. Honors Students must complete this sequence.

Attributes: Undergraduate

DSC 494 Independent Research II (3 credits)

Students need to complete the application form for independent study and have the approval of the department chair / program director and Associate Dean in order to register. Honors Research (6 credits) must be elected in junior year to allow adequate research time. Honors Students need to complete the application form for Honors Thesis and have the approval of the department chair / program director, Associate Dean and the Honors Program Director in order to register. Honors Students must complete this sequence.

Attributes: Undergraduate

Decision & System Sciences (DSS)

DSS 100 Excel Competency (1 credit)

Mastering Excel is a critical for students as they enter the workforce. In Excel Competency, students will learn basic, intermediate and advanced Excel skills including financial, accounting, statistical, and decision making. The course will explore the use of excel in all fields of the business school. Students will be provided with instruction and short videos for reinforcement and review.

Attributes: Undergraduate

DSS 150 Data Visualization (3 credits)

The human mind can handle significant amounts of information, but is not able to process the large masses of data required for business decision-making. There is a vast number of data processing and visualization technologies, tools, and techniques available to business users, but it is important to first understand how human consumers of information receive and interpret it. This class uses an interdisciplinary approach to examine methods for data presentation which are more meaningful to users. Students will learn a variety of concepts related to information gathering, processing, and presentation, and have some practice with a data visualization tool. Course activities draw from various disciplines including information systems, computer science, cognitive psychology, economics, graphic design, and research methods to examine and evaluate information. Students will present and analyze data sets in graphical form and explain their findings via written, oral, and visual presentations.

Attributes: First-Year Seminar, Undergraduate

DSS 200 AI in Business (3 credits)

This course is an introduction to Artificial Intelligence (AI) concepts and uses, and to the contemporary Information Technologies (IT) and Systems (IS) that enable them. Students will learn about hardware components, software applications, databases, networks, and Internet technologies. The combination of these technologies with people and processes to make Business Intelligence, Data Analytics, and Artificial Intelligence systems possible will be explored. AI coverage includes its development history, machine learning, neural networks, deep learning, robotics, natural language processing, large language models, generative AI, and other emerging topics. Students will learn to identify how AI/IT/IS affect our lives, to assess personal privacy and organizational security risks, and learn principles that will help them become discriminating, informed, and successful users. Instructors will use AI tools actively during class to guide students in their proper professional and ethical use. Students will examine AI-generated outputs critically, with the goal of equipping them to deal with these technologies in their professional lives. Assignments will include explicit AI policies to showcase responsible use in approaching and analyzing problems.

Attributes: Undergraduate

DSS 210 Business Statistics (3 credits)

This course covers probability concepts as well as descriptive and inferential statistics. The emphasis is on practical skills for a business environment. Topics include probability distributions, estimation, one-sample and two-sample hypothesis testing, inferences about population variances, and chi-square test of independence. Students will also become familiar with spreadsheet applications related to statistics and with statistical software.

Prerequisites: DSS 100 (may be taken concurrently)

Attributes: Undergraduate

DSS 220 Business Analytics (3 credits)

Every organization, must manage a variety of processes. In this course the student will development an understanding of how to evaluate a business process. Additionally, the art of modeling, the process of structuring and analyzing problems so as to develop a rational course of action, will be discussed. The course integrates advanced topics in business statistics-linear and multiple regression and forecasting, production and operations management-linear programming and simulation, and project management. Excel software is used for problem solving.

Prerequisites: DSS 210

Attributes: Undergraduate

DSS 251 Internship (3 credits)

This course is reserved for students completing internships for credit. This course may not count as a major elective for BIA, ML/AI or SCM. It may not count as a minor elective for BIA, ML/AI or SCM. Students may count this course as a general elective and must be supervised by a DSS faculty member.

Attributes: Undergraduate

DSS 315 BIA Concepts & Practices (3 credits)

This course is an introduction to various scientific viewpoints on the decision-making process. Viewpoints covered include cognitive psychology of human problem-solving, judgment and choice, theories of rational judgment and decision, and the mathematical theory of games, and these topics will be focused in the field of Business Intelligence and Analytics, with systems theory as an overarching theme. Latest academic research and industry practice will be presented by guest speakers to motivate the topic an enhance learning.

Prerequisites: DSS 200

Attributes: Undergraduate

DSS 321 Project Management (3 credits)

This course introduces students to project management - an important skill for every student to successfully identify, plan, execute, monitor and close-out projects. Topics covered include introduction to project management, project selection and prioritization, project chartering, organizational capability, leading and managing project teams, stakeholder analysis and communication planning, scheduling projects, resourcing projects, budgeting projects, risk planning, quality planning, project supply chain management, determining project progress and results, and finishing projects and realizing benefits. Throughout the course, students will gain valuable project management experience by working in small groups.

Attributes: Undergraduate

DSS 325 Open Source Program Lang (3 credits)

As data volume grows across industry and government, techniques to manage and use this data are critical. In this course, we learn the use of open-source programming languages, such as Python, that make it possible to deal with the demands placed on us by big data. The course covers topics including variables, input and output, compound data types, conditionals and branching, functions, recursion, data dictionaries, exception handling, and object-oriented programming. The course stresses good programming style and practical applications.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 330 Database Management (3 credits)

Databases help organizations store what they know. Everything from information about business partners to supply chain management data to customer/consumer behavior is stored in a database of some type. It is no exaggeration to say all investment in computer technologies over the past few decades has been made in order to enable the collection, storage, analysis, synthesis, and communication of data, and it is all facilitated by database systems. As such, databases are the foundational technologies for enabling business intelligence and analytics services and activities. Students in this course will be exposed to the theoretical underpinnings of database systems, their component technologies, enabling processes, and to current and emerging applications. Students will obtain basic hands-on experience with an end-user database application (MS Access), an open-sourced enterprise-level system (MySQL), and an understanding of the capabilities of all enterprise-level relational database management systems. The course is required of all students pursuing a BI&A major or minor.

Prerequisites: DSS 200 or CSC 115 or CSC 120 or MHI 301

Attributes: Undergraduate

DSS 335 Found of Supply Chain Mgmt (3 credits)

This course introduces a comprehensive and fundamental understanding of supply chain management (SCM) for undergraduate students. It contains analytical concepts, case studies, and recent examples in academia and industry. It covers the major issues and models practitioners concerning the related fields: inventory management, SCM network design and planning, supply chain integration and strategy, distribution strategies, procurement and outsourcing, flexibility and Toyota Production System (TPS), risk management, Sustainable supply chains, recent IT in SCM (e.g., AI, blockchain, Internet of Things, robotics), etc. Most chapters initiate with an emerging or mature case in the field. After all the learning and discussion in the chapter, one would be expected to offer the case a practical and constructive solution with grounded theories or models. Modeling and programming are not among the course objectives, while some classic models will be introduced for basic optimization understanding purposes.

Attributes: Undergraduate

DSS 350 SCM Dynamics (3 credits)

This course provides a comprehensive overview of supply chain management, focusing on the financial, strategic, and operational decisions that drive modern supply chains. Students will explore key concepts such as transportation, inventory management, and warehouse operations while understanding the impact of digital transformation in optimizing supply chains. Through a series of hands-on demos with industry-standard software tools and guest lectures, students will get exposure to real world practices. By the end of the course, students will have a strong foundation in supply chain strategy, data analytics, and the tools used for performance management and planning, preparing them to lead digital transformations in the supply chain domain.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 360 CPIM Certification (3 credits)

This course includes content needed to pass the exam for part I of the Certified in Planning and Inventory exam offered by the Association for Supply Chain Management. Agility is critical to thriving supply chains. CPIM certification shows employers that an individual knows how to effectively manage disruptions, demand variations and supply chain risk. Topics include SC fundamentals. Operating environments, financial fundamentals, demand management, voice of the customer (VoC), product and process design, capacity management, planning, inventory, purchasing cycle and distribution.

Prerequisites: DSS 335

Attributes: Undergraduate

DSS 365 CSCP Certification (3 credits)

This course includes content needed to pass the exam for Certified Supply Chain Professional (CSCP) offered by the Association for Supply Chain Management. Topics include SC design and strategy, procurement and delivery of goods, supply chain partner relationships, reverse logistics; measure, analyze and improve supply chains; compliance with standards, and risk management.

Prerequisites: DSS 335

Attributes: Undergraduate

DSS 415 Data Wrangling & Visualization (3 credits)

Data Wrangling is the process of transforming and/or mapping data from its "raw" initial collected form into another format with the intent of making it more appropriate and valuable for a variety of downstream purposes such as analytics and visualization. In this course, you will learn how to import, clean, structure, and effectively display data. Underlying data, in many business applications, comes from multiple sources and may have missing values and inconsistencies that need to be rectified. Data visualization is an interdisciplinary field that deals with graphically representing that data. It is a particularly efficient way of communicating when the data is numerous in size (rows and/or columns) and also in multiple formats (quantitative, qualitative, geographical, etc.). Data cleansing and wrangling will then allow the creation of realistic, insightful, and comprehensible data visualizations, while avoiding misleading techniques. Through discussion, individual research, and hands-on use of cutting-edge tools (including: Alteryx, Excel, and Tableau), we will develop knowledge and skills that will be immediately applicable in any analytics field. Hands-on projects are used throughout the course to allow students to see immediate results of the tools and techniques learned.

Prerequisites: DSS 220 or DSS 223

Attributes: Undergraduate

DSS 416 Data Wrangling: Ethics Int. (3 credits)

Data Wrangling is the process of transforming and/or mapping data from its "raw" initial collected form into another format with the intent of making it more appropriate and valuable for a variety of downstream purposes such as analytics and visualization. In this course, you will learn how to import, clean, structure, and effectively display data. Underlying data, in many business applications, comes from multiple sources and may have missing values and inconsistencies that need to be rectified. Data visualization is an interdisciplinary field that deals with graphically representing that data. It is a particularly efficient way of communicating when the data is numerous in size (rows and/or columns) and also in multiple formats (quantitative, qualitative, geographical, etc.). Data cleansing and wrangling will then allow the creation of realistic, insightful, and comprehensible data visualizations, while avoiding misleading techniques. Through discussion, individual research, and hands-on use of cutting-edge tools (including: Alteryx, Excel, and Tableau), we will develop knowledge and skills that will be immediately applicable in any analytics field. Hands-on projects are used throughout the course to allow students to see immediate results of the tools and techniques learned. Moreover, the potential for benefit(loss), can be translated into decision-making, risk assessment and strategic planning. It can provide managers with tools for measuring the project viability. We will examine ethical precepts and theories within the context of global community development.

Prerequisites: DSS 220 or DSC 223

Attributes: GEP: Ethics Intensive, Faith Justice Course, Undergraduate

DSS 420 Introduction to Data Mining (3 credits)

The "business intelligence" wave has quickly spread throughout the business sector. This wave begins with canned reports, through query & reporting, data warehouse/marts, online analytical processing (OLAP), then to data mining. This course discusses how data mining techniques are used to transform large quantities of data into information to support tactical and strategic business decisions. While the student will be introduced to data mining techniques, the focus of the course is learning when and how to apply data cleaning, appropriate methodology, and more importantly read and process output meaningfully in business applications and explain the output clearly and concisely without analytics jargon. The aim of this course is to provide the student with the foundation to data mine and understanding of the data mining process. It includes an introduction to some advanced statistical decision-making tools, including several multivariate data mining techniques, factor/principal component analysis, cluster analysis, ANOVA, multivariate regression, and logistic regression.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 425 Analytics Cup (3 credits)

The Analytics Cup course is a competition in which teams will solve a real-world problem situation utilizing their Business Intelligence (BI) and/or Business Analytics (BA) skills. During the course, all the students will learn about new BI and BA techniques. Each team will dig deeper into the application of one or more these software packages to solve their real-world problem situation. The competition culminates where each team presents their solution to a panel of judges who select the SJU Analytics Cup Champions.

Prerequisites: DSS 420 and DSS 435

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Business Intellig. Analytics.

Attributes: Undergraduate

DSS 430 Alternative Risk Financing (3 credits)

The course focuses on the theory and practice of evaluating the value impact of risk financing options. The course covers simulating risk distributions, evaluating retention and transfer strategies, evaluating risk financing options (after-tax, NPV), off-shore financing, role of reinsurance, forecasting risk loss, capital market functions, forming captive insurance companies. The course's projects rely heavily on Excel as a tool to evaluate and model risk financing options - using both simulated and real-world data. Group projects also utilize Access to create relational databases of risk data for analysis. This course is aligned with the risk management industry designation exam, ARM 56. This course is also approved under The Institutes Collegiate Studies for CPCU program. DSS 330 is recommended for this course, but is not a required prerequisite.

Prerequisites: DSS 220 and RMI 301

Attributes: Undergraduate

DSS 435 Advanced Business Analytics (3 credits)

This course extends several of the foundation Business Analytics topics from DSS 220 to address more complex problem solving situations. Techniques to be covered are optimization models (linear programming, integer programming, non-linear programming and others), simulation models, optimization/simulation models, and decision analysis. These techniques will all be presented in the context of real world problems. To improve the students' ability to develop such models, fundamental problem solving skills of modeling and process analysis will be developed.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 440 Six Sigma Apps & Foundations (3 credits)

This course presents an introduction to Six Sigma and its vocabulary, coverage of business statistics focusing on hypothesis testing, multiple regression, experimental design, analysis of variance, statistical process control, analytic hierarchy process, discrete event simulation, and other tools of Six Sigma. This course roughly covers the material covered on the yellow belt/green belt certification examination.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 445 Statistical Programming Lang (3 credits)

The goal of this course will be to use R's command line interface (CLI) to build familiarity with the basic R toolkit for statistical analysis and graphics. Specifically, students will learn good programming practices to manage and manipulate data, become familiar with some of R's most commonly used statistical procedures, and apply knowledge of data mining techniques (Multivariate Statistics, Regression, ANOVA, Cluster Analysis, Logistic Regression) for complex data sets using R.

Prerequisites: DSS 420 or MAT 423 or ECN 410 or DSC 325

Attributes: Undergraduate

DSS 447 Resilient Supply Chains (3 credits)

Supply chains have historically been optimized with respect to costs and other specific attributes, including the provisioning of materials, manufacturing processes, and distribution logistics. This highly optimized network of exchanges is therefore sensitive to sudden or extreme changes in demand, such as those experienced during the COVID-19 pandemic. This course introduces students to bleeding-edge techniques for making supply chains more resilient. Specific topics include methods for the identification of critical dependencies and for the evaluation, verification and restoration of properties of the supply chain.

Prerequisites: DSS 200 and DSS 220

Attributes: Undergraduate

DSS 451 Machine Learning for Bus I (3 credits)

This course will introduce Artificial Intelligence (AI) and Machine Learning (ML) applications and methods in Business. The course will begin by exploring terminology, basic concepts and definitions in AI/ML and move on to understanding what AI can and cannot realistically do. A variety of ML methods will then be introduced. The Python Programming language will be used to analyze data using these methods (starting with a mini-bootcamp to review programming concepts). Frequent use of real-world business case studies will be made in order to help connect these concepts to business applications.

Prerequisites: (DSS 325 or CSC 115 or CSC 133) and (DSS 420 or DSS 325)

Attributes: Undergraduate

DSS 455 Machine Learning for Bus II (3 credits)

This course will build upon the methods learned in DSS 451 and will also introduce some of the most popular Machine Learning Algorithms currently. This will include Neural Networks and Deep Learning, which are one of the fastest growing and widely used ML algorithms in the industry. The Python Programming language will be used to analyze data using these methods. Frequent use of real-world business case studies will be made in order to help connect these concepts to business applications.

Prerequisites: DSS 451

Attributes: Undergraduate

DSS 465 Supply Chain Analytics (3 credits)

This course introduces the undergraduate-level quantitative theory and tools to remedy the supply chain management (SCM) crisis after the COVID-19 pandemic. Students from SCM major or related major in their junior or senior year are encouraged to take this interdisciplinary course covering techniques and knowledge from Microeconomics, Statistics, Operations Management, and Data Analytics (a brief review of the required knowledge in this field is scheduled before the introduction of modeling). Students will be exposed to analytical concepts and techniques, case studies, and recent examples in academia and industry. It covers the major issues and models practitioners concerning the related fields: inventory management, logistics management, SCM network design and planning, distribution strategies, qualitative and quantitative forecasting, data analytics, recent IT in SCM (e.g., AI, blockchain, Internet of Things, robotics), etc. Basic modeling and programming can be expected on the course. However, the teaching approaches, contents, difficulty levels, and final deliverables should seamlessly fit the expectations, backgrounds, and prior knowledge of students in each section.

Prerequisites: DSS 220

Attributes: Undergraduate

DSS 470 DSS Special Topics I (3 credits)

Content of this course varies to allow for ongoing changes to business intelligence and related fields. The instructor will provide the course description for a given semester.

Attributes: Undergraduate

DSS 471 DSS Special Topics II (3 credits)

Content of this course varies to allow for ongoing changes to business intelligence and related fields. The instructor will provide the course description for a given semester.

Attributes: Undergraduate

DSS 493 Independent Study I (3 credits)

Students will study a topic in decision and system sciences with a faculty mentor.

Attributes: Undergraduate

DSS 494 Independent Study II (3 credits)

Students will study a topic in decision and system sciences with a faculty mentor.

Attributes: Undergraduate

DSS 509 Curricular Practical Training (1 credit)

Curricular Practical Training (CPT) is defined by US Citizenship and Immigration Services as employment which is an integral part of an established curriculum, including alternative work/study, internship, cooperative education, or any other type of required internship or practicum that is offered by sponsoring employers through cooperative agreements with the institution.

Attributes: Graduate

DSS 600 Found for Bus Intel & Analyts (3 credits)

The course is intended to provide the students with an introduction to the quantitative analysis methods utilized for problem-solving and decision making in the health care setting. The content will focus on five areas central to the administration of a healthcare organization: finance, quality, market, operations, and utilization. The course will help future health care leaders understand the data presented as well as think critically beyond the data.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 605 Emerging Tech for Business (3 credits)

Businesses must be innovative to stay competitive in the marketplace. Technology allows businesses to innovate, improve their processes, create and update products and services, and transform and create new business models. Business leaders, decision-makers, and employees must continuously look for emerging technologies and understand and incorporate them early enough to stay ahead of competitors. This course will introduce students to several emerging technologies and concepts of innovation. The focus will be emerging technologies' business applications, impact, risks, opportunities, etc. In addition to business impact, the course will discuss the environmental and societal impacts of using emerging technologies. Students will use different learning mediums and methods, including books, online materials, active in-class discussions and discussion boards, writing papers, and presentations.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 610 Business Analytics (3 credits)

The aim of this course is to provide the student with an understanding of several analytics techniques and to provide some insight into how these tools may be used to analyze complex business problems and arrive at a rational solution. The techniques to be studied are data visualization, forecasting, linear programming, decision analysis and simulation. Cases of increasing complexity will be used to emphasize problem description, definition, and formulation. The computer will be used extensively throughout the course, primarily by using available programs to perform the calculations after the problem has been correctly formulated.

Emphasis will be placed on the interpretation and implementation of results. In addition, we will examine the current/future of analytics.

Students must complete the ALEKS online Statistics Proficiency module before enrolling in DSS 610.

Prerequisites: HSB Foundation with a score of DS510

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 615 Python Programming (3 credits)

Python is an open source programming language that focuses on readability, coherence and software quality. It boosts developer productivity beyond compiled or statically typed languages and is portable to all major computing platforms. This course is designed as an introduction to python programming and the characteristics that make it unique. Student will learn the use of the python interpreter, how to run programs, python object types, python numeric types, dynamic typing, string fundamentals, lists and dictionaries, and tuples and files.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 620 Con & Pract of DSS Modeling (3 credits)

Building on the background of previous courses, this course will extend the use of spreadsheet modeling and programming capabilities to explore decision models for planning and operations using statistical, mathematical, and simulation tools.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 625 Fund of Database Mgmt Systems (3 credits)

This course covers the introductory database management concepts such as data normalization, table relationships, and SQL. In addition to a basic theoretical presentation of the database design concepts, students will be required to design and develop a database application using a modern fourth generation language system. This course teaches students the foundations of database management systems and relational data model. Another basic component of this course is the use of SQL – Structured Query Language. Students will also learn how to create databases, modify databases, and develop queries using SQL.

DSS 630 Database Mgmt Theory & Pract (3 credits)

Business Intelligence rests on the foundation of data storage and retrieval. In this course, students will be presented with the theory of operational database design and implementation. The concepts of normalization, database queries and database application development will be introduced using contemporary tools and software such as SQL for program development.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 640 Managing Data Intelligence (3 credits)

The objective of this course is to introduce the students to business analytics technologies with a major emphasis on advanced data management technologies such as data warehousing and distributed systems. Further, the course also focuses on illustrating various analytics techniques and their applications. In addition, the course also provides students an illustration of how organizations employ data intelligence to make decisions or to gain a competitive edge.

Prerequisites: DSS 610 and DSS 630

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 650 Process Simulation & Analysis (3 credits)

Using contemporary software tools, students will learn to break down the steps of business process analysis and design. They will first build process maps, and then use queueing theoretic concepts to statistically characterize arrival and service times. They will build simulation models in multiple software applications, and complete hypothesis tests to determine the significance of differences in scenarios.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 655 Optimization Modeling (3 credits)

This course provides the student with a deeper understanding of several optimization methods, such as linear programming, integer linear programming, multiple objective, and nonlinear programming. and provide some insight into how these tools may be used to analyze complex business problems and arrive at a rational solution.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 660 Introduction to Data Mining (3 credits)

This course in the Business Intelligence Program will extend the concepts of data mining to an exploration of a contemporary Data Mining tool set on a large live data set. In this course, students will be encouraged to find the patterns in the data and to prepare reports and presentations describing the implications of their findings.

Prerequisites: DSS 610 or MHI 563

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 665 R Statistical Language (3 credits)

The goal of this course will be to use R's command line interface (CLI) to build familiarity with the basic R toolkit for statistical analysis and graphics. Specifically, students will learn good programming practices to manage and manipulate data, become familiar with some of R's most commonly used statistical procedures, and apply knowledge of data mining techniques (Multivariate Statistics, Regression, ANOVA, Cluster Analysis, Logistic Regression) for complex data sets using R.

Prerequisites: DSS 610 and DSS 660

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 670 Data Visual & Perf Analyt (3 credits)

This course introduces the concept of creating meaningful performance measures, identifying key performance indicators, graphic design, and best practices in data visualization through short hands-on projects. Students will work to understand best practices for visual design of performance dashboards to communicate, rather than dazzle, understand current software and uses, and leverage modern tools to discover stories within the data. Emphasis will be placed on learning how to present critical information that provides insightful and actionable results. By the end of the course, students will also be prepared to take the Tableau certification exam and the Qlik Sense certification exam.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 675 Decision Analysis/Game Theory (3 credits)

This course introduces decision making techniques for systems operating under uncertainty and a set of analytical tools used to study the strategic interactions of individuals and institutions. The course covers probability and Bayesian inference, basic concepts of decision theory, decision tree, static and dynamic games (under complete and incomplete information). Applications include cooperation, price setting under imperfect competition, trust and reputation building, bargaining, auctions, signaling, and matching markets.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 676 Data Wrangling & Adv Visualtn (3 credits)

Data Wrangling is the process of transforming and/or mapping data from its "raw" initial collected form into another format with the intent of making it more appropriate and valuable for a variety of downstream purposes such as analytics and visualization. In this course, you will learn how to import, clean, structure, and effectively display data. Underlying data, in many business applications, comes from multiple sources and may have missing values and inconsistencies that need to be rectified. Data visualization is an interdisciplinary field that deals with graphically representing that data. It is a particularly efficient way of communicating when the data is numerous in size (rows and/or columns) and in multiple formats (quantitative, qualitative, geographical, etc.). Data cleansing and wrangling will then allow the creation of realistic, insightful, and comprehensible data visualizations, while avoiding misleading techniques. Through discussion, individual research, and hands-on use of cutting-edge tools (Alteryx, Excel, and Tableau), we will develop knowledge and skills that will be immediately applicable in any analytics field. This course will heavily utilize Alteryx and focus on building on the Data Visualization knowledge learned in DSS 585. Hands-on projects will be leveraged throughout the course to allow students to see immediate results of the tools and techniques learned. Note: Alteryx is only available for Windows and uses a substantial memory. All students must have access to a Windows based computer.

Prerequisites: DSS 670

Attributes: Graduate

DSS 680 Predictive Analytics (3 credits)

This course extends the data mining process to the predictive modeling, model assessment, scoring, and implementation stages. In this course, professional data mining software and small and large data sets will be used to effectively analyze and communicate statistical patterns in underlying business data for strategic management decision making.

Prerequisites: DSS 610 and DSS 660

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 690 Special Topics Course (3 credits)

Content of this course varies to allow for ongoing changes to business intelligence and related fields. The instructor will provide the course description for a given semester.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 693 Independent Study I (3 credits)

Students will study a topic in decision and system sciences with a faculty mentor.

DSS 694 Special Topics (1-3 credits)

Topics will vary according to the semester in which the class is offered.

DSS 710 Six Sigma Apps & Found (3 credits)

This course prepares the student for the Six Sigma Green Belt certification examination. Topics include the Six Sigma dashboard and related models (DMAIC, DMADV, DFSS: QFD, DFMEA, and PFMEA), selecting and managing projects, organizational goals, lean concepts, process management and capability, and team dynamics and performance.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 720 Supply Chain Analytics (3 credits)

Management of supply chains is critical to the success and profitability of all businesses, whether manufacturing or service companies. This course examines supply chains and the business analytic tools which are most effective in developing supply chain efficiencies and supply chain value. Topics include supply chain strategy, network and system design, operations management, sourcing, logistics, forecasting, inventory management, relationship management and sustainable supply chain management.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 730 Digital Analytics (3 credits)

This course explores the methods used to measure, analyze, and present the performance of websites, mobile applications, social platforms, as well as complementary platforms such as video, email, and podcasts. We use common tools like Google Analytics and Tag Manager to measure and promote the websites you build during course. Emphasis is on the application of these methods to support investment decisions and the continuous improvement of digital properties in practice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 740 Analytics w/ Machine Learning (3 credits)

Machine learning is a branch of computer science and related artificial intelligence methodologies that can "learn" how to perform useful tasks from prior data. This course teaches students different machine learning techniques such as statistical pattern recognition, supervised and unsupervised learning, regularization, clustering, decision trees, neural networks, genetic algorithms, and Naïve Bayes and illustrates how to implement learning algorithms using machine learning software packages. Students will learn to apply these techniques to analyze data collected from systems and processes of interest, with the purpose of uncovering dependencies, and identifying patterns and behaviors of interest.

Prerequisites: DSS 610 and DSS 615

Attributes: Graduate

DSS 750 Fundamentals of Cyber Security (3 credits)

This course introduces students to the interdisciplinary field of cybersecurity by discussing the evolution of information security into cybersecurity, cybersecurity theory, and the relationship of cybersecurity to nations, businesses, society, and people. Students will be exposed to multiple cybersecurity technologies, processes, and procedures, learn how to analyze the threats, vulnerabilities and risks present in these environments, and develop appropriate strategies to mitigate potential cybersecurity problems.

Prerequisites: DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 760 CPS Framework (3 credits)

This course introduces students to the CPS Framework, which was developed by the National Institute of Standards and Technology (NIST) in an effort to facilitate a shared understanding of cyber-physical systems, their foundational concepts and their unique dimensions. Cyber-physical systems are smart systems that include interacting networks of physical and computational components. They are widely recognized as having great potential to enable innovative applications and impact multiple economic sectors in the worldwide economy. Through the use of a shared vocabulary, the CPS Framework facilitates a thorough analysis of complex systems and processes, the uncovering of dependencies, weaknesses, risks, and the identification of corrective actions, both within the cyber domain and outside of it.

Prerequisites: DSS 610

Attributes: Graduate

DSS 770 Special Topics (3 credits)

Content of this course varies to allow for ongoing changes to business intelligence and related fields. The instructor will provide the course description for a given semester.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

DSS 790 Adv Topics: Cyber Analytics (3 credits)

Content of this course varies to allow for ongoing changes to cyber analytics and related fields. The instructor will provide the course description for a given semester.

Prerequisites: DSS 610

Attributes: Graduate

Diagnostic Medical Sonography (DMS)

DMS 111 Intro to Sonography (1 credit)

This course will introduce the student to the basic concepts of ultrasound physics, knobology and function of the ultrasound machine. Cross-sectional anatomy will be introduced.

Prerequisites: CAS 113L (may be taken concurrently) or DMS 112 (may be taken concurrently) or VAS 112 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography, Diagnostic Medical Sonography or Vascular Sonography.

DMS 112 Abdominal Sonography I (3 credits)

This course includes a review of normal anatomy and function of abdominal structures and an introduction to their ultrasound appearances.

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 113L Ultrasound Lab I (1 credit)

This course will introduce the skills needed to perform sonograms of normal abdominal structures.

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 221 Ultrasound Physics (3 credits)

This course will provide the student with a practical understanding of the principles of ultrasound physics as they apply to diagnostic medical imaging.

Restrictions: Enrollment is limited to students with a major in Cardiac Sonography, Diagnostic Medical Sonography or Vascular Sonography.

DMS 222 Abdominal Sonography II (2-3 credits)

This course will prepare the student to recognize and describe abdominal pathology on a sonogram.

Prerequisites: DMS 112

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

DMS 223 Ob/Gyn Sonography I (3 credits)

This course will prepare the student to perform sonograms of the normal pregnant and nonpregnant female pelvis. Didactic instruction includes a review of pelvic anatomy and an introduction to obstetrical imaging.

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 224C Ultrasound Clinical I (3-4 credits)

This course will introduce the clinical setting experience to enhance the student's scanning skills. The students will apply knowledge learned throughout the DMS Program to demonstrate clinical competency in specified sonographic procedures

Prerequisites: (DMS 235L or DMS 225L)

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

DMS 225L Ultrasound Lab II (1 credit)

This course will prepare the student to perform sonograms of the pregnant and nonpregnant female pelvis in a simulated clinical environment.

Prerequisites: DMS 113L

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 226 Ob/Gyn Sonography II (3 credits)

This course will provide the student with an understanding of the abnormalities that may occur in the pregnant and non-pregnant female pelvis. Emphasis is given to etiology and significance of the abnormality as well as its sonographic appearance.

Prerequisites: DMS 223

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 227 Common Vascular Procedures (1 credit)

This course will prepare the student to perform sonograms of extracranial arteries and veins of the extremities. Emphasis will include applying Doppler principles to imaging.

Prerequisites: DMS 111

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography or Vascular Sonography.

DMS 229L Ultrasound Lab III (1 credit)

This course will prepare the student to perform sonograms of the thyroid gland, extracranial arteries and peripheral extremity veins in a simulated clinical setting.

Prerequisites: DMS 225L or DMS 235L

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 230 Superficial Structures (2 credits)

This course will prepare the student to perform sonograms on the following superficial structures: thyroid gland, breast, testicles, prostate and neonatal head.

Prerequisites: DMS 222

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 231 Ultrasound Seminar (2 credits)

Students will prepare for entrance into Diagnostic Medical Sonography by exploring topics related to career development and continuing education. Guest lecturers from the field will provide insights into professional practice. Content review and mock registry testing will prepare students for the credentialing exams.

Prerequisites: DMS 222

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

DMS 233C Ultrasound Clinical II (3-6 credits)

This course will further prepare the student in a clinical setting to enhance the student's scanning skills. The students will apply knowledge learned throughout the Diagnostic Medical Sonography Program to demonstrate clinical competency in specified sonographic procedures

Prerequisites: (DMS 224C or DMS 224)

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

DMS 234C Ultrasound Clinical III (4-8 credits)

This course will provide continued clinical setting experience to perfect the student's scanning skills. The students will apply knowledge learned throughout the Diagnostic Medical Sonography Program to demonstrate clinical competency in specified sonographic procedures

Prerequisites: (DMS 233C or DMS 233)

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

DMS 235L Ultrasound Lab II (2 credits)

This course will prepare the student to perform sonograms of the thyroid, testicles, pregnant and nonpregnant female pelvis, extracranial arteries, peripheral extremity veins and further their scanning skills in a simulated clinical environment.

Prerequisites: DMS 221

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

Economics (ECN)

ECN 101 Introductory Economics Micro (3 credits)

By analyzing the behavior of buyers and sellers in product and factor markets, this course explains how a market economy determines how scarce resources are allocated to the production and distribution of various goods and services. Supply-and-demand models are used to explain the determination of the prices of products and of factor inputs, and the consequences of government controls and of different types of market structures on prices, wages, and economic efficiency are analyzed.

Attributes: CCC: Social Science, GEP: Social Science, International Relations Course, Undergraduate

ECN 102 Introductory Economics Macro (3 credits)

Theoretical models of the economy as a whole, show what determines the level of national output, employment, and prices, and how these might be stabilized by the proper fiscal and monetary policies. The course also looks at the mechanism by which our money supply changes, and considers the benefits and problems associated with international trade. Topics covered include the measurement of GDP, inflation and unemployment; Keynesian and Classical theories of output and price determination; the Federal Reserve System; the federal budget and the national debt; and the balance of payments.

Attributes: CCC: Social Science, GEP: Social Science, International Relations Course, Undergraduate

ECN 170 Special Topics in Economics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ECN 260 American Healthcare System (3 credits)

This course is an introduction to the structure, operation and financing of the American health care system. It examines the major industry participants, how health care services are allocated and financed, the factors that influence the cost and quality of care, how American health care compares to health care in other countries and opposing positions on the future of health care reform.

ECN 270 Special Topics in Economics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ECN 290 Professional Prep Seminar (1 credit)

What can you do with a degree in Economics? Do you know how to search for an internship or a job? And, are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance students' knowledge about internships and careers within their major and help them build practical skills through a series of steps and events throughout the semester. All students are required to complete this seminar prior to registering for the ECN491 Internship course or students can take this as a co-requisite with ECN491. All economics majors and minors are encouraged to take this course during sophomore or junior year to help prepare for internship applications.

Attributes: Undergraduate

ECN 301 Microeconomic Theory (3 credits)

This course presents an analysis of the behavior of households as buyers of output and suppliers of inputs, an analysis of firms as suppliers of output and buyers of inputs, and a study of their interaction in markets that determines the prices and quantities of outputs and inputs. Applications of analytical tools are demonstrated.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 302 Macroeconomic Theory (3 credits)

This course examines a complete model of the economy to show the forces that determine the rate of unemployment, the rate of inflation, the rate of economic growth, and the international financial position of an economy. This model is used to show the logic of, and the limitations of, monetary, fiscal, and other stabilization policies.

Prerequisites: ECN 102

Attributes: Undergraduate

ECN 320 The Economics of Health Care (3 credits)

This course is an introduction to the applications of the economic principles to the field of health care. Students explore the demand for services in health care and wellness, the economic factors that influence the behavior of the healthcare providers, and the role of third-party payers and government in the healthcare delivery system. Students also examine how public policies influence the economy of health care.

Prerequisites: ECN 101

ECN 321 International Trade (3 credits)

This course investigates a primary component in the study of international economics: the causes and effects of international trade and barriers to trade. The class begins with an overview of world trade patterns and then focuses on classical and modern trade theory, exploring the Ricardian and Heckscher-Ohlin models, as well as non-comparative advantage based models that incorporate economies of scale and monopolistic competition. The second part of the class focuses on trade policy, starting with a theoretical analysis of tariffs, and then investigating the debate over free trade as it pertains to both developing and advanced economies. The class also looks at the economic institutions involved in the management of global trade, such as the World Trade Organization.

Prerequisites: ECN 101 or ECN 102

Attributes: GEP: Globalization Course, International Relations Course, Latin American Studies Course, Undergraduate

ECN 322 International Macroeconomics (3 credits)

This course investigates international macroeconomic theory and its application to current events and policy issues, including the study of the principles and practices of the balance of payments, exchange rates, and international money markets for achieving both domestic and international policy objectives. Coverage includes the description and history of financial crises, currency policy, the development of international financial markets and the relevant national and international institutions. ECN 101 is recommended.

Prerequisites: ECN 102

Attributes: GEP: Globalization Course, International Relations Course, Undergraduate

ECN 323 Economic Development (3 credits)

The field of Economic Development involves both aspects of macroeconomic and microeconomic theory and analysis. This course presents an overview of the variety of economic growth theories and their empirical evaluation in both developed and developing economies. These theories are compared against practical institutional explanations as to why some economies experience slow growth and underdevelopment, while others see higher growth rates. We explore the relationship between economic growth, poverty, inequality, sustainability and human development

Prerequisites: ECN 101 or ECN 102

Attributes: GEP: Globalization Course, International Relations Course, Undergraduate

ECN 330 Economics of Labor (3 credits)

This course provides students with an introduction into labor markets. We will discuss models for behavior, incorporating labor supply and labor demand. Topics within labor economics, such as investments in human capital, discrimination, job search, and labor unions will also be covered. Throughout the course we will investigate multiple questions such as: How do individuals decide how many hours to work? How is a person's salary determined? What are the benefits associated with attaining a college degree? Is there convincing evidence of labor market discrimination? Throughout this course, there will be opportunities for reading about, writing about, and discussing current policies, problems, and events that are relevant to the study of labor economics. Note: Can count towards the B.S. in Quantitative Economics with the completion of additional coursework and permission of the instructor.

Prerequisites: ECN 101 and ENG 101

Attributes: CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

ECN 340 Public Finance & Public Policy (3 credits)

This course examines the nature of government spending, the decision-making process, and trends. It describes and evaluates several kinds of taxation and proposals for reform. It utilizes microeconomics to investigate tax incidence and the welfare effects of taxation.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 350 Monetary Economics (3 credits)

The course analyzes the nature and functions of money to show its influence on GDP, the price level, unemployment, and the allocation of resources. Commercial banking and other financial institutions will be studied, as well as central banking.

Prerequisites: ECN 102

Attributes: Undergraduate

ECN 360 Industrial Organization (3 credits)

Applications of microeconomic theories to public policies affecting structure and performance of markets and behavior of firms. Antitrust and other aspects of government regulation will be covered.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 365 Game Theory (3 credits)

The goal of the course is to introduce students to the field of Game Theory within the Microeconomics discipline. Standard concepts to be learned and discussed are the roles of strategy, decision-making, solution concepts for games, the nature of Nash equilibria, strategic behavior, cooperation, the role of incentives, probabilities and the nature of Bayesian equilibria, auctions in theory and practice, matching theories, conflict and theories of appropriation versus production. The course will put a greater emphasis on the role of economic reasoning and the major results discovered within the field as opposed to understanding the complex mathematical proofs. In addition, students will learn to approach the study of economics from an analytic perspective as opposed to the standard quantitative approaches of undergraduate economic studies.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 372 Special Topics in Economics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ECN 375 Environmental Economics (3 credits)

Environmental Economics examines the interactions between people and the environment by addressing the challenge of meeting the increasing demand for goods and services while simultaneously conserving natural resources for future generations. This course utilizes economic theory and geographic information systems (GIS) software to examine global environmental issues including externalities, public goods, criteria for evaluating environmental policies, the role of economic analysis in environmental policy decisions, discussion of pollution control planning, environmental conservation policy in The United States, and international environmental conservation concerns.

Prerequisites: ECN 101 or GIS 101

Attributes: CCC: Mission: Global Citizenship, GEP: Globalization Course, International Relations Course, Undergraduate

ECN 382 Urban Economics (3 credits)

Urban Economics is broadly defined as the economic study of urban areas. This course will teach you how to examine issues that typically occur in urban areas, such as crime, poverty, inequality, and the distribution of public goods and government resources, from an economic perspective. Since this course is a diversity course, you will be required to participate in discussions that will often test your assumptions about cultural and socioeconomic differences. This course will especially focus on diversity in urban areas by examining oppressive policies and historical factors that lead to systemic poverty, investigating inequality, and resistance of different cultural groups to certain policies and enforcement practices. Throughout this course, we will not only examine urban issues theoretically, but also use real-world data and geographic information systems software (GIS) to apply economic theory to examine these issues in real-time.

Prerequisites: ECN 101 or GIS 101

Attributes: CCC: Diversity, GEP: Diversity Course, Undergraduate

ECN 385 Law and Economics (3 credits)

This course provides a basic understanding of the economic analysis in specific areas of common law in the United States. Covering a broad range of topics from the implications of property law and contract law for economically efficient behavior, to the effects of tort law and criminal law on the incentives for individuals to conduct themselves in a socially desirable manner. This course uses microeconomic tools to examine torts, contracts, and property law as well as the theory and empirical evidence on the economics of crime and punishment.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 390 The Economics of Healthcare (3 credits)

This course examines major policy issues associated with the delivery of health care in the United States from an economic perspective. Particular emphasis will be placed on the challenges and trade-offs involved in containing health care costs, maintaining quality, and ensuring access. This course will provide students with a better understanding of the major health policy issues.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 410 Econometrics (3 credits)

Basic principles of econometrics beginning with the classical linear regression model and the method of least squares. Special problems arising from the violation of classical assumptions, and statistical procedures for dealing with them, are covered. Identification and estimation problems are also studied, as well as forecasting with single-equation regression and simultaneous system of equations. Modern time-series models are evaluated, with numerous forecasting illustrations from economics and business.

Prerequisites: (ECN 101 or ECN 102) and (MAT 118 or MAT 128 or MAT 148 or MAT 322 or DSS 210)

Attributes: Undergraduate

ECN 420 Sports Economics (3 credits)

This course is an extension of microeconomics and encompasses three areas of economic theory - labor economics, urban economics and industrial organization. Sports, particularly professional sports, command an inordinate amount of attention and interest. By studying the economic decisions of leagues, teams and municipalities, students will see how the tools of economic theory are applied and how they impact not only the revenues and profits of the professional sports teams but the play on the field as well as the general welfare and attitude of the community.

Prerequisites: ECN 101

Attributes: Undergraduate

ECN 452 Econ of Presidential Elections (3 credits)

This course is offered every fall of a presidential election year. In 1992, James Carville, then candidate Bill Clinton's campaign manager, coined the phrase "the economy, stupid." The implication was that the economy was the number one issue for voters. A New York Times/Siena poll found that among voters 18-29 in swing states, 62% said economic issues would be more important in determining their vote in 2024. And these young adults think that the economy is doing terribly. Less than half of one percent said the state of the economy is "excellent;" just 7% said "good" or "very good;" and the remaining 93% said "only fair" or "poor." Inflation had decreased dramatically, unemployment was a record lows and GDP growth was strong. In this course, we will discuss the major economic policy issues of the 2024 presidential election, including health care, immigration, climate change, federal budget and taxation, trade and tariffs, minimum wage, and SNAP. The two major parties' policy platforms will be our primary texts. They will be supplemented by readings from the economics literature, campaign policy briefs and articles from the media. We will also study some topics in the economics of voting, including ranked choice voting and whether it is rational to vote at all.

Prerequisites: ECN 101 or ECN 102

Attributes: American Studies Course, Undergraduate

ECN 455 Antitrust and Regulation (3 credits)

In the first part of the course, we will discuss the economic theory that should guide antitrust laws of the United States and discuss the actual current and historical antitrust laws and key antitrust cases in the context of underlying economic theory. In the second part of the course, we discuss the costs, benefits, methods, and outcomes of economic regulation from a theoretical standpoint, and then examine the actual U.S. experience in a large number of industry case studies. We will spend significant time on recent and ongoing antitrust and regulatory cases.

Prerequisites: ECN 101

Attributes: American Studies Course, Justice Ethics and the Law , Undergraduate

ECN 471 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

ECN 475 Asian Economies (3 credits)

This course will encompass a theoretical and empirical approach to the study of the economies of Asia. First, the nature of the various economies will be assessed by the observation of some indicators of economic and social development. Then, theories will be explored that attempt to explain the differences in the economies and their growth patterns. This theoretical section will entail the study of international and indigenous characteristics of Asian countries. The aim of the course is to convey to students the changes in the world distribution of economic power and in the international division of labor as it involves the Asian countries, and the implications of these trends.

Prerequisites: ECN 101 or ECN 102

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, International Relations Course, GEP: Non-Western Studies, Undergraduate

ECN 476 Women & Econ Dev in South Asia (3 credits)

The course explores the relationship between the role of women and economic development in South Asia, which is mostly defined as a region including India, Pakistan, Nepal, Bangladesh, and Sri Lanka. Broadly, we will examine women's changing economic roles including analysis of labor force participation, wage inequality, gender differences in education, intra-household distribution of resources, and the economics of fertility. We will review the basic economic concepts of demand and supply and the historical perspectives on women's relative status, the source of gender differences, and women's role in economic development. We will eventually examine the labor market outcomes and consequences of working women and how these decisions influence the overall economic development of the South Asian region.

Prerequisites: ECN 101 or ECN 102

Attributes: Asian Studies Course, Gender Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

ECN 477 Chinese Economics (3 credits)

As the world becomes more integrated, countries become more interdependent. Economic events and policy changes in one country affect many other countries. The emergence of China, especially in international markets, is clearly one of the most important forces currently reshaping the world economy. Understanding China's history, culture, economics, politics and society is imperative to help students participate in the ongoing dialogue among policymakers, economists, business firms, and international agencies. This course will cover both the historical and current aspects of the Chinese economy with a focus on the historical development of its socio-economic institutions, on its varying economic policies and strategies. In addition, this course would provide the student with opportunities to explore and apply economic theories and models to understanding the diverse processes of economic development in China.

Prerequisites: ECN 101 or ECN 102

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Writing Intensive, International Relations Course, GEP: Non-Western Studies, Undergraduate, GEP: Writing Intensive

ECN 480 Econ of Poverty & Income Dist (3 credits)

In this course, we study several facets of income distribution and inequality in the United States through the lens of economic theory. Initially, we discuss the basics of income and wealth distribution (definitions and measurements), and study the trends and patterns of income, wealth and well-being, followed by a similar discussion with respect to poverty. The second portion of the course focuses on causes and explanations of poverty and income inequality. This section relies heavily on the foundation of labor economic theory with discussion of labor force participation, unemployment and human capital. Finally, we focus on policies that may cause or alleviate poverty and income inequality - both current and proposed policy - followed with a discussion of societal goals. If time permits, we also cover labor market discrimination and wage gaps, specifically with respect to race/ethnicity. This course is an upper-division Economics elective that also meets the Faith-Justice course studies criteria.

Prerequisites: ECN 101 and ENG 101

Attributes: American Studies Course, CCC: Mission: Ethics Social Justice, Service Learning Course, Undergraduate, GEP: Writing Intensive

ECN 483 Ripped from the Headlines (3 credits)

Economics is everywhere—and every day. In this course, we will study economic current events and the underlying economic principles behind them. Examples include unemployment and inflation, healthcare, forgiving student loan debt, congestion pricing, tariffs, deficit and debt, concert ticket prices. News sources are our textbook. We will analyze economics developments/issues/events that are in the news, domestic and international, microeconomics and macroeconomics.

Attributes: CCC: Social Science, Undergraduate

ECN 484 Race and the Economy (3 credits)

This course will examine the causes and consequences of racial disparities in economic outcomes. We begin with a history of slavery and its economic consequences. Then we will look at official government policies, such as red-lining, that have contributed to racial disparities. We will examine the data on racial disparities in poverty, unemployment, income, and wealth. The rest of the course will focus on an economic analysis of racial differences in various aspects of the economy, including education, health care, and housing. We will also study current government policy and proposals to mitigate the disparities.

Prerequisites: ENG 101 and ECN 101

Attributes: American Studies Course, CCC: Diversity, Faith Justice Course, Undergraduate, GEP: Writing Intensive

ECN 485 Food and the U.S. Economy (3 credits)

This course will begin with a conventional industrial organization analysis of the food industry (even though about half of all farms are small, family owned, they account for only 20% of food production in the U.S.). We will then move to a study of government industrial policies, including federal subsidies (about \$22 billion in 2019) and regulation, including USDA and FDA. Throughout the course, we will connect the economics of food to social justice, including food insecurity (about 10% of households in the U.S. experience food insecurity), climate (food production accounts for about 30 percent of total global emissions), immigration (72% of farm workers are foreign born; 68% are from Mexico), and labor (average individual annual income for farm workers is \$12,500-\$14,999; pre-vaccine, farmworkers were at highest risk to contract Covid). This is a service-learning course. Students will spend 3 hours a week doing service, which will be connected to course assignments and discussions. Students will be expected to follow the news about food and agriculture throughout the semester. Assignments include weekly response papers, current events papers, and weekly service journal entries.

Prerequisites: ECN 101

Attributes: American Studies Course, Faith Justice Course, Service Learning Course, Undergraduate

ECN 487 Research Methods (3 credits)

This course is an upper-level economics elective that provides students with an introduction into research methods. We will discuss current research in applied microeconomics and apply the methods learned to create original research. Throughout the course we will investigate multiple facets of research including literature review, data analysis, and analytic writing. Throughout the course, students will be given verbal and written feedback about their analysis and writing. Throughout this course, there will be opportunities for reading about, writing about, and discussing current policies, problems, and events that are relevant to writing a comprehensive research paper. In order to gain the most from these discussions, students are required to take on an active role in these discussions.

Prerequisites: ECN 101 and ECN 410 and ENG 101

Attributes: Undergraduate, GEP: Writing Intensive

ECN 490 Seminar in Economics (3 credits)

The process of developing and executing a research project according to the standards of modern economic science is the subject of this seminar. Attention is also given to the use of the computer as a research tool.

Attributes: Undergraduate

ECN 491 Economics Internship (3 credits)

You are required to have an internship before enrolling in this course. This course combines work experience with academic study. Students work in internships for the duration of the semester (some 10 hours per week) with approved employers in the private and public sectors (or non-governmental and non-profit organizations) in the Philadelphia area. Their work experience is complemented with relevant required readings. In addition, students must keep a journal, write a final report and meet regularly with their adviser. A successful academic internship is a three-way partnership between the student, the employer, and the faculty adviser. Note: May count towards the B.S. in Quantitative Economics for students in a quantitative internship with instructor approval.

Prerequisites: ECN 290 (may be taken concurrently)

Attributes: Undergraduate

ECN 493 Independent Research (3 credits)

Students will study a topic in economics with a faculty mentor. Permission of the Instructor required.

Attributes: Undergraduate

ECN 494 Independent Research (3 credits)

Taken in senior year under the direction of a thesis mentor.

Attributes: Undergraduate

Education (EDU)

EDU 121 Child Development (3 credits)

This course examines the physical, cognitive, emotional, and social development of the child from birth through the childhood years (0-12), including the study of how children learn and acquire knowledge. Special attention will be given to leading theories of development and their implications in the early childhood and elementary classrooms as well as critiques of these theories.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Child Family Studies, Educational Studies or Elementary Educ Pre K -4th Gr.

Attributes: Undergraduate

EDU 140 Publ Schls & Soc Eq in Urb Env (3 credits)

This course explores the controversies that the current education reform has created in urban school districts such as the School District of Philadelphia. Particular attention is given to the debate over school funding and the role that charter schools play in this debate. To understand the complexity of this issue, the course will introduce students to some of the main changes experienced by the School District of Philadelphia in recent times and will address how charter schools came to be regarded as "the" solution for public education in this City. Because this course also aims at providing students with an introduction to the process of research and to familiarize them with the conventions of different ways of writing, students will be required to conduct library-based research and to present their conclusions in different academic formats.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

EDU 150 Schools in Society w/ Field (3 credits)

This course critically examines the system of American education and its function in American society in both historical and contemporary contexts. Drawing on multiple perspectives, including historical, sociological, economic and multicultural, this course provides conceptual frameworks by which to address fundamental questions regarding education for what purpose and in whose interest. It is in addressing these questions that we come to examine our own positions and the ways in which they influence our role as educators.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Child Family Studies, Educational Studies, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr, English - Secondary Education, French - Secondary Education, History - Secondary Education, Mathematics - Secondary Educat, Physics Secondary Education, Spanish - Secondary Education or Undecided Education.

Attributes: CCC: Diversity, GEP: Diversity Course, Undergraduate

EDU 151 Cognition & Learning w/ Field (3 credits)

This course provides students with the opportunity to apply theories of human development to teaching practices. Special attention is directed towards intrinsic and extrinsic motivation, social dynamics in the classroom, tests and measurements, and various instruction models. Enrollment in Field Experience is required with this course.

Prerequisites: ENG 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Child Family Studies, Educational Studies, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr or Undecided Education.

Attributes: CCC: Social Science, CCC: Writing Intensive, GEP: Social Science, Undergraduate, GEP: Writing Intensive

EDU 155 Found of Early Child w/ Field (3 credits)

This course provides students with a general overview of Early Childhood Education. This overview includes an introduction to the field of early childhood education, an examination of its core competencies, and analysis of developmentally appropriate practices for young children. Students will spend time observing in early childhood programs and will become familiar with key organizations, as well as relevant laws and regulations.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Child Family Studies, Educational Studies or Elementary Educ Pre K -4th Gr.

Attributes: Undergraduate

EDU 157 Adolescent Development w/Field (3 credits)

This course focuses upon processes and theories of cognition, development, and learning during adolescence and on resultant changes due to biological development, social context, culture, and social class. Specific issues to be explored include physical, cognitive, emotional, and social development; the influence of culture and social factors on adolescent behavior and development, namely peers, families, and educational institutions; onset of critical thinking and self-reflection; emerging social and moral awareness; intimacy and sexual activity; and self-concept, autonomy, and identity formation. . A special focus examines the influences of cultural pluralism, and diverse learning styles on developing sound teaching strategies for all students. A substantial portion of the course will be devoted to the implications of the above-mentioned processes and principles for effective instruction in a middle school and high school context. Students will be exposed to particular theoretical approaches and philosophies of education that are relevant to classroom management, instructional design, and student engagement. In addition, problems common during adolescence and obstacles to learning for adolescents will be addressed—their possible causes and symptoms, as well as strategies (both instructor- and team-based) for intervention. Several of the assignments included ask them to apply the course material to specific case studies where they need to analyze individual behavior and consider the best course of action for student success.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Educational Studies, Elementary/Middle Grades (4-8), English - Secondary Education, French - Secondary Education, History - Secondary Education, Mathematics - Secondary Educat, Physics Secondary Education, Spanish - Secondary Education or Undecided Education.

Attributes: CCC: Social Science, Field Experience, Undergraduate

EDU 160 Schools in Society w/ Field (3 credits)

See description for EDU 150. Appropriate for students who did not take EDU 150 in their first year.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Child Family Studies, Educational Studies, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr, English - Secondary Education, French - Secondary Education, History - Secondary Education, Italian - Secondary Education, Latin - Secondary Education, Mathematics - Secondary Educat, Spanish - Secondary Education or Undecided Education.

Attributes: GEP: Diversity Course, Undergraduate

EDU 170 Special Topics in Education (1-3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EDU 230 Eval: Secondary Grades 7-12 (3 credits)

This course focuses on integrating instruction and assessment into the curriculum at the secondary level. The course is based on the premise that teaching is an ethical undertaking and assessment and instruction are grounded in ethical issues. Teacher candidates will learn basic concepts of instructional design and assessment in the curriculum; examine instruments that reflect constructs of interest (cognitive, affective, and behavioral objectives); develop skill in aligning assessment and instruction to state standards; construct various types of assessments; and analyze and refine teacher-made instruments. Teacher candidates will use multiple methods of assessment to engage learners in their growth, monitor learner progress, and guide the teacher and learner's decision making. They will learn how to analyze and interpret assessment data and how to communicate and use test results in educational decision-making. Throughout the course, teacher candidates will engage with critical issues in the field, including historical and theoretical perspectives on assessment; explore differentiation in instruction and assessment in the curriculum; and reflect upon the ethical implications of assessment practices and policies.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Child Family Studies, French - Secondary Education, History - Secondary Education, Italian - Secondary Education, Latin - Secondary Education, Mathematics - Secondary Educat or Spanish - Secondary Education.

Attributes: Undergraduate

EDU 231 Assessment and Evaluation (3 credits)

This course is designed so that pre-service teachers will understand and use multiple methods of assessment to engage learners in their own growth, to monitor learner progress, and to guide the teacher's and learner's decision making (from INTASC). It assumes that teaching is necessarily an ethical undertaking and that assessment, as an essential element in teaching, is not merely technical but enlaced with ethical issues at its core. Teacher candidates will learn basic assessment and evaluation concepts; examine instruments that reflect constructs of interest (cognitive, affective, and behavioral objectives); develop skill in aligning assessment and instruction to state standards; construct various types of assessments; and analyze and refine teacher-made instruments. Teacher candidates will also learn how to interpret test results and how to communicate and use them in educational decision-making. Throughout the course, they will learn the importance of critical issues in the field, including historical and theoretical perspectives on assessment issues; explore differentiation issues in assessment; and analyze and reflect upon the moral implications of assessment practices and policies.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Child Family Studies, Educational Studies or Elementary Educ Pre K -4th Gr.

Attributes: Undergraduate

EDU 232 Literacy/Literature I w/ Field (3 credits)

This course prepares teacher candidates to develop engaged, strategic, and independent readers and writers. Candidates will develop understandings about: 1. Literacy-rich, engaging, and culturally affirming environments for nurturing students' literacy learning, 2. How emergent/beginning readers and writers develop oral language, concepts of print, phonemic awareness, alphabetic and orthographic knowledge, vocabulary and conceptual knowledge, concept of word in text, concepts of stories and story language, and writing, 3. Appropriate assessments for identifying students' literacy abilities and targeting instruction, 4. Instructional strategies for advancing students' literacy abilities, and 5. The use of children's literature in the early primary grades (big books, pattern books, leveled decodable and natural language readers, informational texts, poetry, fiction, personal narrative and persuasive texts). The course emphasizes meaning-based approaches consistent with constructivism and transactional models of literacy, in addition to systematic, targeted phonics instruction. Course objectives align with the Common Core and PA State Standards for English Language Arts for grades PK-1. *This course builds candidate's competencies outlined in Charlotte Danielson's Framework for Teaching (see Appendix A). Candidates are asked to reflect on key assignments in relation to Danielson's Framework to include in their Professional Educator ePortfolio.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 241 Soc/Emo Dev/Lrn: Erly Chld (3 credits)

This course focuses on the domain of social and emotional development in early childhood, and it explores the complex ways in which this domain of development changes over time from birth to allow the growing child to react and interact with others around them. An interactional model will serve as the primary theoretical framework that underlies all discussions and assignments in order to allow students to understand the concept that each major area of development in early childhood are interdependent on one another and directly contribute to the adaptability and resilience of the whole child. Students will become familiar with current theories on how the young child develops socially and emotionally from birth and how mastery of development in these areas provides the foundation for cognitive, linguistic, and motoric growth in the early years. Special topics include early childhood mental health, parent-child attachment, floor time and early exploration (play), family systems dynamics, resiliency, adversity/risk, policy reform, and promotion/prevention/intervention.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Child Family Studies.

Attributes: Undergraduate

EDU 242 Tech Enhanc Curr & Inst w/Field (3 credits)

This is an introductory course designed to develop candidates' technological pedagogical content knowledge (TPACK) and offer an overview of the role of technology, especially web-based tools, in instruction and learning. The course will focus on the application of computers and technology in the learning process and connecting these applications with relevant ISTE (International Society for Technology in Education) and PDE standards. The impact of new technology on individuals, society, and educational agencies also will be investigated.

Restrictions: Enrollment is limited to students with a major in Elementary/Middle Grades (4-8) or Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 246 Language and Culture w/ Field (3 credits)

This course introduces candidates to key theories, critical issues, and research-based practices related to promoting the language and literacy development of culturally and linguistically diverse students (PK-12), with a special focus on English language learners (ELLs). Candidates will learn how to use the Standards for English Language Development and PA academic standards to plan instruction in a culturally and linguistically diverse setting. Assigned readings, class discussions, video recordings, library and online research, and a field experience in a culturally and linguistically diverse classroom and school will engage candidates in the course topic.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Child Family Studies, Educational Studies, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr, English - Secondary Education, French - Secondary Education, History - Secondary Education, Mathematics - Secondary Education, Physics Secondary Education, Spanish - Secondary Education or Undecided Education.

Attributes: CCC: Diversity, GEP: Diversity Course, Field Experience, Faith Justice Course, Undergraduate

EDU 247 Literacy in Cont Areas w/Field (3 credits)

The focus of this course is the teaching of content area reading and literacy across the curriculum for secondary schools. Topics to be examined include: theory, policy, practice and research in reading in the content area, reading across content areas, disciplinary reading, levels of reading and comprehension, place of reading in school programs, selecting diverse and appropriate curricular materials for enhancing reading that is culturally and linguistically responsive, differentiated reading instruction for diverse learners, general and specific strategies and study skills for content area reading comprehension, vocabulary, fluency, and spelling, critical reading of texts including critical media literacy, adjustment of reading instruction to meet individual learning levels and styles in inclusive classrooms, diagnostic, screening, formative, summative and benchmark reading assessment, and interventions for improving reading comprehension in the content areas for challenged and culturally and linguistically diverse readers. This course includes field experience in 7-12 classrooms.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Biology - Secondary Education, Chemistry -Secondary Education, Child Family Studies, Elementary/Middle Grades (4-8), English - Secondary Education, French - Secondary Education, History - Secondary Education, Italian - Secondary Education, Latin - Secondary Education, Mathematics - Secondary Education or Spanish - Secondary Education.

Attributes: Field Experience, Undergraduate

EDU 265 Teaching Math in PK2 w/ Field (3 credits)

The goal of this course is to prepare teachers or teaching candidates who have the knowledge, skills, and orientation to help young children develop their mathematical foundation. The concept of Pedagogical Content Knowledge for Mathematics provides the theoretical framework for the course's structure and orientation. This means that students who successfully complete the course will have a thorough knowledge of the mathematics central to pre-K – grade 2; an understanding of how children at these stages learn mathematics; and the ability to coordinate content and “best” practices for mathematics instruction, including the integration of technology. The specific mathematical content and instructional practices reflect the National Council of Teachers of Mathematics, the PA Department of Education standards, and the Common Core State Standards for Mathematics (CCSS-M). Throughout the course, candidates will plan, implement, and reflect on lessons; use standards and assessments (formative and summative) in evaluating student progress and teacher effectiveness; apply standards-based assessment data to selection of appropriate instructional materials, technology, and/or recommendation for intervention; and apply standards based, data-driven, decision-making procedures to lesson planning or re-teaching.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 270 Special Topics in Education (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EDU 340 Literacy/Literature II w/Field (3 credits)

This course develops teacher candidates' ability to develop engaged, strategic, and independent readers and writers. Candidates will use literature appropriate for children in the transitional and intermediate stages of literacy development (approximately late first grade to grade 4). Students will use their understanding of the interactive/constructivist models of reading/writing processes to develop instructional strategies using the various forms of texts (fables, folktales, myths, poetry, biography, science informational texts, realistic and historical fiction). Special attention will be directed to the use of literature to foster reading fluency, comprehension, vocabulary, word recognition, and writing. In addition, candidates will investigate the use of literature to design culturally sustaining literacy instruction. Candidates will plan, revise, deliver, and assess ELA lessons in accordance with Common Core/PA State Standards for Reading/Language Arts and PA Structured Literacy Standards while participating in a 1st-4th grade literacy classroom field placement one day per week for the Stage 3: Pre-student teaching field experience.

Attributes: Field Experience, Undergraduate

EDU 345 Trauma in Infan & Early Child (3 credits)

The following course provides students with an in-depth study of trauma in infancy and early childhood, including analyses of historical origins, theoretical perspectives, influences on development and learning, and impacts on establishing sustained relationships throughout the lifespan. Throughout course readings and assignments, students will analyze specific levels and intensities of traumatic events and identify how these relate to the continuum of effects that early (chronic) trauma has on young children's internal working models of self-esteem, self-worth, self-competence, and overall self-identity. Various models of intervention and therapeutic approaches will be explored to provide students with pathways to: support children's development and learning, integrate educational and emotional wellness strategies to strengthen resilience, and help children cope with their exposure to trauma. The following course is especially appropriate for pre-professional students in the fields of educator preparation, child studies, psychology, or sociology.

Attributes: Undergraduate

EDU 362 Soc Stud Thru Arts PK4 w/Field (3 credits)

The purpose of this course is to connect theory and practice in the teaching of elementary school social studies through the visual and performing arts. Strategies for planning, implementing, and evaluating social studies instruction are designed with a focus on preparing children to be critical thinkers and young citizens in a global, technological and culturally diverse world.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 363 Science Methods PK-4 w/ Field (3 credits)

This course is designed to provide students with the opportunity to investigate content and pedagogy relevant to science instruction in PreK-4 classrooms. Emphasis is placed upon the philosophy, curriculum planning and organization, skill development, instructional methods, and classroom resources for the natural sciences.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 365 Math & Technology PK4 w/Field (3 credits)

Ultimately, the goal of this course is to prepare teachers or teaching candidates who have the knowledge, skills, and orientation to help young children develop their mathematical foundation. The concept of Pedagogical Content Knowledge for Mathematics provides the theoretical framework for the course structure and orientation. This means that students who successfully complete the course will have a thorough knowledge of the mathematics central to PK4; an understanding of how children at these stages learn mathematics; and the ability to coordinate content and "best" practices for mathematics instruction, including the integration of technology. As a course in elementary level math teaching methods, it is designed to engage candidates in thinking beyond the facts and tools of mathematics to the level of understanding ideas and concepts. Thinking conceptually about mathematics means thinking in terms of mathematical constructs that have the potential to produce understanding. In addition, the course will address the role that technology tools are playing in children's mathematics education. The specific mathematical content and instructional practices reflect the National Council of Teachers of Mathematics, the PA Department of Education standards, and the Common Core State Standards for Mathematics (CCSS-M). Throughout the course, candidates will plan, implement, and reflect on lessons; use standards and assessments (formative and summative) in evaluating student progress and teacher effectiveness; apply standards-based assessment data to selection of appropriate instructional materials, technology, and/or recommendation for intervention; and apply standards based, data-driven, decision making procedures to lesson planning or re-teaching.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr. Enrollment limited to students with the Education Basic Skills attribute.

Attributes: Field Experience, Undergraduate

EDU 366 Teaching Math Gr. 3-6 w/Field (3 credits)

Ultimately, the goal of this course is to prepare teachers or teaching candidates who have the knowledge, skills, and orientation to help children in the elementary grades develop their mathematical understanding. The concept of Pedagogical Content Knowledge for Mathematics provides the theoretical framework for the course's structure and orientation. This means that students who successfully complete the course will have a thorough knowledge of the mathematics central to grades 3-6; an understanding of how children at these stages learn mathematics; and the ability to coordinate content and "best" practices for mathematics instruction, including the integration of technology. The specific mathematical content and instructional practices reflect the National Council of Teachers of Mathematics, the PA Department of Education standards, and the Common Core State Standards for Mathematics (CCSS-M). Throughout the course, candidates will plan, implement, and reflect on lessons; use standards and assessments (formative and summative) in evaluating student progress and teacher effectiveness; apply standards-based assessment data to selection of appropriate instructional materials, technology, and/or recommendation for intervention; and apply standards based, data-driven, decision-making procedures to lesson planning or re-teaching.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Elementary Educ Pre K -4th Gr.

Attributes: Field Experience, Undergraduate

EDU 370 Special Topics in Education (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EDU 375 Seminar in Childhood Studies (3 credits)

This course is designed as a capstone course to provide students with the opportunity to explore and discuss current issues in child and family studies. Special attention will be paid to current trends in child/family research, family law and relevant court cases involving young children and families, and inclusive educational and therapeutic practices appropriate for young children and families. Further, students will engage in ongoing dialog about the implications current trends in the child and family studies field have with best professional practices in early care and education and related settings.

Attributes: Undergraduate

EDU 400 Literacy Theories and Models (3 credits)

This course is designed to provide teacher candidates with knowledge of the theories and models for understanding literacy acquisition and development. Emphasis will be placed upon various interactive models of the reading process, the psychology of literacy, and their implications for classroom instruction. The role of language, cognition, information processing, affective factors and measurement in reading will be examined to provide a broad understanding literacy acquisition and development.

Attributes: Undergraduate

EDU 401 Literacy Assessment/Instruct (3 credits)

This course provides teacher candidates an in-depth study of students' literacy instruction and assessment in grades K-3. A range of formal and informal assessments will be used to measure children's early language and literacy development, including phonemic awareness, concepts of print, word recognition strategies, and comprehension abilities. This information will be used to make informed decisions about literacy instruction.

Attributes: Undergraduate

EDU 410 Instr Techniq English w/Field (3 credits)

This course introduces teacher candidates to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to teaching ELA at the secondary level. The course has a special focus on pedagogical knowledge and skills for teaching ELA and promoting social justice in the ELA classroom. Candidates will learn how to align the PA ELA Content and Proficiency Standards and Assessment for instruction in a culturally and linguistically diverse setting. Students will draw upon a variety of tools to design, implement, reflect upon and evaluate ELA curriculum for secondary classrooms that is culturally and linguistically responsive to classroom diversity. Candidates will design and implement innovative techniques including new media literacies that address the academic needs of diverse learners. Assigned readings, class lectures and discussions, video and print resources, library and online research, written assignments and presentations, guest speakers, and field trips aim at developing candidates' knowledge, skills, and dispositions for teaching ELA. This course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Art Education, Elementary/Middle Grades (4-8), English - Secondary Education, World Languages PK12, French - Secondary Education, Italian - Secondary Education, Latin - Secondary Education or Spanish - Secondary Education.

Attributes: Field Experience, Undergraduate

EDU 412 Instr Techniq Soc St w/Field (3 credits)

This course introduces teacher candidates to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to promoting social studies literacy development of secondary students. The course has a special focus on pedagogical knowledge and skills for teaching social studies and promoting social justice in the social studies classroom. Candidates will learn how to align the PA Social Studies Proficiency Standards with the PA academic standards to plan instruction in a culturally and linguistically diverse setting. Students will draw upon a variety of tools to design, implement, reflect upon and evaluate social studies curriculum for secondary classrooms. Teacher candidates will engage in designing and implementing innovative techniques, new literacies, and effective teaching techniques that address the academic needs of culturally diverse learners. Assigned readings, class lectures and discussions, video and print resources, library and online research, written assignments and presentations, guest speakers, and field trips aim at developing teacher candidates' knowledge, skills, and dispositions for teaching social studies.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Elementary/Middle Grades (4-8) or History - Secondary Education.

Attributes: Field Experience, Undergraduate

EDU 414 Instr Tchnq Wrld Lang w/Field (3 credits)

This course introduces the teacher candidate to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to the substance and strategies of proficiency oriented second language instruction (K-12). The course has a special focus on pedagogical knowledge and skills for teaching foreign languages and promoting social justice in the FL classroom. Candidates will learn how to align the PA FL Content and Proficiency Standards and Assessment (ACTFL) in a culturally and linguistically diverse setting. Students will draw upon a variety of tools of design, implement, reflect upon, and evaluate FL curriculum for secondary classrooms. In order to develop each candidate's knowledge, skills, and dispositions for teaching FLs, candidates will design and implement innovative techniques including new media literacies that address the academic needs of diverse learners. Upon completion of this course, you should be able to: Identify current instructional practices, theories, and paradigms in a Foreign Language Classroom; Demonstrate current instructional practices and theories in a Foreign Language Classroom; Construct Lesson Plans to be implemented in a Foreign Language Classroom.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Elementary/Middle Grades (4-8), World Languages PK12, French - Secondary Education, Italian - Secondary Education, Latin - Secondary Education or Spanish - Secondary Education.

Attributes: Field Experience, Undergraduate

EDU 416 Instr Techniq Math w/Field (3 credits)

This course is intended to assist students in the development of their individual approaches to instructional styles and strategies. Students will be placed in a secondary classroom where they will study issues related to teaching pedagogy. Emphasis will be placed upon the current research and the development of techniques useful in the presentation of mathematical concepts at the secondary level. Included in this course is a thorough investigation of the National Council of Teachers of Mathematics' Standards and examination of Gender Bias in the mathematics classroom.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Elementary/Middle Grades (4-8) or Mathematics - Secondary Educat.

Attributes: Field Experience, Undergraduate

EDU 418 Instr Techniq Science w/Field (3 credits)

This course is intended to assist students in the development of their individual instructional styles and strategies. Well-conceived and effective curriculum and instruction are based upon both an understanding of the adolescent and the nature of science. Instructional techniques ranging from lecture and demonstrations to laboratory and computer simulations will be modeled and analyzed. Issues in classroom management and safety, among other topics, will be explored. Students will be placed in a secondary classroom where they will study issues related to teaching pedagogy. All of these courses in instructional methodology include discussion of and practice in instructional management, student motivation, the implications of learning theory for classrooms, the identification of instructional resources, and procedures for the measurement of student achievement. Students are expected to demonstrate proficiency in these skills for successful completion of the course.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Biology - Secondary Education, Chemistry -Secondary Education or Elementary/Middle Grades (4-8).

Attributes: Field Experience, Undergraduate

EDU 422 Instruct Tech. for Art Edu (3 credits)

This course is designed to introduce pre-service teachers of Art to instructional processes, teaching strategies, materials, lesson planning, assessment practices, and classroom management theory that will be of practical value in the classroom. Students will be placed in a K-12 art classroom where they will study issues related to teaching pedagogy.

Prerequisites: EDU 150 and SPE 160

Restrictions: Enrollment is limited to students with a major in Art Education.

Attributes: Field Experience, Undergraduate

EDU 430 Linguistics and ESL (3 credits)

This course will introduce teacher candidates interested in ESL instruction to the study of language and principles of linguistics. Emphasis is placed on understanding the role of phonetics, phonology, morphology, syntax, semantics, sociolinguistics, pragmatics, second language acquisition, pedagogy, and applied linguistics in the learning English as a second language. This course is open to all undergraduate students interested in working with students for whom English is a second language.

Attributes: Undergraduate

EDU 432 Theories & Models in Language (3 credits)

The course introduces teacher candidates interested in ESL to theories and models in language acquisition, processes of language acquisition, especially the process of learning a second or additional language. Emphasis will be given to learning environments, the characteristics of interaction and participation, and contexts that facilitate second language acquisition. The course will also explore linguistic factors and processes in second language acquisition (SLA) and examine how they are influenced by the learner's home language. This course requires a 15-hour field experience.

Attributes: Undergraduate

EDU 457 Sem ClinApp of Traum in Infanc (3 credits)

The following course provides students with an applied course, which focuses on specific trauma cases in infancy and early childhood. This course is designed as the capstone course for those students who have successfully completed two prior related courses. (i.e., EDU 241/644 & EDU 345/651). A roundtable format will be the primary format for all lectures, discussions, and assignments. Students will investigate specific trauma cases, and they will use prior knowledge and current empirical/best practice evidence to analyze and pose appropriate educational/interventional suggestions. This course is appropriate for students majoring in the following programs such as early care and educator preparation, Childhood Studies, Child Life, and other related allied health professions.

Prerequisites: EDU 241 and EDU 345

Attributes: Undergraduate

EDU 470 Special Topics in Education (1-3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EDU 471 Writing in the Classroom (3 credits)

A practical course in the teaching of writing across the curriculum. Practice in personal, creative, and expository writing. Methods of teaching writing and steps in the writing process (pre-writing, drafting, revising, editing, publishing) are emphasized in the course.

Attributes: Undergraduate, GEP, Writing Intensive

EDU 474 Special Topics in EDU (3 credits)

Rotating topics in Education.

Attributes: Undergraduate

EDU 475 ESL Instruct Prac w/Field (4 credits)

This course introduces students to the roles and responsibilities of the ESL/Bilingual teacher through a school-based experience. Students spend 30 hours in the company of expert ESL/Bilingual educators in school settings. Students will gain expertise in working with groups of students, interfacing with teachers and caregivers, and examining programs that serve emergent bilingual students in grades PK-12. Emphasis will be on program design and implementation guided by the English language development standards (ELDS), including assessing students' language capacities, designing programs to fit a variety of language needs, working with teachers and other school professionals to serve emergent bilinguals, and organizing programs to enhance caregiver collaboration. The course requires students to fulfill a 30-hour field requirement working with ESL students.

Attributes: Undergraduate

EDU 476 Pedagogy for ESL Learn w/Field (3 credits)

This course examines various approaches, methods, and techniques for teaching and assessing English Language Learners in bilingual and ESL classrooms, as well as for assisting ELL students' learning in regular classrooms. This course is also suitable for those interested in teaching in an EFL environment (abroad). Candidates will develop a culturally responsive curriculum and design a variety of research-supported instructional activities to meet the needs of the culturally and linguistically diverse learners. The course requires students to fulfill a 30-hour field requirement for completing course assignments.

Attributes: Undergraduate

EDU 479 Independent Study Education (3 credits)

This course is designed to accommodate those students who have an interest in a research- or internship- worthy topic that can be examined on an independent basis. The student will work closely with a professor on an education-related topic that will require the identification of that topic, a literature review, appropriate methodology/field experience, and analysis.

EDU 491 Secondary Student Teaching (12 credits)

Student teaching is a full-semester, full-time, full-day, 14-week student teaching experience of the teacher preparation program for SJU students seeking initial teacher certification. The Pennsylvania Department of Education (<http://www.education.pa.gov/>) defines student teaching as a set of organized and carefully planned classroom teaching experiences required of all candidates in a preparation program. Student teachers are assigned to one or more classrooms, closely supervised and apprenticed by a certified teacher who serves as the cooperating teacher, and provides regular feedback to the student on their classroom teaching performance. Student teachers are also assigned a university mentor who observes student teachers in their field placement and provides feedback on the six domains of student teacher competencies as outlined by PDE. In conjunction with student teaching placement in the school, all student teachers are required to attend a weekly seminar in student teaching conducted by a university professor. All student teachers are required to abide by PDE Code of Professional Practice and Conduct for Educators. A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Prerequisites: EDU 150 and EDU 157 and SPE 160

Restrictions: Enrollment is limited to students with a major in Art Education, Biology - Secondary Education, Chemistry - Secondary Education, English - Secondary Education, French - Secondary Education, History - Secondary Education, Italian - Secondary Education, Latin - Secondary Education, Mathematics - Secondary Education or Spanish - Secondary Education.

Attributes: Undergraduate

EDU 492 PK12 Student Teaching (12 credits)

This experience is designed as the capstone professional course for the PK-12 education programs; it is to be the final course taken. The student teaching experience approximates a full-time teaching experience for the semester (14 weeks). In addition, the teacher candidate attends a seminar once each week in which issues related to student teaching are studied. This field-based seminar is designed to provide teacher candidates with an understanding of the diverse needs of their students and their learning environments in early childhood education (as defined by the Pennsylvania Department of Education) for grades PK-12. At the conclusion of the student teaching experience, the candidate shall have demonstrated proficiencies in instructional management; student motivation; curriculum planning; learning theory, problem solving in the educational setting; the use of technology; use of appropriate pedagogies across content areas, including reading, language, and literacy skills in all classrooms; the identification of appropriate instructional resources; and the assessment of student achievement. Throughout student teaching and the student teaching seminar, candidates will be expected to apply the knowledge, skills, and competencies developed through the Saint Joseph's University Teacher Preparation Program as aligned with the program's mission to "to cultivate knowledgeable, caring, reflective, and socially conscientious educators who can think critically, inspire a passion for learning, communicate effectively, and advocate intentionally for all PK-12 candidates, including those from culturally nondominant communities and those who have distinct learning needs." A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to students with a major in Art Education, French - Secondary Education or Spanish - Secondary Education.

Attributes: Field Experience, Undergraduate

EDU 495 ECE Student Teaching (12 credits)

This experience is designed as the capstone professional course for the PK-4 education major; it is to be the final course taken in the major sequence. The student teaching experience approximates a full-time teaching experience for the semester (14 weeks). In addition, the teacher candidate attends a seminar once each week in which issues related to student teaching are studied. This field-based seminar is designed to provide preservice teachers with an understanding of the diverse needs of their students and their learning environments in early childhood education (as defined by the Pennsylvania Department of Education) for grades pre-k - 4th. At the conclusion of the student teaching experience, the candidate shall have demonstrated proficiencies in instructional management; student motivation; curriculum planning; learning theory, problem solving in the educational setting; the use of technology; use of appropriate pedagogies across content areas, including reading, language, and literacy skills in all classrooms; the identification of appropriate instructional resources; and the assessment of student achievement. Throughout student teaching and the student teaching seminar, candidates will be expected to apply the knowledge, skills, and competencies developed through the Saint Joseph's University Teacher Preparation Program as aligned with the program's mission to "to cultivate knowledgeable, caring, reflective, and socially conscientious educators who can think critically, inspire a passion for learning, communicate effectively, and advocate intentionally for all PK-12 candidates, including those from culturally nondominant communities and those who have distinct learning needs." A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Elementary Educ Pre K -4th Gr.

Attributes: Undergraduate

EDU 496 Student Teaching 4-8 (12 credits)

Student teaching is a full-semester, full-time, full-day, 14-week student teaching experience of the teacher preparation program for SJU students seeking initial teacher certification. The Pennsylvania Department of Education (<http://www.education.pa.gov/>) defines student teaching as a set of organized and carefully planned classroom teaching experiences required of all candidates in a preparation program. Student teachers are assigned to one or more classrooms, closely supervised and apprenticed by a certified teacher who serves as the cooperating teacher, and provides regular feedback to the student on their classroom teaching performance. Student teachers are also assigned a university mentor who observes student teachers in their field placement and provides feedback on the six domains of student teacher competencies as outlined by PDE. In conjunction with student teaching placement in the school, all student teachers are required to attend a weekly seminar in student teaching conducted by a university professor. All student teachers are required to abide by PDE Code of Professional Practice and Conduct for Educators. A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to students with a major in Elementary/Middle Grades (4-8).

Attributes: Undergraduate

EDU 498 Dual Major Student Teaching (6 credits)

This experience is designed as the capstone professional course for the Double Major (PK-4 / Special Education); it should be taken in conjunction with SPE 495. It is to be the final course taken in the major sequence.

The Student Teaching experience approximates a full-time working experience for the semester (fourteen weeks) and includes experiences in both regular and special education classrooms. It includes a seminar class each week in which issues related to student teaching are studied. At the conclusion of the Student Teaching experience, the student shall have demonstrated proficiencies in instructional management, student motivation, curriculum planning, learning theory, solving problems in the education setting, using reading, language and literacy skills in working with exceptional students, identifying instructional resources, using technology, and assessing student achievement. A maximum of one additional course may be taken during the student teaching semester. Students should apply to the Office of Student Teaching according to the application deadlines established by the Department. These deadlines are more than one semester in advance of student teaching. See Education Department home page for on-line application and guidelines.

Restrictions: Enrollment is limited to students with a major in Elementary Educ Pre K -4th Gr, Special Education (7 to 12) or Special Education (PK to 8).

Attributes: Undergraduate

EDU 550 His & Contemp Persp Ed w/Field (3 credits)

American education as a dynamic, sometimes cyclic, process. The origins, evolution, and realities of contemporary public and private schools are examined through critical reading original documents. Visits to elementary or secondary classrooms in multicultural setting provide a strong link to the teacher's world.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 551 Psych Teach Dev Persp w/Field (3 credits)

This course introduces theoretical models of instructional design, student motivation, classroom management, and assessment. Attention is directed to instructional objectives; to lesson formats; to motivational strategies; to classroom discipline; to teacher attitudes and expectations; and tests and measurements. Particular attention is given to recent developments in schema theory and to constructivist models.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 557 Adolescent Psychology w/ Field (3 credits)

This course introduces theoretical models of instructional design, student motivation, classroom management, and assessment at the secondary level. Attention is directed to instructional objectives; to lesson formats; to motivational strategies; to classroom discipline; to teacher attitudes and expectations; and tests and measurements. Particular attention is given to recent developments in schema theory and to constructivist models.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 570 Education Independent Study (1-3 credits)

Students will study a topic in education with a faculty mentor.

EDU 600 Curriculum Theory (3 credits)

In this course students will examine historical and contemporary theories underpinning curricula decisions, how educational settings decide what knowledge is worth teaching and learning, whose knowledge is valued in the curriculum, who has the power to make these decisions, and the implications of these decisions in terms of who is included, who is excluded, who benefits, who is disadvantaged, and what this means for student experience. In this course, curriculum is understood as overt and planned for guiding teaching and learning as well as hidden to shape the educational experiences of students. Students will explore critical, postmodern, poststructural, feminist, postfeminist, queer, phenomenological, autobiographical, and aesthetical theory as lenses for engaging with curriculum issues. In this course, students will also become familiar with the theoretical orientation of research on curriculum and evaluate the production of knowledge related to curriculum issues.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 610 Instr Techniq English w/Field (3 credits)

This course introduces graduate level teacher candidates to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to teaching ELA at the secondary level. The course has a special focus on pedagogical knowledge and skills for teaching ELA and promoting social justice in the ELA classroom. Candidates will learn how to align the PA ELA Content and Proficiency Standards and Assessment for instruction in a culturally and linguistically diverse setting. Students will draw upon a variety of tools to design, implement, reflect upon and evaluate ELA curriculum for secondary classrooms that is culturally and linguistically responsive to classroom diversity. Candidates will design and implement innovative techniques including new media literacies that address the academic needs of diverse learners. Assigned readings, class lectures and discussions, video and print resources, library and online research, written assignments and presentations, guest speakers, and field trips aim at developing candidates' knowledge, skills, and dispositions for teaching ELA. This course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 612 Instr Techniq Soc St w/Field (3 credits)

This course introduces graduate level teacher candidates to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to promoting social studies literacy development of secondary students. The course has a special focus on pedagogical knowledge and skills for teaching social studies and promoting social justice in the social studies classroom. Candidates will learn how to align the PA Social Studies Proficiency Standards with the PA academic standards to plan instruction in a culturally and linguistically diverse setting. Students will draw upon a variety of tools to design, implement, reflect upon and evaluate social studies curriculum for secondary classrooms. Teacher candidates will engage in designing and implementing innovative techniques, new literacies, and effective teaching techniques that address the academic needs of culturally diverse learners. Assigned readings, class lectures and discussions, video and print resources, library and online research, written assignments and presentations, guest speakers, and field trips aim at developing teacher candidates' knowledge, skills, and dispositions for teaching social studies. The course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 614 Instr Tchnq Wrld Lang w/Field (3 credits)

This course introduces the teacher candidate to key theories, philosophies, core concepts, issues, skills, methods of inquiry, application of technology and research-based practices related to the substance and strategies of proficiency oriented second language instruction (K-12). The course has a special focus on pedagogical knowledge and skills for teaching foreign languages and promoting social justice in the FL classroom. Candidates will learn how to align the PA FL Content and Proficiency Standards and Assessment (ACTFL) in a culturally and linguistically diverse setting. Students will draw upon a variety of tools of design, implement, reflect upon, and evaluate FL curriculum for secondary classrooms. In order to develop each candidate's knowledge, skills, and dispositions for teaching FLs, candidates will design and implement innovative techniques including new media literacies that address the academic needs of diverse learners. Upon completion of this course, you should be able to identify current instructional practices, theories, and paradigms in a Foreign Language Classroom and demonstrate current instructional practices and theories in a Foreign Language Classroom. The course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 616 Instr Techniq Math w/Field (3 credits)

Intensive study and practice of teaching modalities and classroom management strategies appropriate for a secondary classroom. The study of curriculum resources in the student's area of certification is included. Topics in the course include instructional management, student motivation, the implications of learning theory for classrooms, and the procedures for the measurement of student achievement. Students are expected to demonstrate proficiency in these skills for successful completion of the course. The course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 618 Instr Techniq Science w/Field (3 credits)

Intensive study and practice of teaching modalities and classroom management strategies appropriate for a secondary classroom. The study of curriculum resources in the student's area of certification is included. Topics in the course include instructional management, student motivation, the implications of learning theory for classrooms, and the procedures for the measurement of student achievement. Students are expected to demonstrate proficiency in these skills for successful completion of the course. The course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 620 Tech& Innovation in Curriculum (3 credits)

This course focuses on exploring how technology is integrated into curriculum and instruction to meet the needs of 21st century students in diverse educational settings. Students will study the history of technology in educational contexts, changes in how technology is used in classrooms, and will evaluate how technology has been used to promote teaching and learning. Students will also explore innovation in technology used in schools today, engage in critical inquiry into uses of technology, and design curricula that integrates technology in ways that enhance teaching and learning for equity and inclusion in educational contexts.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 621 Instruct Techniq: Comp Sci Edu (3 credits)

Candidates will learn subject-specific standards for competencies based upon the Computer Science Teachers Association (CSTA) standards. The CSTA academic standards detail a core set of learning objectives providing the foundation for a rigorous K-12 computer science curriculum. The standards introduce the foundational concepts of computer science making them accessible for all learners. Topics will include the following: Algorithms and Programming, Computing Systems, Data and Analysis, Impacts of Computing, Networks and the Internet and Pedagogy.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 622 Instr Tech Art Ed w/Field (3 credits)

This course is designed to introduce pre-service teachers of Art to instructional processes, teaching strategies, materials, lesson planning, assessment practices, and classroom management theory that will be of practical value in the classroom. The course has a mandatory field experience in a 7-12 grade classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 625 Theory & Pr Sec Teach w/Field (3 credits)

This course studies the content and methods for teaching the five PA certification disciplines: English, Art, Foreign Language, Social Studies and Citizenship. National, state, and local standards are examined, which students consider in relation to curriculum design and pedagogy. Backward Design, a method for developing lessons and units, provides a common organizing framework that fosters good teaching. For part of the course, students study within their own discipline, interacting with texts that discuss curriculum frameworks, the planning of lessons and units, pedagogical content knowledge, and assessment. Ten models of teaching that are applicable to all disciplines are explored in detail. As students develop units of study, they gain practice in using these models and the Backward Design method.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 627 Theory & Pr Sec Mat/Sc w/Field (3 credits)

This course studies the content and methods for teaching the PA certification disciplines: Mathematics, Science, Bio, Chem and Physics. National, state, and local standards are examined, which students consider in relation to curriculum design and pedagogy. Backward Design, a method for developing lessons and units, provides a common organizing framework that fosters good teaching. For part of the course, students study within their own discipline, interacting with texts that discuss curriculum frameworks, the planning of lessons and units, pedagogical content knowledge, and assessment. Ten models of teaching that are applicable to all disciplines are explored in detail. As students develop units of study, they gain practice in using these models and the Backward Design method.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 631 Assessment & Evaluation 7-12 (3 credits)

This course is designed so teacher candidates understand and use multiple methods of assessment to engage learners in their own growth, to monitor learner progress, and to guide the teacher's and learner's decision making (from INTASC). Teacher candidates will learn basic assessment and evaluation concepts; examine instruments that reflect constructs of interest (cognitive, affective, and behavioral objectives); develop skill in aligning assessment and instruction to state standards; construct various types of assessments; and analyze and refine teacher-made instruments. Teacher candidates will also learn how to interpret test results and how to communicate and use them in educational decision-making. Throughout the course, they will learn the importance of critical issues in the field, assessment as an ethical practice, historical and theoretical perspectives on assessment issues; differentiation issues in assessment; and will be able to analyze and reflect upon the ethical implications of assessment practices and policies.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 632 Literacy/Literature I w/ Field (3 credits)

This course provides students with the opportunity to investigate the various theoretical models of the reading process. Students investigate the various factors which impact upon successful reading performance. Students begin to investigate the use of literature, specifically fiction, nonfiction, poetry, picture books, and fantasy selections in the development of instructional practices in the primary grades. Included in this course is an investigation of the use of Basals as literature. In addition, students study the use of reading strategies to be used for teaching reading in the content areas.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 640 Literacy/Literature II w/Field (3 credits)

The course provides students with the opportunity to continue their investigation of the use of literature as central to the development of successful reading. Students are involved in extensive analysis of a wide range of literature for young people. Students continue to investigate the use of instructional reading models to critique strategies related to the use fiction, nonfiction, poetry, picture books, and fantasy selections. Included in this course is an investigation of Multicultural Literature and the Writing Process.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 642 Per in Dev & Child Ed w/Field (3 credits)

This course is designed as an introduction to developmental perspectives in early childhood education (ECE). Topics to be covered include: recognizing the unique roles of early care and education providers; understanding cognitive, social-emotional, adaptive and motor development in childhood; assessing and planning using developmentally appropriate and standards-based curricula; understanding instructional design, student motivation, and classroom management; providing inclusive learning environments; and communicating effectively with families and caregivers. Special attention will be given to contemporary models of ECE in school and other early childhood settings, including constructivist models, as well as the unique needs of early learners, including English Language Learners and students with special needs.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 644 Socio-Emotion & Motor Develop (3 credits)

This course focuses on the domain of social and emotional development in early childhood, and it explores the complex ways in which this domain of development changes over time from birth to allow the growing child to react and interact with others around them. An interactional model will serve as the primary theoretical framework that underlies all discussions and assignments in order to allow students to understand the concept that each major area of development in early childhood are interdependent on one another and directly contribute to the adaptability and resilience of the whole child. Students will become familiar with current theories on how the young child develops socially and emotionally from birth and how mastery of development in these areas provides lays the foundation for cognitive, linguistic, and motoric growth in the early years. Special topics include early childhood mental health, parent-child attachment, floor time and early exploration (play), family systems dynamics, resiliency, adversity/risk, policy reform, and promotion/prevention/intervention.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 645 Trauma:Infancy & Early Child (3 credits)

The following course provides students with an in-depth study of trauma in infancy and early childhood, including analyses of historical origins, theoretical perspectives, influences on development and learning, and impacts on establishing sustained relationships throughout the lifespan. Throughout course readings and assignments, students will analyze specific levels and intensities of traumatic events and identify how these relate to the continuum of effects that early (chronic) trauma has on young children's internal working models of self-esteem, self-worth, self-competence, and overall self-identity. Various models of intervention and therapeutic approaches will be explored to provide students with pathways to: support children's development and learning, integrate educational and emotional wellness strategies to strengthen resilience, and help children cope with their exposure to trauma. The following course is especially appropriate for pre-professional students in the fields of educator preparation, child studies, psychology, or sociology.

Attributes: Graduate

EDU 646 Language and Culture w/ Field (3 credits)

This course introduces candidates to key theories, issues, and research-based practices related to serving culturally and linguistically diverse students (Pre-K-12), with a special focus on students who are commonly referred to as English language learners (ELLs). Candidates will explore the many dimensions of culture and language. They will also learn how to align the PA Language Proficiency Standards with the PA academic standards to plan instruction in a culturally and linguistically diverse setting. Assigned readings, class discussions, video recordings, library and online research, and a field experience in a culturally and linguistically diverse classroom will engage candidates in the course topics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 647 Literacy & Lrn Acr Cur w/Field (3 credits)

The focus of this course is the teaching of content area reading and literacy across the curriculum for secondary schools. Topics to be examined include: theory, policy, practice and research in reading in the content area, reading across content areas, disciplinary reading, levels of reading and comprehension, place of reading in school programs, selecting diverse and appropriate curricular materials for enhancing reading that is culturally and linguistically responsive, differentiated reading instruction for diverse learners, general and specific strategies and study skills for content area reading comprehension, vocabulary, fluency, and spelling, critical reading of texts including critical media literacy, adjustment of reading instruction to meet individual learning levels and styles in inclusive classrooms, diagnostic, screening, formative, summative and benchmark reading assessment, and interventions for improving reading comprehension in the content areas for challenged and culturally and linguistically diverse readers. This course includes field experience in 7-12 classrooms.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 650 Curriculum Development & Pract (3 credits)

This course is designed to assist educators in developing rigorous curriculum and instruction that is inclusive of diverse learners. Students will examine current trends in curriculum and practice across educational settings. Students will gain knowledge of various curricula models and instructional strategies, explore culturally relevant pedagogy, and evaluate curricula designs and models used in various educational contexts. Students will also develop a curricular framework and design curriculum for K12 and college settings.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 657 Clin App of Trauma in Infancy (3 credits)

The following course provides students with an applied course, which focuses on specific trauma cases in infancy and early childhood. This course is designed as the capstone course for those students who have successfully completed two prior related courses (i.e., EDU 241/644 & EDU 345/651). A roundtable format will be the primary format for all lectures, discussions, and assignments. Students will investigate specific trauma cases, and they will use prior knowledge and current empirical/best practice evidence to analyze and pose appropriate educational/interventional suggestions. This course is appropriate for students majoring in the following programs such as early care and educator preparation, Childhood Studies, Child Life, and other related allied health professions.

Prerequisites: EDU 641 and EDU 645

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 660 Integrated STEM Education (3 credits)

This course focuses on teaching and learning in STEM education from a historical, social, and cognitive. Students will examine the theories that are foundational to STEM education, seminal literature from STEM fields, and best practices in STEM teaching and learning in PK12 settings. The course examines current theories and principles in how to teach STEM concepts, and how to integrate instructional strategies across the curriculum to promote student learning in STEM areas.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 663 Science Methods PK-4 w/ Field (3 credits)

This course is designed to provide students with the opportunity to investigate the philosophy, curriculum planning and organization, skill development, content knowledge, and instructional approaches relevant to teaching elementary school science.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 665 Interd Teach Mat w/ Field (3 credits)

Ultimately, the goal of this course is to prepare teachers or teaching candidates who have the knowledge, skills, and orientation to help young children develop their mathematical foundation. The concept of Pedagogical Content Knowledge for Mathematics provides the theoretical framework for the course structure and orientation. This means that students who successfully complete the course will have a thorough knowledge of the mathematics central to pre-K - 4; an understanding of how children at these stages learn mathematics; and the ability to coordinate content and "best" practices for mathematics instruction, including the integration of technology. As a course in elementary level math teaching methods, it is designed to engage candidates in thinking beyond the facts and tools of mathematics to the level of understanding ideas and concepts. Thinking conceptually about mathematics means thinking in terms of mathematical constructs that have the potential to produce understanding. In addition, the course will address the role that technology tools are playing in children's mathematics education. The specific mathematical content and instruction practices reflect the National Council of Teachers of Mathematics, the PA Department of Education standards, and the Common Core State Standards for Mathematics (CCSS-M). Throughout the course, candidates will plan, implement, and reflect on lessons; use standards and assessments (formative and summative) in evaluating student progress and teacher effectiveness; apply standards based assessment data to selection of appropriate instructional materials, technology, and/or recommendation for intervention; and apply standards based, data-driven, decision making procedures to lesson planning or re-teaching.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 667 Soc St Thru Arts Pk4 w/Field (3 credits)

EDU 667 Teach Soc Stud Thru Arts PK-4 (3 credits) The purpose of this course is to connect theory and practice in the teaching of elementary school social studies. Strategies for planning, implementing, and evaluating social studies instruction are designed with a focus on preparing children to be critical thinkers and young citizens in a global, technological and culturally diverse world.

Restrictions: Enrollment is limited to Graduate level students.

EDU 670 Special Topics in Education (1-3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 671 Writing in the Curriculum (3 credits)

This course introduces theories and practices of writing instruction, with a specific emphasis on writing process pedagogy. Candidates will experiment with writing across genres, and will learn how to use mentor texts, develop mini-lessons, create workshop classrooms, and develop assessment tools. Candidates will be able to concentrate on specific student populations based on their certification.

Attributes: Graduate

EDU 674 Socio-Emotion Develop (3 credits)

This course focuses on the domain of social and emotional development in early childhood, and it explores the complex ways in which this domain of development changes over time from birth to allow the growing child to react and interact with others around them. An interactional model will serve as the primary theoretical framework that underlies all discussions and assignments in order to allow students to understand the concept that each major area of development in early childhood are interdependent on one another and directly contribute to the adaptability and resilience of the whole child. Students will become familiar with current theories on how the young child develops socially and emotionally from birth and how mastery of development in these areas provides the foundation for cognitive, linguistic, and motoric growth in the early years. Special topics include early childhood mental health, parent-child attachment, floor time and early exploration (play), family systems dynamics, resiliency, adversity/risk, policy reform, and promotion/prevention/intervention.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 690 Curriculum & Instruction Sem. (3 credits)

In this course, students will be introduced to research in curriculum and instruction, methods used to conduct research, and will conduct research in their area of interest toward promoting social justice in curriculum and instruction. Emphasis will be placed on using research skills and knowledge to identify a gap in curriculum and instruction, conduct research, and make recommendations on how to make curriculum inclusive.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 691 Secondary Student Teaching (6 credits)

Student teaching is a full-semester, full-time, full-day, 14-week student teaching experience of the teacher preparation program for SJU students seeking initial teacher certification. The Pennsylvania Department of Education (<http://www.education.pa.gov/>) defines student teaching as a set of organized and carefully planned classroom teaching experiences required of all candidates in a preparation program. Student teachers are assigned to one or more classrooms, closely supervised and apprenticed by a certified teacher who serves as the cooperating teacher, and provides regular feedback to the student on their classroom teaching performance. Student teachers are also assigned a university mentor who observes student teachers in their field placement and provides feedback on the six domains of student teacher competencies as outlined by PDE. In conjunction with student teaching placement in the school, all student teachers are required to attend a weekly seminar in student teaching conducted by a university professor. All student teachers are required to abide by PDE Code of Professional Practice and Conduct for Educators. A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 692 PK12 Student Teaching (6 credits)

This experience is designed as the capstone professional course for the PK-12 education programs; it is to be the final course taken. The student teaching experience approximates a full-time teaching experience for the semester (14 weeks). In addition, the teacher candidate attends a seminar once each week in which issues related to student teaching are studied. This field-based seminar is designed to provide teacher candidates with an understanding of the diverse needs of their students and their learning environments in early childhood education (as defined by the Pennsylvania Department of Education) for grades PK-12. At the conclusion of the student teaching experience, the candidate shall have demonstrated proficiencies in instructional management; student motivation; curriculum planning; learning theory, problem solving in the educational setting; the use of technology; use of appropriate pedagogies across content areas, including reading, language, and literacy skills in all classrooms; the identification of appropriate instructional resources; and the assessment of student achievement. Throughout student teaching and the student teaching seminar, candidates will be expected to apply the knowledge, skills, and competencies developed through the Saint Joseph's University Teacher Preparation Program as aligned with the program's mission to "to cultivate knowledgeable, caring, reflective, and socially conscientious educators who can think critically, inspire a passion for learning, communicate effectively, and advocate intentionally for all PK-12 candidates, including those from culturally nondominant communities and those who have distinct learning needs." A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 695 PK-4 Student Teaching (6 credits)

This experience is designed as the capstone professional course for the PK-4 education program; it is to be the final course taken. The student teaching experience approximates a full-time teaching experience for the semester (14 weeks). In addition, the teacher candidate attends a seminar once each week in which issues related to student teaching are studied. This field-based seminar is designed to provide teacher candidates with an understanding of the diverse needs of their students and their learning environments in early childhood education (as defined by the Pennsylvania Department of Education) for grades pre-k - 4th. At the conclusion of the student teaching experience, the candidate shall have demonstrated proficiencies in instructional management; student motivation; curriculum planning; learning theory, problem solving in the educational setting; the use of technology; use of appropriate pedagogies across content areas, including reading, language, and literacy skills in all classrooms; the identification of appropriate instructional resources; and the assessment of student achievement. Throughout student teaching and the student teaching seminar, candidates will be expected to apply the knowledge, skills, and competencies developed through the Saint Joseph's University Teacher Preparation Program as aligned with the program's mission to "to cultivate knowledgeable, caring, reflective, and socially conscientious educators who can think critically, inspire a passion for learning, communicate effectively, and advocate intentionally for all PK-12 candidates, including those from culturally nondominant communities and those who have distinct learning needs." A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 696 Student Teaching 4-8 (6 credits)

Student teaching is a full-semester, full-time, full-day, 14-week student teaching experience of the teacher preparation program for SJU students seeking initial teacher certification. The Pennsylvania Department of Education (<http://www.education.pa.gov/>) defines student teaching as a set of organized and carefully planned classroom teaching experiences required of all candidates in a preparation program. Student teachers are assigned to one or more classrooms, closely supervised and apprenticed by a certified teacher who serves as the cooperating teacher, and provides regular feedback to the student on their classroom teaching performance. Student teachers are also assigned a university mentor who observes student teachers in their field placement and provides feedback on the six domains of student teacher competencies as outlined by PDE. In conjunction with student teaching placement in the school, all student teachers are required to attend a weekly seminar in student teaching conducted by a university professor. All student teachers are required to abide by PDE Code of Professional Practice and Conduct for Educators. A maximum of one additional course may be taken during the student teaching semester. Students should complete the "Application for Student Teaching" (<https://sites.sju.edu/education/student-teaching/application-student-intern-teaching/>) at least one semester in advance of student teaching.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 700 Psychology of Literacy (3 credits)

Designed to provide educators with an understanding of the psychological basis of literacy acquisition and development. Emphasis will be placed upon interactive models of the reading process and their implications for classroom instruction. The role of language, cognition, information processing, affective factors and measurement in reading will be examined in detail.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 701 Assess & Instr in Liter K-3 (3 credits)

This course provides in-depth study of students' literacy development in grades K-3. A range of formal and informal assessments will be used to examine children's early language and literacy development, including phonemic awareness, concepts of print, word recognition strategies, and comprehension abilities. This information will be used to make informed decisions about literacy instruction.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 702 Assess & Instr in Liter 4-12 (3 credits)

This course provides in-depth study of student's literacy development in grades 4-12. A range of formal and informal assessments will be used to examine children's literacy abilities; a focus of the course is understanding and enhancing growth in areas of selecting and applying comprehension strategies and reading texts critically. Assessments will be used to make informed decisions about literacy instruction.

Prerequisites: EDU 701

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 703 Crit Exp of Literacy Research (3 credits)

Students will critically read and interpret current research across a range of topics, including orthographic and phonological development, phonics, fluency, vocabulary, and comprehension. Students will be asked to evaluate research representing a range of methodological approaches to these topics, including empirical, mixed-method, ethnographic, and case study designs. Emphasis will include an examination of the nature of educational research and the use and misuse of statistical analyses and interpretations of data. Students will complete a modified literature review of a specific topic to inform classroom practice and teacher research.

Prerequisites: EDU 701

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 704 Plng & Org a Literacy Program (3 credits)

The study of the reading program (K-12) is central to this course which utilizes the concept of communication as a unifying theme. Aspects of the planning and organizing of the literacy curriculum are examined. Emphasis is placed on the role of the reading specialist in developing, coordinating, and administering a literacy program. Students will assess the strengths and needs of a school's literacy program and make recommendations for improvement. Prerequisites: three reading specialist courses.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 705 Literacy Practicum (6 credits)

During this practical experience, students work intensively with pupils who have reading difficulties in their school setting. Under the guidance of a supervisor, graduate students will conduct assessments and draw from these data to inform their instruction. Each student will be expected to develop a case study on at least one student during the practicum experience.

Prerequisites: EDU 700 and EDU 701 and EDU 702

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 706 Socio Cult Aspects of Literacy (3 credits)

This course is based on theoretical frameworks relating literacy learning to the various contexts which lead learners to socially and culturally different ways of making sense and being in the world. It examines multiple views of language, literacy, and literacy development. Students explore the factors that impact literacy learning across different cultural communities. They also explore issues of race, class, and culture on language and literacy acquisition and development.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 710 English Linguistics (3 credits)

This course aims to meet part of the requirement for PDE's ESL Program Specialist certification and the course is an introduction to the study of language and principles of linguistics. The objective of this course is to explore the basic components of language mostly from an ESL teacher's perspective and gain a better understanding of the challenges and strengths ESL students have in learning English as a new language. In particular, students will develop knowledge about the language sound system (phonetics and phonology), the form of words (morphology), sentence structure (syntax), word and sentence meaning (semantics) as well as pragmatics (contextual use of language). Students will also explore other topics and issues related to linguistics, such as how language is applied in social situations in different cultures (Sociolinguistics), how languages change over time (historical linguistics), and how languages are learned (language acquisition) and taught (pedagogy and applied linguistics).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 712 Topics in Language Acquisition (3 credits)

The course examines the processes of second language acquisition (SLA) and the various factors that influence language learning and teaching from different perspectives. Topics to be explored include age and acquisition, human learning, individual differences, affective factors, learners' cultural backgrounds, as well as social interactions and learning contexts that facilitate second language acquisition. Additionally, the course will also explore language transfer, interlanguage, and translanguaging. The course requires 15 hours of field to meet PDE's field requirement.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 713 Method Teach English Sec Lang (3 credits)

This course examines various approaches, methods, and techniques for teaching and assessing English Language Learners in bilingual and ESL classrooms, as well as for assisting ELL students' learning in regular classrooms. This course is also suitable for those interested in teaching in an EFL environment (abroad). Candidates will develop a culturally responsive curriculum and design a variety of research-supported instructional activities to meet the needs of the culturally and linguistically diverse learners. The course requires students to fulfill a 30-hour field requirement for completing course assignments.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 714 ESL/Bilin Inst Prac w/Field (4 credits)

This course introduces students to the roles and responsibilities of the ESL/Bilingual teacher through a school-based experience. Students spend 30 hours in the company of expert ESL/Bilingual educators in school settings. Students will gain expertise in working with groups of students, interfacing with teachers and caregivers, and examining programs that serve emergent bilingual students in grades PK-12. Emphasis will be on program design and implementation guided by the English language development standards (ELDS), including assessing students' language capacities, designing programs to fit a variety of language needs, working with teachers and other school professionals to serve emergent bilinguals, and organizing programs to enhance caregiver collaboration. The course has a 30 hour field experience.

Prerequisites: EDU 712 and EDU 713 and EDU 646

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 716 Cultural Diversity in Classrooms (3 credits)

This course is designed to promote the exploration of issues of cultural diversity in American Education in preparation for the changing needs of society. Specific emphasis will be placed upon the role of literature as a springboard for discussion an integration of diversity issues into the curriculum. Students will also investigate current research investigating diversity in schools.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDU 769 Advanced Fieldwork in Literacy (6 credits)

This course is the literacy practicum for students who are working toward Level 1 certification. During this practical experience, students work intensively with pupils who have reading difficulties in their school setting. Under the guidance of a supervisor, graduate students will conduct assessments and draw from these data to inform their instruction. Each student will be expected to develop a case study on at least one student during the practicum experience. The course includes teaching observations by a supervisor.

Prerequisites: EDU 700 and EDU 701 and EDU 702

Restrictions: Enrollment is limited to Graduate level students.

Education Leadership (EDL)

EDL 600 Empowering Change Agents (3 credits)

Empowering Change Agents for Social Justice and Global Impact is an immersive course designed to be a profound catalyst for self-reflection, purposeful dialogue, and in-depth analysis. Its central mission is to cultivate leaders in K-12 schools and other diverse organizations who exemplify critical consciousness and an unshakable commitment to advancing justice. The primary goal of this course is to establish a comprehensive foundation rooted in historical, theoretical, and practical insights. This foundation equips participants with the tools needed to engage in discerning evaluations of organizations and leadership practices, empowering them to become global change agents and visionary leaders capable of effecting profound inclusive organizational transformations.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Graduate

EDL 604 History of Museum Education (3 credits)

The history of museums dates back to the 18th century. But the idea that museums should be devoted to education—a notion rooted in democratic ideals, especially in the U.S.—did not really take hold until the Progressive Era. This course traces that history, looking at the development of various museum pedagogies over the course of the past century. How are approaches to museum education impacted by shifting societal values, by economic factors, and by trends in technology?

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 605 Critical Contemp Ed Issues (3 credits)

Current educational problems, trends and issues will be identified and addressed, especially as they relate to the different constituencies, organization and structure of both public and private schools, as well as to American society as a whole. Issues include, but are not restricted to: equal educational opportunity, educational choice and multicultural education. Emphasis will be placed on the values associated with the issues treated.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 610 Public Speaking & Presentation (3 credits)

This course focuses on the theory and practice of creating and conducting effective presentations to a variety of audiences (e.g., educators, public, children, adult learners). Emphasis will be placed on the skills needed to develop informative and engaging verbal stories and visual presentations, as well as the elements of public speaking.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 615 Museum Mgmt & Admin (3 credits)

This course focuses on museum management and administration. Students will explore how various types of U.S. museums are structured and operate as non-profit institutions. They will learn about important museum functions and processes, including registration, collection management, curation, education, conservation, development and marketing. Finally, they will explore recent museum initiatives and trends, thereby gaining critical insights into evolving museum practices. The course will involve both virtual and on-site learning experiences that take advantage of museums and professionals in the Philadelphia region and beyond.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 620 Object-based Learning (3 credits)

Historical objects offer us a concrete view into other times and places. In this course, we will study—and practice—effective strategies for teaching and learning directly from objects, whether they are works of art, historical artifacts, or scientific specimens. With both the physical and digital classroom in mind, we will focus on several student-centered, inquiry-based methods that allow for individual discovery and socially constructed learning. In addition, we will explore engagement activities that move beyond the question-and-answer format.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 625 Inclusive Practice in Museums (3 credits)

Designing inclusive experiences for diverse audiences is vital for making museums welcoming spaces for learning. In this course, we will learn about the multiple audiences that museum educators need to engage—including students from a variety of cultural and socio-economic backgrounds, students with disabilities, and English language learners. Among the strategies we will discuss for effective and inclusive engagement are Universal Design for Learning, decolonizing theory, and anti-racist, anti-bias education.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 630 Museum Education Internship (3 credits)

The internship component requires fieldwork hours in a museum and a bi-weekly seminar component. Internship structures include: (a) embedded within students' current employment at a museum or educational site and would be unpaid due to their employment status, (b) graduate assistantship (limited quantity, competitive application) at the Barnes Foundation or the Maguire Art Museum, or (c) executive style internship over appropriate number of evenings or weekends. Additional requirement is attendance at synchronous online seminar classes to debrief and reflect on internship experiences. Seminar faculty oversees academic elements of course; onsite supervisor provides mentoring in practical components.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 655 Interpersonal Relations (3 credits)

A study of the dynamics of interpersonal, intragroup, and intergroup relations. Emphasis will be placed on the teaching/learning process as well as the counselor/client relationship. A variety of instructional approaches, including lectures, discussions, and group activities will be utilized to develop interpersonal skills.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 660 Strategic Leadership for K-12 (3 credits)

This course offers a deep dive into utilizing various outcome measures and techniques to assess practices, programs and gauge achievement at multiple organizational levels. The focus of this course extends to outcome assessment at the individual, school district, and organizational levels. Particular emphasis is placed on equipping leaders with the knowledge and skills required for standards-based reform, fostering 21st-century skills and dispositions, and serving as champions for data-informed decision-making within diverse organizational settings.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 665 Transformational Leadership (3 credits)

This course offers a thorough examination of leadership theory and its practical application across K-12 and other diverse organizational systems. Students will develop a strong foundation in leadership theory and practice, emphasizing research skills in organizational theory, strategic planning, and instructional leadership at the building level. Through a deep dive into real-world implementations, students will be equipped for leadership roles in various settings, gaining the skills to assess administrative and organizational structures and fostering a comprehensive understanding of strategic planning within these systems. Additionally, coaching is emphasized as a core component of this course, integrating leadership theory with hands-on skills to cultivate practical interpersonal skills and leadership strategies. Students will enhance their abilities to lead and inspire within K-12 and other diverse organizational contexts by exploring practical applications and engaging in coaching techniques.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 670 Strategic Human Resources (3 credits)

This course offers an insightful journey into the vital realm of human resources, representing one of the most substantial investments for a district, school or organization. The course centers on a fundamental inquiry: How can leaders foster inclusive workplace practices and navigate their workforce's changing demands while promoting professional growth? Employees are our most valuable asset. In today's changing landscape, retention strategies are more essential than ever. To tackle this pivotal question, the course is structured around three overarching conceptual domains: mission/vision, cultivating a culture of learning, and harnessing social capital. Within these domains, participants will be able to engage in practical exercises, such as staff recruitment, hiring, and retention strategies, the design and evaluation of professional development programs, and the facilitation of teacher leadership and learning communities. A critical standout component of this course is its unique integration and hands-on application of coaching techniques, particularly emphasized in the dual-course components (EDL 665/670). This intentional focus on coaching serves as a crucial element, offering students essential mentorship and guidance through coaching exercises and practical support, creating a purposeful environment for skill application and learning.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 675 Curriculum Develop & Practice (3 credits)

This course is designed to include the theories of curriculum, instruction, and the design of instructional systems. Emphasis will be placed on the translation of theory into practice. The use of evaluative techniques in the evolution and reform of instructional systems will be examined in detail. Focus on curriculum implementation in public and private schools will be emphasized.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 680 Navigating the Dynamics of Law (3 credits)

This course comprehensively explores the legal dimensions surrounding educational institutions and their broader context. This course delves into the main legal-educational issues currently shaping the nation, specifically focusing on policy development and execution. Notably, it dedicates significant attention to key legal areas, including contract law, negligence, sexual harassment, and legislation concerning students with disabilities. Furthermore, it scrutinizes due process, collective bargaining, equal protection, establishment clause, and the legal rights and responsibilities of administrators, faculty, and students. The course goes beyond mere legalities, emphasizing the ethical considerations intertwined with school law.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 685 Instructional Design Contemp (3 credits)

This advanced course is tailored for graduate-level students and offers an in-depth exploration of curriculum and facilitation development's theoretical, historical, and psychological foundations. It emphasizes the practical aspects of designing, implementing, and assessing curriculum, training, and facilitation within a contemporary educational context. With a focus on promoting equity and inclusivity, this course is designed to empower educational leaders in various settings. It is structured around three central themes: equity-minded curriculum design, data-informed leadership, and empowerment and capacity building.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 690 Equity Allocation: Bridging (3 credits)

Explore economic theory and education intersections, exploring market principles, equitable resource allocation, and strategic partnerships across K-12 and other diverse industries. This course examines educational enterprises, with in-depth content covering K-12 school finances, revenue procurement characteristics, taxation for education, budget management effectiveness, capital outlays, equity in school funding, adequacy considerations, funding's impact on student performance, vouchers, and labor market dynamics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 695 Internship I: Leaders/Action (3 credits)

EDL 695 is the first part of a two-semester professional internship that provides the candidate the opportunity to apply the practical skills needed to lead in PK-12 schools as principals and/or curriculum supervisors. Candidates collaborate with a site mentor and faculty advisor to develop these skills in a manner that draws on the candidates' personal strengths and helps to develop the competencies required of practicing leaders. Particular attention is paid to the meeting of theory and practice as well as the creation of more just and equitable schools that serve the needs of all students.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 696 Internship II: Leaders/Action (3 credits)

EDL 696 is the second part of a two-semester professional internship that provides the candidate the opportunity to apply the practical skills needed to lead in PK-12 schools as principals and/or curriculum supervisors. Candidates collaborate with a site mentor and faculty advisor to develop these skills in a manner that draws on the candidates' personal strengths and helps to develop the competencies required of practicing leaders. Particular attention is paid to the meeting of theory and practice as well as the creation of more just and equitable schools that serve the needs of all students.

Prerequisites: EDL 695

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

EDL 700 Edu Ldrship Special Topics (3 credits)

This course will address current issues in the field of Educational Leadership. Course content will be determined by instructor.

EDL 800 Prof Sem: Doctoral Studies (3 credits)

This course serves a multifaceted purpose including: introduction to the doctoral program mission and expectations; community building among students, faculty, and alumni; facilitation of interpersonal skills needed in inclusive cultures; development of organizational and study skills for success in doctoral work; and initial review of academic writing, including the structure of scholarly writing, APA style, and critical consumption of knowledge.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 805 Quantitative Research I (3 credits)

This course provides students with empirical research experience through a variety of quantitative measures and techniques. The first half of the course focuses on functional familiarity with the evaluation of quantitative research reports, research design, methods of data collection, statistical analysis and interpretation of data, and the reporting of research findings. The second portion of the course emphasizes a continuation of instruction on quantitative research and statistical analyses specific to work in Statistical Package for the Social Sciences (SPSS) software. The course culminates in the complete process of constructing a quantitative research study.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 820 Interdisciplinary Ldsh Theory (3 credits)

This course provides an interdisciplinary space for discussing the concept of leadership and its practical application in organizations. This course is therefore grounded in the "scholar-practitioner" model, whereby theory is applied in practice within a cycle of reflection and action. The purpose of this course is to establish a historical, theoretical, and practical basis for understanding leaders and leadership and will strive to provide various disciplinary lenses to help leaders better understand themselves and their organizations.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 822 Collaborative Data Discourse (3 credits)

This course prepares candidates in the Principal Leader Certificate to understand the role of educational data in improving the learning conditions of K-12 students. Students in this class will analyze and interpret quantitative and qualitative data and will be expected to develop the capacity of their own staff to generate and interpret this data. Students will also be expected to establish collaborative processes within their own schools to analyze data and to determine the most appropriate data-based actions to improve students learning.

EDL 824 Coaching: Support Action Learn (3 credits)

This course focuses on developing the coaching skills of school administrators and on fostering their own capacity to coach their building and program level teams. The course will introduce students to coaching skills and strategies such as listening, observing, questioning, giving and receiving feedback, and reflecting. Students in the course will receive input from teacher and peers regarding their own development of these skills and will be expected to articulate the processes they will establish to sustain healthy coaching relationships among their school teams.

EDL 826 Coaching New Principals (3 credits)

This course provides students with the opportunity of applying what they learned in EDL 822 & EDL 824 by developing the coaching capacity of newer school leaders. In this year-long coaching experience, students will be assigned a current and less experienced school administrator and will be expected to coach this person on using data for continuous school improvement. This course requires students to reflect critically on their own coaching skills and the impact that their coaching practices have on the people and teams being coached.

EDL 828 Case Study Writing and Portfol (3 credits)

Students in this course are expected to demonstrate their ability to affect school systems by documenting an action research project at their school. Presented as a case study, this project will exemplify the student's leadership competencies and their ability to develop collaborative processes within their own school teams to sustain student improvement. This case study will be included in the portfolio students are expected to build throughout the program and that will be presented at reviewed at the end of this class.

EDL 830 Critical Ldsh: Social Justice (3 credits)

This course explores how historical relations of power have shaped current leadership practices in institutions such as schools, universities, health organizations, or non-profits. By engaging students in critical conversations on how social constructions of race, class, ethnicity, and gender have articulated notions of leadership that have further marginalized already disempowered groups, the course will pay particular attention to issues of knowledge, representation and identity. Ultimately, the course offers new analytical tools to create new spaces of possibilities in leadership grounded on the notions of justice, solidarity and allyship.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 835 Qualitative Research I (3 credits)

This course provides an overview of qualitative research approaches, including an examination of foundational research paradigms and a variety of qualitative research methods and techniques. Students will gain a functional familiarity with the evaluation of qualitative research reports, research design, data collection methods, analysis, interpretation, and reporting of research findings.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 840 Mixed Methods Research (3 credits)

This research method course continues the development of students' understanding of educational research methodology and techniques. The central focus of the course is the opportunity for students to design, implement, and assess mixed methods research within an authentic educational context. Students will develop relevant research skills, including project management, analytical skills, research communication, and writing skills.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 843 Curriculum and Instruction (3 credits)

This course develops professional skills required to effectively teach in higher education, post-secondary education, and clinical settings. Topics include: curriculum design (employing theories of models of learning design), syllabus construction, lesson planning, instructional delivery, classroom/learning management, and assessment. A framework of inclusive learning environments is embedded throughout each topic area. *Restrictions:* Enrollment is limited to Doctoral level students.

EDL 844 Teaching Practicum (3 credits)

Grounded in the scholar-practitioner model, this course calls on students to apply knowledge gained from their doctoral coursework to practical teaching situations in higher education, clinical, or community settings. The student is systematically moved from participant-observation to teaching experiences under the mentoring of an experienced and effective professor, professional developer, or clinician. Practicum experiences can take place across different colleges/schools, centers, and units at Saint Joseph's University. *Restrictions:* Enrollment is limited to Doctoral level students.

EDL 845 Historical, Political, & Legal Contexts of Leadership: K-12 (3 credits)

This course presents an interdisciplinary approach to key historical events and documents shaping American society and education, specifically by overviewing how policy development, laws, and court decisions shape education. The course will highlight tensions around power, particularly between majority and non-majority perspectives on past, current, and present issues facing K-12 education. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 846 Hist/Pol/LegalContxt Ldsh: HE (3 credits)

This course overviews key historical, political, and legal elements that shaped and continue to shape institutions of higher education. The course will highlight tensions around power, particularly between majority and non-majority perspectives on past, current, and present issues facing higher education. Options available for students interested in social sector careers include applicable topics for papers, projects, and readings. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 850 Learning Design&Env: K-12 (3 credits)

This course examines elements of design that shape the learning and working experiences of individuals in schools. Through an overview of learning theories (e.g., pedagogical design, student and adult learning theories, communities of learners), architectural, space, and facilities theories, and legal/policy regulations, this course facilitates the practical application of creatively and effectively designing, creating, and managing learning environments for the growth of all schools and all learners. Across this course's content, students will study how physical, organizational, and socially constructed environments shape student, adult, and organizational learning. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 851 Learning Design&Env: HE (3 credits)

This course examines elements of design that shape the learning and working experiences of individuals in institutions of higher education and social sector organizations. Through an overview of learning theories (e.g., pedagogical design, student and adult learning theories, sense of community) and architectural, space, and facilities design theory, this course facilitates the practical application of creatively and effectively designing, creating, utilizing, operating, and renovating learning environments and educational facilities. Across this course's content, students will study how physical, organizational, and socially constructed environments shape student and adult learning and their sense of community. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 855 Scholar-Practitioner Sem: K-12 (3 credits)

The course has a twofold purpose: First, students will engage in culminating assessments that demonstrate their knowledge and practical application of program objectives, content, and skills. Second, students will engage in sessions around effective leadership practices, diversity, equity, and inclusion initiatives, career advancement, and other special topics. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 856 Scholar-Practi Sem:Higher Ed (3 credits)

This course has a twofold purpose: First, students will engage in culminating assessments that demonstrate their knowledge and practical application of program objectives, content, and skills. Second, students will engage in sessions around effective leadership practices, diversity, equity, and inclusion initiatives, career advancement, and other special topics. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 860 Strat Plan, Eval, Fiscal Resour (3 credits)

This course examines the foundations of educational planning and assessment in a project-oriented course with an emphasis on assessing needs, identifying environmental changes, establishing goals, drafting strategic plans, setting metrics to measure success, identifying resources (i.e., human capital, financial, others), and implementing strategic plans. In addition to strategic planning, this course analyzes the role of assessment and evaluation in terms of institutional effectiveness, achievement of plan goals, and government compliance requirements, as well as funding strategies and fiscal resource allocation. An overarching goal is to explore the role of internal, external, cultural, social, political, and cultural factors in education planning and assessment. This course maintains modules in which students are divided for a portion of the course by area of concentration (e.g., K-12, Higher Education, Other Social Sector Areas). *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 865 Comm & Research Dissemination (3 credits)

This course studies effective written and verbal communication for professional settings, as well as the dissemination of research findings to scholarly, practitioner, policymaker, and general audiences. A key focus of the course is to enhance students' writing and presentation style through various individual and group methods. *Restrictions:* Enrollment is limited to Doctoral level students. *Attributes:* Doctoral

EDL 870 Proposal Writing: K-12 (3 credits)

In this course, students will structure and present their dissertation topic by developing complete drafts of Chapters One (Introduction) and Two (Literature Review). Students will learn how to articulate and align their research question, statement of the problem, operational definitions and relevant scholarly works in a professional manner using APA and IDEPEL guidelines. Students will select and secure a dissertation chair by the end of this course.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 871 Proposal Writing: Higher Educa (3 credits)

In this course, students will structure and present their dissertation topic by developing complete drafts of Chapters One (Introduction) and Two (Literature Review). Students will learn how to articulate and align their research question, statement of the problem, operational definitions and relevant scholarly works in a professional manner using APA and IDEPEL guidelines. Students will select and secure a dissertation chair by the end of this course.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 875 Organizational Theory&Change (3 credits)

This course examines the theoretical foundations of organizations and organizational change, including such topics as structures and power in organizations, organizational culture, approaches to decision-making, the change process, motivation theory, conflict management, effective communication, and ethical leadership.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 880 Community Engaged Leadership (3 credits)

This course serves as a practical opportunity for students to apply the content knowledge from their doctoral coursework to a community-based problem for a regional organization. Combining a practicum format with a social justice orientation, students will work collaboratively with community partners to identify a problem and develop a project for addressing the problem.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 882 Independent Study: Leadership (3 credits)

This course provides individualized instruction and support around a topic of interest or specialized project under the close supervision of a faculty member.

Attributes: Doctoral

EDL 884 Independent Study: Research (3 credits)

This course provides individualized instruction and support around a topic of interest or specialized project under the close supervision of a faculty member.

Attributes: Doctoral

EDL 885 Global Perspectives on Ldsh (3 credits)

This course applies theories of leadership and organizational development to the practice of leading schools, higher education institutions, and organizations. Through experiential learning, simulations, and career counseling strategies, students engage with topics such as self-identity and self-care as a leader, group and power dynamics, inclusive cultures, and career advancement.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 886 Special Topics (1-3 credits)

This course examines a special topic in leadership under the close supervision of a faculty member.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 888 Curricular Practical Training (1 credit)

This course examines a special topic in leadership under the close supervision of a faculty member.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 890 Adv Resrch Method: Quant/Mixed (3 credits)

This advanced research methodology course provides students with the knowledge, skills, and abilities to design, conduct and report advanced quantitative and or mixed methods research studies related to topics in education and leadership. The expected outcome of this course is the development of a viable Chapter 3 of a dissertation proposal and obtaining a dissertation committee (i.e., content expert, methodologist).

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 891 Adv Resrch Method: Qualitative (3 credits)

This advanced research method course provides students with the knowledge, skills, and abilities to design, conduct, and report advanced qualitative research studies in education and leadership. The expected outcome of this course is the development of a viable Chapter 3 (Methodology) and obtaining a dissertation committee (i.e., content expert, methodologist).

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 893 Dissertation Study I (3 credits)

This course provides individualized support from dissertation committee chair as students prepare chapters one (introduction) and two (literature review) of their dissertation. This work is in preparation for defense of their dissertation proposal, apply for Institutional Review Board approval, collect data, analyze and write findings and discussions, defend their dissertation, and finalize post-defense steps.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 894 Dissertation Study II (3 credits)

This course provides individualized support from dissertation committee chair as students prepare chapter three (methodology) of their dissertation. This work is in preparation for defense of their dissertation proposal, apply for Institutional Review Board approval, collect data, analyze and write findings and discussions, defend their dissertation, and finalize post-defense steps.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 895 Dissertation Study III (3 credits)

This course provides individualized support from dissertation committee chair as students prepare chapter four (findings) of their dissertation. This work is in preparation for final defense of their dissertation, through collected data, analyzed and written findings, leading to defense of their dissertation, and finalize post-defense steps.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 896 Dissertation Study IV (3 credits)

This course provides individualized support from dissertation committee as students prepare all chapters of their dissertation. This work is in preparation for final defense of their dissertation, through collection of data, analyzed and written findings and discussions, defense of their dissertation, and finalize post-defense steps.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

EDL 899 Dissertation Study V+ (0 credits)

This course provides individualized support from dissertation committee members as students prepare and defend their dissertation proposal, apply for Institutional Review Board approval, collect data, analyze and write findings and discussions, defend their dissertation, and finalize post-defense steps. This course includes a charge of 1.00 billable credit.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

English (ENG)

ENG 101 Craft of Language (3 credits)

A study of the use and power of words including poetic terms and of how words are best put together in an essay. This is mainly a writing course, and literary form will be used as a means to teach writing. The emphasis will be on expository prose. Required of all students except those qualifying for Advanced Placement.

Attributes: CCC: Rhetoric & Composition, Undergraduate

ENG 102 Texts & Contexts (3 credits)

A course in the reading of key literary texts in both the British and American traditions. Students will examine a representative sampling of texts in detail, with guided instruction in writing personal, critical, and creative responses to them. Required of all students except those transfer students who have taken an equivalent course elsewhere.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: GEP: Signature Course, Undergraduate

ENG 113 Literature & Composition (3 credits)

Introduction to fiction, drama, and poetry with frequent theme assignments, critical in nature and coordinated with readings in major literary genres.

Prerequisites: ENG 101 or ENG 111 or ENG 112 or WR 101 or WR 101H

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

ENG 140 Adult Learning Seminar (3 credits)

In this seminar, adult learners will study the idea of work through reading fiction and nonfiction on jobs, employment, and careers. Students will read stories about work and write narratives of work histories that will provide the context and experience for the course. In the second part of the course, students will reflect and theorize on these histories as either empowering sources of vocation, discouraging instances of alienation, or some combination of both. In the final part of the course, students will then engage with either their own present work or future work by preparing cover letters and resumes for their future job applications and writing a significant piece of communication (business proposal, conflict resolution, grant application, etc.) within their current or prospective professional career.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Adult Learning Seminar, Undergraduate

ENG 150 First Year Seminar (3 credits)

The First-Year Seminar is designed to introduce students to the adventures of learning in a college context. First-Year Seminars focus in depth on a question or topic of disciplinary or interdisciplinary interest. By means of its specific focus, the seminar will explore the thinking, research, and writing practices in a particular field. Discussions based on careful reading of texts, writing assignments, both reflection and research types, and in-class student presentations will be supplemented, as appropriate, with activities including guest lecturers, museum trips, attendance at local cultural events and/or field excursions. Topics vary according to individual instructors.

Attributes: First-Year Seminar, Undergraduate

ENG 170 Special Topics in English (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENG 201 Major American Writers (3 credits)

Study of selected works of those writers who have most influenced the continuity and development of our national literature. Among those considered may be Irving, Poe, Emerson, Fuller, Hawthorne, Stowe, Melville, Whitman, Twain, Dickinson, Chopin, Gilman, Frost, Hemingway, Faulkner, and Morrison.

Attributes: American Studies Course, English Area 5 - American Lit, GEP: Art/Literature, Undergraduate

ENG 202 Global English Literature (3 credits)

This course examines English as a global literary language through works of fiction and film. Students will read works by authors who represent diverse regions of the English-speaking world beyond the United Kingdom (excluding the U.S.) that expand the English language, rethink the present-day legacy of the British Empire, and redefine conceptions of Englishness. Specific course topics and reading lists vary with each course offering.

Attributes: English Area 4- British/Irish, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ENG 203 English Grammar (3 credits)

To prepare current and future English language teachers, this course focuses on various aspects of English grammar, especially those are particularly challenging for ESL/EFL learners. It provides useful background knowledge for English language teachers and preparation that strengthens applications for teaching positions, fellowships, and scholarships. This course is beneficial to Linguistics and TESOL majors/minors who plan to teach English in any context and at any level as well as to students in ENG, COM, EDU and other academic areas where a solid grasp on the linguistic structure of English would be useful. Counts as an ENG elective.

Attributes: Undergraduate

ENG 204 Drama (3 credits)

Critical study of various forms of drama.

Prerequisites: ENG 113

Attributes: GEP: Art/Literature, Undergraduate

ENG 205 Cultural Diversity (3 credits)

Specific focus of the course will depend on the instructor. Approaches to the issue of cultural diversity in literature may include the courses such as the following: American Voices; British Multiculturalism and the Booker Prize, or Multiethnic Literature.

Attributes: CCC: Diversity, CCC: Literature, GEP: Diversity Course, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate

ENG 206 Public Speaking & Presentation (3 credits)

A practical course in the oral presentation of carefully crafted material. Based on principles of rhetoric, new and old, the course helps students in discovering, structuring, and expressing ideas with conviction and confidence. Some attention will be given to the appreciation of significant speech texts within these rhetorical traditions. Students will make multiple presentations and engage in peer critiques. Note: Writing Intensive for Lancaster campus sections only.

Attributes: English Area 1 - Writing, BUAD FBEN LEOS ILC Area Course, Undergraduate

ENG 207 Horror in Literature & Film (3 credits)

"Horror is like a serpent: always shedding its skin, always changing. And it will always come back. Like the guilty secrets we try to keep in our subconscious, it can't be hidden away." —Dario Argento. Have you ever asked yourself: "Why do I like to be scared?" When the novel came into being in the middle of the eighteenth century, its most popular genre was the Gothic—the novel of horror. In fact, the modern era—the era of science, reason, and democracy—has been obsessed with terror, fear, and the unknown since its very inception. So, why do we like to be terrified? What is it about horror that so appeals to modern culture? We often avoid delving into such questions because they reveal to us that our pleasures often seem woefully uncivilized and unseemly. Beginning with early horror writings, the course will trace out a literary, philosophical, and filmic history by exploring how different psychological/cultural concepts of terror play out in a variety of aesthetic contexts.

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

ENG 208 Special Topics in Literature (3 credits)

Depending on the instructor, the course will focus on a particular topic of interest in literature (e.g., American West in Imagination, Psychology and Literature).

Attributes: GEP: Art/Literature, Undergraduate

ENG 209 Literature and Film (3 credits)

This course deals with film treatments of significant literary texts. Specific focus of the course depends on the instructor (e.g., King Arthur In Literature and Film, American War in Literature and Film: Vietnam to Now, Horror in Literature and Film, etc.).

Prerequisites: ENG 101

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 210 The Roaring Twenties (3 credits)

Exploration of diverse writers who were part of the "make it new" challenge in the tumult of cultural change during the 1920s in America, with particular attention given to contributions by Anderson, Fitzgerald, Millay, Cummings, Parker, Hemingway, Faulkner, O'Neill, and Hughes.

Attributes: American Studies Course, English Area 5 - American Lit, GEP: Art/Literature, Undergraduate

ENG 211 Black Popular Culture (3 credits)

Beginning with W. E. B. Du Bois's 1897 essay "The Problem of Amusement" we trace the trajectory of the literary interpretations of Black popular culture in the U.S. paying particular attention to its evolution through detective fiction, graphic novels, new media, and science fiction. Likely authors include: Kyle Baker, Octavia Butler, Chester Himes, Nalo Hopkinson, Aaron McGruder, Mia McKenzie, and Walter Mosely.

Prerequisites: ENG 101 or ENG 111 or WR 101

Attributes: Africana Studies Course, American Studies Course, GEP: Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 212 Disability & Storytelling (3 credits)

In "Disability & Storytelling," we will approach disability through an intersectional lens as we consider how memoir, fiction, poetry, and film depict disability. In the spirit of the Disability Rights Movement's call, "Nothing for us, without us," our focus will be on art produced by people from the disability community, particularly BIPOC writers like Sherman Alexie, Octavia Butler, and Junot Diaz. We will consider mental health diagnoses and cognitive differences alongside physical disabilities, and reflect on how race, class, gender, sexuality, age, and other factors affect the experience of disability. We will juxtapose the medical model of disability (where disability is a problem to be "fixed" or "cured") with the idea of disability as a social construct, and we will consider how disabled people have engaged in activism.

Attributes: Undergraduate

ENG 215 Passing Narratives - Black Lit (3 credits)

In W.E.B DuBois' 1903 foundational text *The Souls of Black Folks*, he suggests emphatically that the most significant problem for the 20th century (and beyond) will be the color line. But what about those who write across the color line? What do we do with authors who write tales that straddle, obscure, erase that line? In the US, passing has almost exclusively referred to racial passing and more specifically, Black people passing as white people. Passing is understood to occur when a person deemed a member of one racial group performs as and is recognized as a member of a different one. Literarily, its meaning, presence and articulation has been far more broad. Some authors have written passing as an act of intentionality, one designed to undermine an oppressive racial classification system that habitually denies Black people basic human, social and political rights. For other authors, passing lacks any such political frame and rather exists as a place to express the complications of an ephemeral identity. This course will examine the range of such literary expressions.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: Africana Studies Course, American Studies Course, GEP: Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 216 Re-Reading the Sixties (3 credits)

Exploration of representative texts from diverse parts of the universe-in-revision that was the 1960s—from Kubrick's *Dr. Strangelove* to Vonnegut's *Slaughterhouse-Five*; from Sylvia Plath's *Ariel* to Dennis Hopper's *Easy Rider*; from Nikki Giovanni's poetry to Bonnie and Clyde; from Tom Wolfe's *Electric Kool-Aid Acid Test* to Pynchon's *The Crying of Lot 49*. We start with "Berkeley in the Sixties," and it never ends.

Attributes: American Studies Course, English Area 5 - American Lit, GEP: Art/Literature, Undergraduate

ENG 217 The Graphic Novel (3 credits)

This course considers the defining attributes of the graphic novel—its formal limits, its contentious history, and its explosive potentials—in order to interrogate the unique ways in which this medium combines text and image to tell stories that are unimaginable in other venues. Though graphic novels have been long associated with the relatively narrow interests of twentieth-century “pulp” literature and comics—and have existed both alongside and in opposition to the counterculture and the avant-garde—the early twenty-first century has witnessed the gradual mainstreaming of the form. And just as the term itself has shifted from a defensive euphemism to a marketing label, so too has the audience for graphic novels (or comics, comix, pictorial literature, sequential art...) grown more diverse: more varied in its interests and tastes; more sophisticated in its hybrid literacies; more receptive to the medium's assimilation of new genres, experiences, and perspectives. By learning about the unique formal elements of this medium—the conventions that dictate how meaning is created through the juxtaposition of words and images—students will analyze the unique dynamics that govern our interpretation of graphic novels; meanwhile, they will consider how those dynamics have been shaped by the wider cultural developments that have defined the century-long history of this medium. To focus our work, we will follow the insights of acclaimed comics creator Art Spiegelman: “What is most interesting about comics for me has to do with the abstraction and structurings that come with the comics page, the fact that moments in time are juxtaposed. In a story that is trying to make chronological and coherent the incomprehensible, the juxtaposing of past and present insists that past and present are always present—one doesn't displace the other...” (Spiegelman, *MetaMaus* 165). Spiegelman urges us to recognize the basic “unit” of the comic as the page, widening our gazes to include multiple (often contradictory or “incomprehensible”) streams of information; moreover, Spiegelman asks us to consider how this formal “structuring” reflects both the psychic and the social experience of time and change, through the paradoxical coexistence of past and present. In successive units of the course, then, we will consider how these dynamics express human experience on a personal and a collective level, through the graphic novel's engagement with three distinct modes: auto/biography, history, and adaptation.

Attributes: CCC: Literature, CCC: Writing Intensive, Undergraduate

ENG 218 Lesbian & Gay Narrative (3 credits)

Lesbian and Gay Narrative is designed to introduce students to works by and about lesbian, gay, bisexual, transgender, and queer or questioning persons. Our survey will include works in a variety of genres: plays, novels, essays and poetry. These will come from a range of historical periods.

Prerequisites: (ENG 101 or WR 101 or ENG 111) or WR 101H

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 219 Fantasy Literature (3 credits)

Survey of the origins of fantasy, horror, and weird fiction in the mythopoeic imagination. Examines the history and themes of these genres in print and film along with their historical antecedents.

Attributes: CCC: Writing Intensive, English Area 4- British/Irish, English Area 5 - American Lit, GEP: Art/Literature, Undergraduate

ENG 220 Science Fiction Literature (3 credits)

Survey of science fiction literature (novels, short fiction, and film) from its historical antecedents to the present. Special emphasis is placed on the intersection between science fiction, scientific discovery, and ethics.

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, English Area 5 - American Lit, GEP: Art/Literature, Undergraduate

ENG 221 Weird Fiction (3 credits)

This course will explore the rise of the speculative fiction genre known as “weird fiction,” an intersectional literature that incorporates elements of science fiction, fantasy, and horror. Created and defined by H.P. Lovecraft, this literature consists of “a malign and particular suspension or defeat of those fixed laws of Nature which are our only safeguard against the assaults of chaos and the daemons of unplumbed space.” Our exploration will include Lovecraft's original weird tales but also the extended “Cthulhu mythos” in poetry, fiction, and film from the nineteenth century to the present.

Attributes: CCC: Literature, CCC: Writing Intensive, Undergraduate

ENG 222 SophSem:Critical App Lit Study (3 credits)

A seminar, ideally taken by English majors in the sophomore year, to explore a variety of significant texts in the British and American tradition, each to be examined from diverse critical perspectives, including (but not limited to) the following: formalist/New Critical, structuralist, New Historicist, feminist, deconstruction/poststructuralist, Marxist, psychoanalytic, race/ethnic/postcolonial studies.

Restrictions: Enrollment is limited to students with a major in English - Secondary Education or English.

Attributes: English Literary Theory, English Lit Theory/Pedagogy, Undergraduate

ENG 223 Global Irish Lit (3 credits)

This course will introduce you to some of most famous authors of the early twentieth-century Irish literature – James Joyce, W.B. Yeats, and Samuel Beckett – who later became renowned writers and global ambassadors of Ireland and Irishness. We will read a selection of their works and study the way in which these texts have been received, circulated and consumed around the world. In the second half of the course, we will study famous contemporary Irish authors who, in turn, have set their novels outside the nation-space of Irish literature.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 224 Intro to Irish Literature (3 credits)

This course will introduce you to Ireland and Irish literature by focusing on two important events– the Great Famine and the Celtic Tiger era (1995-2008). We will study the Famine from a contemporary perspective: our focus will be on contemporary Irish authors – and also some world-famous singers! - who have used the Famine in order to talk about issues of immigration or to make sense of the reverberations of the 2008 financial crisis. This is the perfect course to get acquainted with Irish literature and Ireland!

Prerequisites: ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 225 Ireland in Lit and Film (3 credits)

In this course, we're going to study Ireland through film and literature. We'll focus on some of the key issues/events/experiences in Irish history such as the Troubles, Easter 1916 and the Magdalen Laundries' scandals. While analyzing recent Irish films and literary works, we shall consider the following questions: how does our reading and understanding of the same event changes when it is being portrayed via a different medium and/or in a different genre? What can be communicated via a documentary and how does a work of literary fiction complicate and/or challenge the representation put forward by a documentary film or drama? What does a comedy allow us to see about the (tragic) past? While we will definitely watch and analyze *Derry Girls*, this course endeavors to introduce you to many new Irish films, novels, and TV series!

Prerequisites: ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 226 Brit/Irish Detective Fiction (3 credits)

By focusing on the representative detective novels of 20th- and 21st-century Britain and Ireland, this course charts popular culture's complex and often contradictory influence on representations of class, gender, and disability. Starting with the 'Golden Age' of detective fiction in interwar Britain, this course will consider the rise of feminist crime fiction as well as questions of national and post-imperial identities in British and Irish detective novels.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Diversity, GEP: Diversity Course, English Area 4- British/Irish, English Diversity, English Diversity, Gender Studies Course, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 227 Shakespeare at his Peak (3 credits)

This course will begin with *Hamlet* – the first of Shakespeare's so-called 'great tragedies.' From there, it will proceed through a selection of problem comedies, tragedies, Roman plays, and romances. Throughout the semester, we will interrogate Shakespeare's construction of the individual and history, art and life, family and state, and particularly the intricate nexus of power, performance and self-consciousness in these plays.

Prerequisites: ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 228 Shakespeare's Comedy&History (3 credits)

This course focuses on the histories and romantic comedies written in the first half of Shakespeare's career (through about 1599). Throughout the semester, we will interrogate Shakespeare's construction of the individual and history, art and life, family and state, and particularly the complicated nexus of power, performance and self-consciousness in his plays and poems.

Prerequisites: ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 229 The Sonnet (3 credits)

For some, the sonnet form epitomized a revolution – the shift from a communal world of the Middle Ages to the Renaissance, a rebirth of the individual. The fourteen-line form, with its not-quite-mid-poem shift of direction, revealed and, for some, may even have created modern mind in its depiction of torturous action. We will examine its origins in love poetry and its very different modern uses, attentive to the politics of the form and its technical aspects, as well as how it has seemed to define kinds of people and kinds times. We will also attend to dissenting voices that question the sonnet's uniqueness and its place in apparently transformative movements.

Prerequisites: ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 230 Creativity (3 credits)

Nobel Prize-winning neuroscientist Eric Kandel argues that our brains are "creativity machines," ultimately and efficiently designed for problem-solving. This course will explore the landscape of creativity, or the space between complex challenges and innovative solutions. Through experiential exercises, case studies, intensive writing exercises, and course projects, students will learn how to identify and re-frame problems, how to generate and test ideas, how to challenge assumptions, and how to tell a compelling story to communicate ideas.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 231 Master Builders (3 credits)

Using the lens of literature, this course explores how the built environment—from the Great Pyramids to modern-day skyscrapers—reflects and projects our personal and cultural history, values, and vision. Part environmental studies, part literature and writing studies, and part visual rhetoric, this course re-envision the very concept of literature and "text" and asks: How do architectural works emerge from a culture's values? How might they mirror society's hierarchy or the challenges to that hierarchy? How might the culture's "architects"—writers, leaders, builders, or artists—suggest or impose a future onto a society—political, spiritual, ethical, or otherwise? Finally, how do different genres of writing and literature—from nonfiction autobiography to drama and poetry—offer us a framework for addressing the global and personal challenges that await us?

Attributes: GEP: Art/Literature, Undergraduate

ENG 241 Creative Writing: Intro Wrkshop (3 credits)

Exploration of at least two creative genres (fiction, nonfiction, poetry, plays). For models and inspiration, students will examine selected works by contemporary creative writers in varied styles. Writing workshop format.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 243 Madness in Literature (3 credits)

This course examines how madness, broadly defined, has been depicted in literature, using works of fiction, nonfiction, and poetry from various historical periods. We will critically examine how madness is both a recognizable clinical entity and a social construction, and how literary works have effectively shaped our understanding of it. We will look at the changing conceptions of madness in literature, the historical, cultural, and medico-legal contexts that influenced those changes, and, in short, try to make some sense of madness by understanding how it was perceived by writers old and new. Through class discussion and scaffolded writing assignments (including multiple drafts, peer reviews, and workshops) we will examine both the production and reception of the literature of madness, focusing on how notable texts about madness were produced and received, the connection between creativity and madness, and the diversity of human experiences when it comes to the spectrum of mental health. We will explore a variety of genres (play, poetry, short story, novel, memoir, case study) by diverse authors ranging from ancient to contemporary.

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

ENG 261 News Reporting (3 credits)

This course introduces students to reporting and writing for the news media. In frequent assignments throughout the semester, students will practice the basic principles of journalism with an emphasis on structure, accuracy, clarity and style - key for journalists working in any medium. They will gain experience in story pitching and development and in news gathering methods, including interviewing, fact gathering and fact checking. Additionally, students will study timely topics related to journalism ethics and the law as well as journalism's transition into the digital age. While this course is based in the classroom, students are expected to learn and adhere to professional newsroom standards.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, English Journalism Track, Undergraduate, GEP: Writing Intensive

ENG 263 Writing for Organizations (3 credits)

Comprehensive examination of various forms of writing that are produced in managing organizations, including email, memoranda, letters, reports, brochures, guidelines, and slide share presentation materials.

Prerequisites: ENG 101 or WR 101 or ENG 111 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, Undergraduate, GEP: Writing Intensive

ENG 264 Scientific Writing (3 credits)

This course introduces students to writing in the empirical and health sciences, with particular focus on clinical research and the scientific method. Students learn to write scientific reports, review essays, literature reviews, scientific articles for publication, and informal science articles. Additionally, students learn about the research and publication cycles of the scientific community as well as how to present papers and posters at conferences.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, Undergraduate, GEP: Writing Intensive

ENG 265 Writing for Public Relations (3 credits)

This course introduces students to the basic strategies and techniques of public relations writing through the creation and evaluation of a variety of materials commonly used in PR. Students will gain core knowledge of the following: AP style, branding, crisis communication, social media (Facebook, Twitter, and LinkedIn), audience targeting, blogging, media kits, media tracking, fact sheets, press releases, feature articles, and brochures.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: English Area 1 - Writing, Undergraduate

ENG 267 Negotiations, Writing & Conflict (3 credits)

The course involves students in an eclectic writing process that includes legal research, conflict analysis and public speaking. Modeled in part upon the Harvard Negotiation Project's Getting To Yes methodology, the course also involves newly emerging practices that challenge the notion of argument and encourage exchange between disputing parties. The thesis of the course is that, when individuals embroiled in a conflict begin to hear and understand one another's stories, they have the option to change and to grow. Although courtrooms and trials will be examined, quite unlike a law course, the format for our class includes dramatic performance, passages from fiction and poetry as well as essays to reveal the common sense that can provide peace between warring interests. The focused goal of this sequence of readings, dramatic exercises and writing is for each student to evolve and to articulate communication strategies for crisis situations.

Attributes: English Area 1 - Writing, Undergraduate

ENG 268 Fact-checking and Fake News (3 credits)

With daily charges of "fake news" flying off the tongues of politicians and citizens alike, there has never been a better time to learn how to be a fact-checker. In this course, students will dabble in the art of fact-checking and arm themselves with media literacy tools to help them discern fact from fiction. In addition to the required course texts, students will read articles and analyses, listen to podcasts and watch films that will provide fodder for discussions about the fake news debate that occupies the current moment in history.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Writing Intensive, English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 269 Intro Media & Cultural Studies (3 credits)

This course focuses on the fundamentals of how mass media operate in America, and globally. Students will cover three broad areas: media production, distribution, and consumption. Specifically, students will acquire knowledge of media as a cultural commodity, and explore the ethical dimensions of its impacts in the production of global culture. Students will use the assigned texts as a guide to understand the complex connections between media, culture, and economics. Students will apply knowledge of how media operates, in order to analyze and evaluate the latest media developments and ongoing coverage of the political, economic and cultural issues affecting contemporary media culture.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 270 Special Topics in English (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENG 275 Time (3 credits)

This course provides an introduction to the various ways that human beings have encountered the problems of time in literature and theory, considering perspectives drawn from mathematics, science, religion, art, and philosophy from multiple cultures in an effort to understand how and why time both rules our lives and escapes our grasps. Because this course is meant to facilitate a complex inquiry into both historical and present-day understandings of time, course requirements prioritize active participation, close critical analysis of texts, sustained, thesis-driven writing assignments, and short presentations.

Attributes: CCC: Literature, CCC: Writing Intensive, English Literary Theory, English Lit Theory/Pedagogy, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate

ENG 290 Professional Prep Seminar (1 credit)

What can you do with a degree in English? Do you know how to search for an internship or a job? Are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance your knowledge about internships and careers within your major and help you build practical skills through class instruction, assignments, and alumni exposure throughout the semester. This one-credit course meets once a week through the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication and networking/interviewing.

Attributes: Undergraduate

ENG 301 Middle English Literature (3 credits)

This course will provide an overview of Middle English literature, excluding Chaucer, by beginning with the earliest Middle English texts and ending with Sir Gawain and the Green Knight. We will focus on language, translation, and close reading to start, with the goal of arriving at a broader consideration of the Middle English literary tradition and its role in the creation of English literature as we now know it.

Attributes: English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ENG 302 Renaissance Non-dramatic Lit (3 credits)

Was the Renaissance the age of the individual? Was poetry - the dominant literature of the day - a means to power, a force for good or instead a corrupting agent? This course will consider divergent views on the English Renaissance alongside major works by authors such as Sidney, Spenser and Milton.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Literature, English Area 4- British/Irish, English Early Lit, GEP: Ethics Intensive, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ENG 303 Renaissance Drama (3 credits)

A study of the drama of Tudor and Jacobean England, excluding Shakespeare. The plays of Marlowe, Jonson, Webster, and Ford and their distinctive dramatic qualities will be emphasized.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Literature, English Area 4- British/Irish, English Theatre/Drama, English Early Lit, GEP: Ethics Intensive, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ENG 304 Global Shakespeares (3 credits)

Shakespeare's plays have been staged around the world, made into novels, films, ballets, musicals, and operas, set in the Wild West, medieval Japan, fascist Italy, and on fictional planets, blended with Bollywood Cinema, Chinese Opera, Zulu dance and Japanese Noh Theater. What do global artists gain from Shakespeare's works? Studying a handful of Shakespeare's plays directly, we pay particular attention to race, gender, disability, and religion – issues that are often foregrounded or altered in adaptations. We also deal with the racism, misogyny, ableism, colonialism and anti-Semitism and the real-world violence behind these representations. This lays the groundwork for our study of adaptations from around the world. Some suggest that the Western canon, with Shakespeare at its center, has been used as tools of cultural oppression; might reinventions of Shakespeare be seen as acts of liberation or rebellion? This course participates in the new major and minor in Global Literatures.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, English Diversity, English Diversity, GEP: Art/Literature, GEP: Globalization Course, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 305 Eighteenth Century English Lit (3 credits)

This course deals with the literature of the Restoration and eighteenth-century, a time of intellectual, cultural, and political revolutions. Among the writers who may be studied are Behn, Dryden, Swift, Pope, Haywood, Defoe, Richardson, Fielding, Johnson, Sterne, Burney, Inchbald, and Wollstonecraft. Depending on the instructor, the course may focus on a particular genre or it may deal with a specialized topic, such as "The Rise of Gender in the Novel," "The Idea of Authorship in the 18th Century," or "The Satiric Mode."

Attributes: English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Undergraduate

ENG 306 Nineteenth Century English Lit (3 credits)

Depending on the instructor, the course may be focused in a variety of ways, all exploring different developments in literature in England in the 19th Century (Major Romantic Poets, The Nineteenth-Century English Novel, Rebels-Reactionaries: Victorian Literature).

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Undergraduate

ENG 307 Modernism: British & Irish Lit (3 credits)

A study of representative authors of British and Irish Modernism, including Auden, Conrad, Eliot, Forster, Joyce, Lawrence, Woolf, and Yeats. Depending on the instructor, this course may also explore works by Bowen, Ford, Lewis, Moore, O'Brien, Wilde, or other authors.

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Undergraduate

ENG 308 Global Literary Marketplace (3 credits)

This course will give you an opportunity to consider contemporary literature from a new and exciting perspective: we will focus on marketing and the making of the literary canon, and each text in our reading list will facilitate a case study of a different aspect of literary marketing and/or publishing. We will examine the rise of international publishing conglomerates and indie presses and will study review and “list” cultures. We will consider the role of literary magazines but also GoodReads and (the former?) BookTok as well as its replacement(s), all the while querying how race, class and gender impact authors on the global literary marketplace. While we will read all the assigned books from cover to cover, we will also scrutinize the actual covers of these books: how do blurbs, endorsements from other writers and the actual cover designs influence our reading of these novels? Finally, we will analyze international book prizes and we will talk about the economy and geography of prestige that these prizes carry, especially in the global context.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, English Area 4- British/Irish, English Diversity, English Diversity, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 309 British/Irish Immigration Lit (3 credits)

Focusing mainly on postwar Britain and Ireland and the changing immigration policies of these countries, this course investigates how economic conditions as well as historical and political events such as 9/11 and/or Brexit have influenced nationalism, gender, race and language at the end of the 20th and the start of 21st century.

Attributes: CCC: Diversity, GEP: Diversity Course, English Area 4- British/Irish, English Diversity, English Diversity, Gender Studies Course, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 310 20th Century Irish Literature (3 credits)

Investigates crucial authors and stages in the development of Irish literature in English from the period of Gregory, Joyce, O'Casey, Synge, and Yeats, through the mid-century period of Beckett, Behan, Bowen, Kavanagh, and O'Brien, to works by late twentieth-century authors (for example, Banville, Boland, Carr, Enright, Friel, and Heaney)

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Undergraduate

ENG 311 21st Century Irish Literature (3 credits)

This course will introduce you to the best, the brightest and the loudest voices in today's Irish literature. We will read a wide variety of authors, among whom you will find more established names such as Martin McDonagh and his wickedly funny and startlingly original drama; Tana French, whose recent success has put Irish crime writing on the world (literary) map; and Ireland's first fiction laureate, Anne Enright. While exploring questions of nationalism, immigration, gender and identity, we will also study the most recent works of Irish literature, which have shaken and stirred the reading public over the course of the last couple of years.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 312 Modern Irish Drama (3 credits)

Irish theatre is haunted by the idea of nation. This course will examine issues of national and sexual politics and identity with attention to some of the most well-known playwrights in the history of Irish theatre - including but not limited to W.B. Yeats, Lady Gregory, Samuel Beckett, Brian Friel, Martin McDonagh, and Marina Carr.

Attributes: CCC: Diversity, CCC: Literature, GEP: Diversity Course, English Area 4- British/Irish, English Diversity, English Diversity, Gender Studies Course, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 313 Cont Irish Women's Writing (3 credits)

Designed to give you an overview of contemporary Irish women's writing, this course will explore the thematic nexus of gender, class, disability, migrancy, immigration, and reproductive justice. In doing so, it will pay considerable attention to Ireland's history of institutionalizing women in Magdalen laundries, asylums and mother-and-baby homes. This course will showcase some of the most vibrant voices in contemporary Irish writing, including but not limited to Anne Enright, Marina Carr, Sally Rooney and Anna Burns.

Attributes: CCC: Diversity, GEP: Diversity Course, English Area 1 - Writing, English Area 4- British/Irish, English Diversity, English Diversity, Gender Studies Course, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 314 Irish Environmental Writing (3 credits)

Ireland's colonial history and its current, intense focus on the commercial or market value of land and landscape, have transformed the Irish relationship with land and the environment. In Ireland (as elsewhere), environmental decisions are all too often justified by the need to satisfy economic and business decisions that are deemed to supersede environmental concerns. While considering such moral quandaries produced by the age of Anthropocene, this course will focus on their literary representations in recent Irish novels, plays and poetry.

Attributes: CCC: Mission: Ethics Social Justice, English Area 4- British/Irish, English Literary Theory, English Lit Theory/Pedagogy, GEP: Ethics Intensive, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 315 Literature of South Asia (3 credits)

This course examines contemporary fiction and film from the Indian subcontinent (primarily India, but with some focus on Pakistan as well).

Works studied include both Anglophone texts and texts in translation read alongside major events of twentieth- and twenty-first century South Asian history, particularly Independence and Partition. Featured authors may include Mulk Raj Anand, Saadat Hasan Manto, R.K. Narayan, Arundhati Roy, and Salman Rushdie.

Attributes: Asian Studies Course, English Area 4- British/Irish, English Diversity, English Diversity, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ENG 317 Literature of South Africa (3 credits)

This course provides a historical view of South African literature, focusing on apartheid, its segregationist precedents, and its present-day legacies. Utilizing novels, historical and legal documents, and creative nonfiction, as well as short fiction and film, the course introduces students to the writings of South Africans who represent diverse subject positions and experiences, but who are all united in the common goal of re-examining and working through South Africa's traumatic past.

Attributes: Africana Studies Course, CCC: Diversity, CCC: Literature, English Area 4- British/Irish, English Diversity, English Diversity, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

ENG 319 Postmodernism (3 credits)

Engagement with a wide range of writers whose work represents both radical extension and rejection of the earlier modernist movement, with exploration of texts by Fowles, Barth, Barthelme, Calvino, Heller, Vonnegut, Pynchon, Smith, Eggers.

Attributes: GEP. Art/Literature, Undergraduate

ENG 320 Contexts of Faith in Modern Lit (3 credits)

This course examines representations of religious faith in a variety of literary genres (fiction, drama, poetry, film) from the 20th century to the present. Students will consider to what extent the texts studied reflect and develop traditional expressions of religion and the degree to which they engage readers in an evaluation of faith as a source of knowledge.

Prerequisites: THE 153 or THE 154 or THE 155

Attributes: English Area 5 - American Lit, Undergraduate

ENG 321 Early American Literature (3 credits)

A study of the literary genres that emerged from the colonization of North America and the establishment of the federal republic of the United States, with a focus on the role of literature in defining American national identity. Readings will include histories, journals, sermons, poems, autobiographies, and novels by authors including John Winthrop, Anne Bradstreet, Mary Rowlandson, Benjamin Franklin, Olaudah Equiano, Nathaniel Hawthorne, Harriet Beecher Stowe, as well as explorers, Indigenous people, and other early national authors.

Attributes: American Studies Course, English Area 5 - American Lit, English Early Lit, GEP. Art/Literature, Undergraduate

ENG 322 American Romantic & Transcendental Lit (3 credits)

An in-depth study of the writers associated with the Transcendentalism and the social reform movements they inspired, including abolition, women's suffrage, labor reform, and projects of associated living. Authors considered include Ralph Waldo Emerson, Margaret Fuller, Frederick Douglass, Henry David Thoreau, Nathaniel Hawthorne, Herman Melville, and Walt Whitman. A variety of critical and creative writing assignments will provide opportunities for us to reflect on how matters of race, gender, class and ethnicity continue to affect perceptions of democracy today.

Attributes: American Studies Course, English Area 5 - American Lit, English Early Lit, GEP. Art/Literature, Undergraduate

ENG 323 American Literature 1865-1915 (3 credits)

A survey of American literature between the Civil War and World War I, from realism to naturalism, with consideration of such writers as Twain, Howells, James, Crane, Dickinson, Robinson, Cable, Wharton, Norris, and Dreiser.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 324 Twentieth Century American Lit (3 credits)

An exploration of a century of dramatic change in the American literary landscape—from Dreiser's *Sister Carrie* to Toni Morrison's *The Bluest Eye*; through poets as diverse as E. E. Cummings, Allen Ginsberg, and Rita Dove; with options that may include key work from William Faulkner, Richard Wright, Sylvia Plath, Don DeLillo, and Louise Erdrich.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 325 Contemporary American Lit (3 credits)

An exploration of representative American works (creative non-fiction, fiction, poetry) from the past 25 years— including books from Jhumpa Lahiri, Joy Harjo, Tobias Wolfe, Junot Diaz, Mark Doty, Kevin Powers, David Eggers and Cheryl Strayed.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 326 American West in Imagination (3 credits)

With a mix of literary and film texts, this course explores the impact of the West in shaping the American character and sense of identity. From Mark Twain's "Roughing It" in the 19th Century to "Butch Cassidy and the Sundance Kid" and "Legends of the Fall" in the 20th Century, the West has provided dramatic stimulation for remarkable works of human imagination.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 327 Southern Literature (3 credits)

An overview of Southern literature from the nineteenth century to the present, with consideration of both poetry and fiction. Selected authors may include Poe, Twain, Faulkner, Welty, Warren, Taylor, Styron, Smith, Edgerton, and McCorkle.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 328 African American Literature (3 credits)

This thematic survey explores how African American authors write about what it means (and has meant) to be a Black person in the U.S. Exploring poetry, autobiography, drama, short stories, novels, essays, and films, we grapple with the multifaceted experiences of "Blackness" in literary texts produced from the era of slavery to the present. Through our reading we develop an understanding of specific African American literary traditions.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: African American Studies Course, American Studies Course, GEP. Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 329 Black Women Writers (3 credits)

Linked by history, race, gender, and fate, but arguably little else, how do Black women writing in the U.S. write themselves into the idea of America? This course examines exclusively Black women's literature in order to answer this question. Covering a minimum of three traditional African American literary periods, students are positioned to question notions of privilege and power driven by the intersectionalities of gender and race.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: African American Studies Course, American Studies Course, GEP. Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, Gender Studies Course, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 330 Caribbean Lit in English (3 credits)

This course explores the intersectionalities of racial, ethnic, and linguistic identities within Anglophone and Francophone Caribbean literary traditions. In dialogue these literary traditions complicate a monolithic Caribbean narrative. With careful study of language, class, color, and identity we determine how authors contend with and memorialize French, British, and American imperialisms in the Caribbean. Likely authors include Michelle Cliff, Edwidge Danticat, Merle Hodge, Thomas Glave, George Lamming, and Jamaica Kincaid.

Attributes: GEP. Art/Literature

ENG 331 Modern Drama (3 credits)

Major English and continental dramatists of the modern period from Ibsen to the present; a survey emphasizing not only major writers but also significant changes in dramatic form.

Attributes: CCC: Writing Intensive, English Theatre/Drama, GEP. Art/Literature, Undergraduate

ENG 332 Playwriting (3 credits)

This course offers students the experience of creating original material for stage presentation, with particular focus on the one-act play structure and concern for character, scene, and plot development.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, English Theatre/Drama, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 333 Read, Write, Adapt Theatre Drama (3 credits)

Examination of the diverse functions of the dramatist developing background perspective for bringing dramatic texts to the stage, adapting various texts for stage presentation, writing interpretive notes for staged productions. Students will adapt literary texts for Reader's Theatre performance.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, English Theatre/Drama, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 334 Cont. Amer. Women Playwrights (3 credits)

This course is a survey of major American women playwrights from 1975 to the present. We will read plays by a diverse group of writers including Shange, Wasserstein, Henley, Vogel, Nottage, Ruhl, Baker, Gionfriddo, Izuka, Kron, and others.

Prerequisites: ENG 101 or ENG 111 or WR 101H

Attributes: American Studies Course, CCC: Diversity, CCC: Writing Intensive, GEP: Diversity Course, English Area 5 - American Lit, English Theatre/Drama, English Diversity, English Diversity, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 341 Poetry Workshop (3 credits)

Exploration of poetry by reading and writing. Each student will be responsible for creating a set of poems. Writing workshop format.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature

ENG 342 Fiction Workshop (3 credits)

Exploration of fiction by reading and writing. Each student will be responsible for creating a set of stories. Writing workshop format.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 343 Creative Nonfiction (3 credits)

Exploration of creative nonfiction by reading and writing, with particular focus on the form of the personal essay. Each student will be responsible for creating a set of essays. Writing workshop format.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Diversity, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 344 Screenwriting (3 credits)

Exploration of screenwriting in a workshop format with consideration of the whole process involved in development of screen projects, including feature-length film projects.

Attributes: English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 345 Tutor Prac, Writ Cntr Thry Pr (3 credits)

This course introduces students to writing center history, theories, and practices. Readings include landmark and contemporary texts about writing pedagogy in general and the tutoring of writing specifically. Additionally, students study issues and strategies of relevance to ESL writers for whom English is not their first or home language. Students are introduced to the practices of peer tutoring through class discussions and through observation and tutoring in the University Writing Center. Upon successful completion of this course, they are eligible to be hired in subsequent semesters as writing tutors. Open to students from all majors who are interested in writing and/or the teaching of writing. Permission of instructor required.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Writing Intensive, GEP: Diversity Course, English Area 1 - Writing, English Diversity, English Diversity, Undergraduate, GEP: Writing Intensive

ENG 346 The Art of The Interview (3 credits)

In this course students will learn and practice interviewing skills. The reason the word art is included in the title of this course is that a good interview is just that: a work of art, one that involves creativity and deep thinking. It also requires curiosity and active listening and the ability to read people. Good interviewers do their homework before they ask questions, but they also know how to think quickly on their feet, crafting new questions, following new trails, depending on where the interview takes them. They know when to push their subjects and when to pull back and how to balance easier questions with the hard ones. They understand the power of both words and silences. If this sounds intimidating, remember: As with any skill, practice is key. The more interviews you do, the more comfortable you will become doing them.

Prerequisites: ENG 101 or WR 101

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 350 Advanced News Reporting (3 credits)

This course is an upper-level reporting class that allows students to further enhance their pre-reportorial research, reporting and storytelling skills. Students will learn how to dig up story ideas from beats they develop, crowd source, file FOIA requests, pull police/courts documents, and distill an academic report or scientific study into 300 words for a quick web post, among others. They will also explore and practice using advanced digital reporting tools.

Prerequisites: ENG 261

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 360 Feature Writing (3 credits)

At its most basic definition, feature writing is journalism that tells a story—generally, the kind of story that you don't soon forget, that lingers for many moments, or days, or years after you first encounter it. In this course, students study outstanding examples of feature stories and multimedia feature packages. From those examples, they learn how to combine the best reporting practices with the best storytelling practices in order to produce their own powerful features that marry in-depth reporting and research with captivating and creative storytelling skills. Students should have taken ENG 261 or have prior journalism experience before enrolling in this course.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, English Journalism Track, Undergraduate, GEP: Writing Intensive

ENG 362 Photojournalism (3 credits)

This is an introductory course in photojournalism presented in a multimedia context. Students will be required to have access to either point-and-shoot cameras or (ideally) DSLR camera kits. The course will be taught as a hands-on workshop. Instruction will progress from basic camera operation and single image assignments to more comprehensive visual storytelling.

Attributes: English Area 1 - Writing, English Journalism Track, GEP: Art/Literature, Undergraduate

ENG 363 Sports Journalism (3 credits)

This hands-on, multimedia course covers all aspects of current sports journalism, from reporting and telling stories in print and broadcast media as well as in blogs, podcasts and social media. In addition to learning how to break news across multiple platforms, students will practice the kind of in-depth reporting and compelling storytelling that leads to profiles and full-length features. Students should have taken ENG 261 or have prior journalism experience before enrolling in this course.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 364 Stunt Journalism (3 credits)

In 1887, when journalist Nellie Bly feigned madness in order to get herself locked up in the Women's Lunatic Asylum on Blackwell's Island in New York, stunt journalism wasn't yet a brand. But the kind of immersive, investigative journalism that Bly did would soon become a way for journalists and newspapers to grab headlines, increase circulation and even affect real social change. Nowadays, serious stunt journalism is more commonly referred to as "immersion journalism" while some of the less serious attempts are questionably journalism at all. No matter what you call it, stunt journalism differs from traditional journalism in this significant way: The journalist deliberately becomes a part of the story—and often in disguise in order to tell it. In addition to required readings, students will produce significant works of stunt journalism that, at least on a smaller scale, mirror the challenges of the stunt journalist.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 365 Multimedia Journalism (3 credits)

Multimedia journalism is a foundational course in audio-visual storytelling. The course will provide an overview of the language and theories of audio-visual communication, and introduce skills to produce news narratives for radio, television, and online news reporting. In this course students will learn the vocabulary of multimedia production and editing, use audio-visual production techniques to produce multimedia stories, and learn methods to critically evaluate audio-visual narratives.

Attributes: CCC: F&P Arts, Design & Creative, English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 370 Independent Study: Jr. Level (3 credits)

The chief purpose of the junior-level independent study project is for the student to acquire knowledge in a particular area of literature (reading and research project) or to produce a substantial piece of writing, either creative or discursive (writing project). For the reading and research project, the student will develop a course of study with the project director that may utilize audiovisual as well as printed material. In addition to a reading program, the student will write a substantial paper that develops from that reading program; the paper should use primary texts and have a textual perspective—historical, critical, aesthetic, or mythic. For the writing project, the student will develop a program of reading and writing with the project director. Minimum GPA of 3.0 (or cumulative average of 3.4 or higher for courses in the major field).

Attributes: GEP: Art/Literature, Undergraduate

ENG 377 Inside-Out (3 credits)

This class offers a unique opportunity to have meaningful discussions about a range of topics from inside a correctional facility. Inside-Out classes bring together students from Saint Joseph's University and adult students who are incarcerated to learn about and discuss topics such as the causes of crime, racism, literature, philosophy, and restorative justice. Through the readings and dialogue, inside and outside students will be able to integrate their theoretical knowledge with lived experiences. It is through this exchange that we hope to critically analyze and challenge the current system in the U.S. that has resulted in a higher incarceration rate than other similar countries.

Prerequisites: PHL 154

Attributes: Criminal Justice Course, Faith Justice Course, GEP: Art/Literature, Justice Ethics and the Law, GEP: Phil. Anthropology, Service Learning Course, Undergraduate

ENG 383 Seminar in Rhetorical Theory (3 credits)

Focused examination of some key factors in rhetoric over the ages: for example, invention strategies, the ethics of writing, methods of delivery.

Attributes: English Area 1 - Writing, Undergraduate

ENG 384 The Essay (3 credits)

A comprehensive study of the essay form through time, with special concern for identifying forces of change upon the style and function of the essay within selected cultural contexts.

Attributes: English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 401 Chaucer & the Medieval World (3 credits)

An examination of the development of various medieval narrative forms, including the romance, and the climax of their development in the poetry of Geoffrey Chaucer. The major historical focus will be on work written in England from 1300 to 1485; there will be some continental material included.

Attributes: English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ENG 402 Shakespeare (3 credits)

An exploration of some aspect of Shakespeare's literary career. Topics may include "Comedy & History" "Tragedy & Romance," or "Sonnets & Poems," or may involve specific themes.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 403 Shakespeare and Race (3 credits)

This course considers race in the Renaissance through Shakespeare's plays, five of which involve people of color: Cleopatra and the Egyptians at her court in Antony and Cleopatra; Aaron in Titus Andronicus; the Prince of Morocco (and, arguably, Shylock) in The Merchant of Venice; Othello in Othello; and Caliban in The Tempest. We may also read Shakespeare's "dark lady" sonnets, literary criticism, and/or additional plays by Shakespeare and his contemporaries, including Christopher Marlowe.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, English Diversity, English Diversity, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 404 Eng,Irish,Anglophone Authors (3 credits)

An in-depth study of one to two significant authors of a particular period, the choice to be made by the instructor.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: Mission: Ethics Social Justice, CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, GEP: Ethics Intensive, GEP: Art/Literature, Irish Studies Course, Undergraduate, GEP: Writing Intensive

ENG 405 Early Tudor Gender Power & Lit (3 credits)

Anne Boleyn was the most consequential queen in English history. To marry her, Henry VIII created the Church of England and forced his subjects to swear oaths confirming his control over it and their own allegiance to Anne and her heirs. Those who refused - including Thomas More - faced imprisonment and death. Anne reigned barely a thousand days before her execution for adultery. This course is about Anne, Henry VIII, the politics of their world and the literature by and about their court - including the poetry kept and commented upon by Anne's female friends and relatives.

Prerequisites: (ENG 101 or WR 101 or WR 101H or ENG 111)

Attributes: CCC: Mission: Ethics Social Justice, CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, English Early Lit, GEP: Ethics Intensive, GEP: Art/Literature, Justice Ethics and the Law , Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

ENG 406 Race in the Middle Ages (3 credits)

The medieval period is thought of as a time before concepts of race emerged - before the horrors of the Atlantic slave trade, before European colonialism, before scientific racism. It continues to be used to justify the modern phenomena of racialized nationalism and ideologies of whiteness. This course examines some of the stories, images, ideas, and institutions of medieval England. We will ask how race aids our thinking about the way human difference is articulated and how it operated in the Middle Ages. Some readings will be in Middle English; others will be modern English translation. No previous experience with medieval literature is expected.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, English Area 4- British/Irish, English Early Lit, English Diversity, English Diversity, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ENG 407 20th/21st Cent. British Novel (3 credits)

Focusing on the study of major developments in British fiction from World War I to Brexit, this course will analyze issues of globalization and Britain's role in the globalized world. Focusing on issues of nation and nationality, of Britishness and history, the course will investigate the state of the nation in what has been seen as a far-reaching identity crisis and/or a massive inferiority complex. The authors may include Woolf, Forster, Lawrence, and, depending on the instructor, also Fowles, Spark, Ishiguro, Ali Smith and others.

Attributes: English Area 4- British/Irish, GEP: Art/Literature, GEP: Globalization Course, Undergraduate

ENG 409 Art Ethics Irish Troubles Lit (3 credits)

This course explores how various Irish (and English) novelists and short-story writers have depicted in fiction "the Troubles"-a protracted period of politically-motivated violence in Northern Ireland, Great Britain, and the Republic of Ireland, which began in the late 1960s and has not fully ended today. By identifying the stories' aesthetic and ethical dimensions and their social and political contexts, we shall examine both the representation of violence and the potential violence of representation. Key questions include: What is the role of the artist in representing politically motivated and other types of violence? Should artists offer solutions or only pose problems? What are the aesthetical and ethical stakes of making art out of atrocity?

Attributes: CCC: Literature, CCC: Writing Intensive, English Area 4- British/Irish, GEP: Ethics Intensive, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 410 Irish Gothic Fiction (3 credits)

Interrogating issues of genre and historical context, this course traces the evolution of Irish gothic and ghost stories from the early nineteenth century to the present.

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Irish Studies Course, Undergraduate

ENG 411 Black British Literature (3 credits)

This course focuses on narrative and criticism by Black British writers since the 1948 arrival of the Empire Windrush. We examine the way "Blackness" in Britain has been called upon to both unite and exclude while exploring the contested perception that Black experience in Britain should be examined solely in terms of race and identity. Likely authors include: Sam Selvon, Kwame Kwei-Armah, Jackie Kay, Andrea Levy, Caryl Phillips, and Zadie Smith.

Attributes: English Area 4- British/Irish, GEP: Art/Literature, Undergraduate

ENG 414 Modern and Contemporary Epic (3 credits)

This course examines the attempts of four long novels from the twentieth and twenty-first centuries to recapture the epic tradition in the form of the modern novel: the modernist epic, the postcolonial epic, the postimperial epic, and the epic of globalization. During the semester, we will discuss how modern and contemporary authors depict how individuals can imagine connections and responsibilities to one another while undergoing rapidly changing notions of community, national belonging, and global citizenship.

Attributes: English Area 4- British/Irish, GEP: Ethics Intensive, GEP: Art/Literature, GEP: Globalization Course, Undergraduate

ENG 415 Postcolonial Studies (3 credits)

An examination of diverse literary texts, films and theoretical essays that engage the idea of "post colonialism," the circumstances and effects of one nation having sovereign power over another. We will emphasize works with a relationship to the British Empire (e.g., Forster, Conrad, Rushdie, Collins, Dickens, Joyce, Winterson), but we will not be limited to this particular historical context.

Attributes: Africana Studies Course, Asian Studies Course, GEP: Diversity Course, English Area 4- British/Irish, English Diversity, English Diversity, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

ENG 416 Rebellious Women Writers (3 credits)

This course explores how British and American women of the late seventeenth to early twentieth centuries used writing to rebel against the status quo. We will examine both the historical circumstances in which women found themselves and the literary production that resulted. We will examine a wide variety of women's texts— narrative fictions, poetry, political polemics, conduct books, letters, autobiographies, social theories, sermons, and protest leaflets—and we will discuss the effects of these different responses to women's plight. We will look closely at the influences that British and American writers exerted upon one another. *Attributes:* American Studies Course, GEP. Diversity Course, English Area 4- British/Irish, English Area 5 - American Lit, English Early Lit, English Diversity, English Diversity, Gender Studies Course, GEP. Art/Literature, Undergraduate

ENG 417 Post-Soul Black Literature (3 credits)

Many believed that the 1964 Civil Rights Act would usher in a radically different era of freedom and opportunity for all Black Americans, ultimately improving their quotidian experiences with racism. This has not proved true. In this course, we will approach the study of Black literature by understanding that, in some ways, life informs art and/or the artists who create it. We will read literature and theory written after the signing of the Civil Rights Act identifying common themes, styles, imagery and artistic strategies emerging from what literary critic Mark Anthony Neal has termed the "post-soul imagination". How are African American authors articulating the concepts of freedom and citizenship as raced and gendered subjects into the 21st century? Likely authors may include: Octavia Butler, Brittney Cooper, Michelle Elam, Percival Everett, Victor LaValle, and Kiese Laymon.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: American Studies Course, GEP. Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 420 American Authors (3 credits)

An in-depth study of one or two significant American authors, the choice to be made by the instructor.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 421 American Novel, 19th 20th Cent (3 credits)

A study of the evolution of the novel in America; may include novels by Cooper, Hawthorne, Melville, Twain, Chesnutt, Wharton, James, Hemingway, Pynchon, Bellow, Updike, Kesey, Tan, Silko, or others depending on the instructor.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 423 Amer. Poetry, 19th & 20th Cent. (3 credits)

An analytical study of poetic development, with emphasis on Romantic and modern theory and practice. Among those studied: Poe, Whitman, Dickinson, Stevens, and Frost.

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 424 Contemporary American Poetry (3 credits)

An exploration of the current American poetry scene, including representative works from a wide range of styles and poetic movements. You will read and discuss recent poetry collections, keep a journal responding to your reading, and write imitations of the poets we read for class. To more fully experience poetry as working poets do you will write a poetic imitation of each of the books we read, and we will regularly workshop the poems you write for class. Guided by the advice you receive in workshop, you will revise eight of your poems toward a polished, fully-realized final portfolio. You will also present to the class on a contemporary poetry collection of your choice.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate

ENG 425 American Drama (3 credits)

A critical study of selected plays. The emphasis will be on the works of O'Neill, Wilder, Williams, Miller, MacLeish, and Albee. Acceptable for Theatre/Drama track.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: American Studies Course, CCC: Literature, CCC: Writing Intensive, English Area 5 - American Lit, English Theatre/Drama, GEP. Art/Literature, Undergraduate

ENG 426 Nature & Environmental Writing (3 credits)

Nature & Environmental Writing incorporates attention to both literature and student writing in an effort to help students understand the conventions of American nature and environmental writing and to use those conventions in their own writing.

Prerequisites: (ENG 101 or WR 101 or ENG 111) or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 427 The Harlem Renaissance (3 credits)

Black artists in Harlem (and other densely populated urban areas) produced a significant collection of work remarkable for its breadth and complexity during the anachronistically named Harlem Renaissance (1922-1941). This course explores that creative explosion in an attempt to develop a comprehensive understanding of what compelled the movement and why the Harlem Renaissance continues to be so influential in Black literature and culture today. ENG 215, 328, or 329 recommended.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: Africana Studies Course, American Studies Course, GEP. Diversity Course, English Area 5 - American Lit, English Diversity, English Diversity, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 428 The Beat Rebellion (3 credits)

A study of writers in the 1950s and early 1960s whose work reflected rebellion with regard to social and cultural norms.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: American Studies Course, English Area 5 - American Lit, GEP. Art/Literature, Undergraduate, GEP. Writing Intensive

ENG 429 The Civil Rights Movement (3 credits)

Consideration of how writing-speeches, poetry, fiction, and autobiography-from the U.S. Civil Rights movement shaped social change. Including a close look at the rhetorical strategies involved in a wide range of texts; authors include Martin Luther King, Jr., Malcolm X, Maya Angelou, James Baldwin, Taylor Branch, John Steinbeck, Alice Walker, and Eudora Welty. Also considers other movements that emerged from the Civil Rights movement including gay rights and disability rights.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: American Studies Course, CCC: Diversity, CCC: Writing Intensive, GEP: Diversity Course, English Area 1 - Writing, English Area 5 - American Lit, English Diversity, English Diversity, GEP: Art/Literature, Justice Ethics and the Law , Undergraduate

ENG 431 Special Topics in Theater (3 credits)

Course content to be determined by instructor.

Attributes: CCC: Writing Intensive, English Theatre/Drama, GEP: Art/Literature, Undergraduate

ENG 432 Theater Performance Practicum (3 credits)

Rehearsal and performance of a campus production (produced by the Cap and Bells Dramatic Society and directed by a faculty director) with the student in the role of actor or stage manager. Comprehensive study of the rehearsal and performance processes which culminates in the writing of a final research paper of ten pages in length. In order to register for this course, the production must be the third campus production in which the student has served as cast member or stage manager. Instructor approval required.

Attributes: English Theatre/Drama, GEP: Art/Literature, Undergraduate

ENG 433 Environmental Justice (3 credits)

In an era of depleted natural resources and climate change, environmental justice explores creative nonfiction, memoir, fiction, and poetry that addresses climate change and its impact on communities of color and impoverished communities in the U.S. and elsewhere. We also consider how to tell stories about climate change and global warming that influence policy makers and the public. We use the lens of race, class, and gender to consider how environmental writing works.

Attributes: GEP: Diversity Course, English Area 1 - Writing, English Diversity, English Diversity, GEP: Art/Literature, Justice Ethics and the Law , Undergraduate

ENG 434 Climate Change Stories (3 credits)

This course will explore literary responses to climate change through an exploration of memoir, fiction, poetry, and popular environmental writing. The primary emphasis on the course will be on the relatively new genre of "climate fiction," also known as "cli-fi."

Attributes: English Area 1 - Writing, English Area 4- British/Irish, English Area 5 - American Lit, English Literary Theory, English Lit Theory/ Pedagogy, Faith Justice Course, GER Art/Literature, Undergraduate

ENG 435 Darwin, Evolution & Literature (3 credits)

This course will explore literary responses to Darwin's theory of evolution from the publication of *On the Origin of Species* to the present, in science writing, nonfiction and fiction. Topics will include evolution, scientific racism, eugenics, genetic engineering, robotics, and transhumanism.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: English Area 1 - Writing, English Area 4- British/Irish, English Area 5 - American Lit, English Literary Theory, English Lit Theory/ Pedagogy, Faith Justice Course, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 441 Literacy as a Social Practice (3 credits)

An investigation of literacy as a social practice, using composition theory, ethnography, fiction, autobiography, and popular culture to define literacy and ask questions about it. With concern for the defining forces of race, class, and gender, the course explores different uses of literacy and considers the concept of a literacy "crisis." Students will compose narratives of their own literacy practices and pursue independent research on some aspect of literacy and its applications to schools, society, and quality of life.

Attributes: English Area 1 - Writing, Undergraduate

ENG 443 Special Topics in Writing (3 credits)

In this course, students will engage in writing projects based on a specialized area of study (e.g., Writing and Faith, Running to Write).

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 444 Race, Class, and Gender (3 credits)

We investigate "identity" as an intersectional construct. Theories of whiteness and racial identity, gender and sexuality, and social class are presented through reading and writing in poetry, memoir, fiction, and film. Course can include readings on disability, mental health diagnoses, and trans identities. Drafts of writing will be shared with classmates in large and small workshops.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Writing Intensive, GEP: Diversity Course, English Area 1 - Writing, English Diversity, English Diversity, Faith Justice Course, Gender Studies Course, GEP: Art/Literature, Justice Ethics and the Law , Undergraduate

ENG 445 Gender & Narrative (3 credits)

A writing course designed to explore alternative and experimental genres that combat sexism and do social and political work, with particular focus on narratives developed to challenge dominant cultural structures and practices.

Attributes: English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 446 Writing the Grant Proposal (3 credits)

This course introduces students to the grant-making process from initial research to the submission of a final proposal. Students will first work together to consult for a single non-profit, while learning about the components of a strong grant proposal and the grant-making process overall. Then, each student will be paired with a local nonprofit organization, as volunteer consultants for that organization. Students will work with their nonprofit organization to identify a new or existing project that needs funding. They will then take what they learn in class about the grant-making process and apply it to meet the needs of their nonprofit "client," with the ultimate goal of producing a complete grant proposal that can be submitted to funders

Attributes: English Area 1 - Writing, Undergraduate

ENG 449 Travel Writing Abroad (3 credits)

In this study abroad course, you will use travel as a lens through which to explore the elements of creative nonfiction in general and travel writing in particular. You will read travel memoirs, keep a journal, do in-class invention exercises, and research, write and workshop travel essays. A portfolio of your revised writing will be due after the study tour is over.

Attributes: CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate

ENG 450 Health, Advocacy, Storytelling (3 credits)

We read memoir, novels, poems, creative nonfiction, and films in order to explore how race, class, gender, sexuality, and disability are depicted through the writing of caregivers, medical professionals, and patients. The course focuses on how cultural differences affect access to medical care and how illness and health are narrated depending on the writer's intersectional position. Mental health diagnoses, addiction, chronic illness, and trauma may also be explored.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: CCC: Diversity, CCC: Writing Intensive, GEP: Diversity Course, English Area 1 - Writing, English Diversity, English Diversity, Faith Justice Course, Gender Studies Course, GEP: Art/Literature, Health Care Ethics Course, Undergraduate

ENG 451 N. Ireland Conflict & Story (3 credits)

This course explores "The Troubles" in Northern Ireland through fiction, poetry, film, and memoir. We consider the relationship of peaceful protest in Northern Ireland to the U.S. Civil Rights Movement, reflect on how personal conflicts relate to historical and cultural clashes between groups of people, and consider how stories shape identities. We investigate the relationships between identity and conflict, violence and nonviolence, peace and reconciliation.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: GEP: Diversity Course, English Area 1 - Writing, English Diversity, English Diversity, Gender Studies Course, GEP: Art/Literature, Irish Studies Course, Justice Ethics and the Law, Undergraduate, GEP: Writing Intensive

ENG 452 Writing and Reading Animals (3 credits)

This hybrid literature and writing course considers the representation of animals in a range of texts and explores how the depiction of animals as companions, gods, guides, objects, heroes, or monsters reflects changes in relationships between humans and nature. Students will also use the literary forms we study (fiction, nonfiction, and poetry) to reflect on their own experiences with animals (pets, animals in captivity or in the wild, and in books and films).

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 453 Medicine and Literature (3 credits)

This course surveys works of literature from multiple genres, cultures, and time periods in order to witness how literature emerges alongside developments and dilemmas in medical practice. Literature can represent medical experiences that other modes of scientific and clinical writing cannot contain. We will investigate the ways in which expressions and descriptions of pain often fall short. We will learn how various writers have used complex literary effects, narrative structures, and figurative language to compensate for the inarticulate and untranslatable experience of suffering, treatment, and recovery. We will also analyze the role of listeners and readers who must discover new techniques to treat patients and maladies (both physical and psychological) that they do not fully know.

Attributes: English Area 4- British/Irish, English Area 5 - American Lit, English Early Lit, GEP: Art/Literature, Undergraduate

ENG 454 Narrative Medicine (3 credits)

Narrative Medicine is a field that seeks to fortify healthcare practice with narrative competence: the capacity to recognize, absorb, metabolize, interpret, and be moved by the stories of illness. We explore the relationship between narrativity and identity. We engage in literary study that allows healthcare providers to better comprehend patients, convey knowledge, and accompany patients through the ordeal of illness. Narrative competence includes rigorous training in close reading, attentive listening, reflective writing, and bearing witness to suffering. By placing events in temporal order (with beginnings, middles, and ends) and establishing connections using metaphor and figurative language, narrative medicine employs elements of creativity and literary study to help us to recognize patients and diseases, convey knowledge, and accompany patients through the ordeal of illness.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, English Area 1 - Writing, Undergraduate, GEP: Writing Intensive

ENG 460 Magazine Writing (3 credits)

In this course, students gain practice developing story ideas, pitching articles, writing to word-count, and abiding by AP style. The course also examines a variety of glossies plus online magazines in order for students to stay current with changing journalistic practices.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 461 Food Writing (3 credits)

This class explores the political, spiritual, and economic aspects of eating and offers students the chance to practice writing about food in different modes, from restaurant reviews to blog posts to personal essays.

Attributes: CCC: Writing Intensive, English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 462 Travel Writing (3 credits)

This course explores the elements of crafting narratives about journeys, creatively and journalistically. Students will read widely, exploring the historical and contexts of travel writing, current best practices and practicalities, and ethical considerations. They will also complete a variety of writing assignments that will help them explore the various craft elements of travel writing, from researching to reporting to writing. While the course will mostly focus on local stories that can be written and reported (and traveled to) within the greater Philadelphia area, students will also have the opportunity to write about past travel experiences.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 463 Literary Journalism (3 credits)

This reading-intensive course provides an historical overview of a genre most often referred to as "literary journalism," once called "new journalism," and now sometimes dubbed "new journalism" or "immersion journalism." Students may read works by writers such as Nellie Bly, Stephen Crane, John Hersey, Joan Didion, Truman Capote, Tom Wolfe, Hunter S. Thompson, Ted Konover, Sonia Nazario, Adrian Nicole LeBlanc, and Susan Orlean, among others. In addition to their literary consumption and interrogation of the field, students will produce several short exercises in the style of the genre and one final project.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 464 Media, Politics & the Election (3 credits)

This course explores the normative and functional roles of media in our contemporary political system. Journalism - the Fourth Estate - fulfills critical roles in a representative democracy, analyzing political issues, providing diverse perspectives about candidates and creating forums for public discussion, all of which enable citizens to make informed decisions about electing leaders. During the course we will track and analyze media coverage of ongoing elections, and research and write election stories.

Prerequisites: ENG 101

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate, GEP: Writing Intensive

ENG 465 Special Topics in Journalism (3 credits)

Focus on a particular issue in journalism, examination of some trend, of consideration of selected columnists/distinctive voices in journalism.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 466 Journalism & Entrepreneurship (3 credits)

This course prepares and inspires students to approach journalism from the start-up perspective. The theories and practices of entrepreneurial journalism will be studied and simulated, with a special emphasis on new venture creation, cutting-edge business strategy and state-of-the-art storytelling techniques. Students should have taken ENG 261 or have prior journalism experience before enrolling in this course.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 467 Communication and the Law (3 credits)

At a time when the news media's role in society, its accepted practices and its storytelling tools and platforms are all undergoing radical transformations, adhering to ethical standards is more important than ever for veteran and aspiring journalists. This course examines and challenges those ethics, their significance in the public sphere and the principles and theories serving as their foundation. Students should have taken ENG 261 or have prior journalism experience before enrolling in this course.

Attributes: English Area 1 - Writing, English Journalism Track, Justice Ethics and the Law, Undergraduate

ENG 468 Media/Culture in South Africa (3 credits)

This summer program in South Africa offers students an opportunity to study through lived experiences - the culture, economics, and politics of pre- and post-apartheid South Africa. Students will accomplish this set of objectives by working as foreign correspondents, researching and writing multimedia narratives for The Hawk, Saint Joseph University's independent student-run newspaper. For the month in South Africa, students will report stories, go on field trips to historic sites, and interact with South Africans from all walks of life, in order to engage in thoughtful and meaningful discussions about issues of social justice.

Attributes: CCC: Mission: Global Citizenship, English Area 1 - Writing, English Journalism Track, GEP: Globalization Course, Undergraduate

ENG 469 The Art of Editing (3 credits)

This course will introduce students to three basic levels of editing: substantive editing, copyediting, and proofreading. The course may include guest editor presentations as well as intensive review of grammar and writing skills and an introduction to copyediting marks. Finally, students will try on the multi-faceted roles of an editor--and experience the challenges of balancing aesthetic and pragmatic concerns--through several major writing and editing projects, including one multi-media project.

Attributes: English Area 1 - Writing, English Journalism Track, Undergraduate

ENG 470 Independent Study:Senior Level (3 credits)

The senior-level independent study is for students to engage in faculty mentored research and writing. Students will develop a course of study with the faculty mentor that results in a substantial piece of scholarship, creative writing, or journalism. Minimum GPA of 3.0 (or cumulative average of 3.4 or higher for courses in the major field).

Attributes: GEP: Art/Literature, Undergraduate

ENG 473 Special Topics (3 credits)

Course content to be determined by instructor.

ENG 481 Literary Forms & Styles (3 credits)

Specific focus of the course will depend on the instructor. Approaches to the study of genres may include Books That Cook, Science Fiction, The Short Story in America, The Satiric Mode, The Lyric, The Sonnet, and Autobiography.

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: GEP: Art/Literature, Undergraduate

ENG 482 Literature & Culture (3 credits)

This course focuses on how literature engages readers in thinking through complex cultural problems. Specific focus of the course will depend on the instructor.

Attributes: GEP: Art/Literature, Undergraduate

ENG 483 Seminar in Narrative Form (3 credits)

Drawing on both fictional and theoretical texts, the course explores how narrative attempts to give meaning and coherence to experience and how readers process narrative. Literary texts include linear and non-linear narratives and range from early modern to postmodern texts. Theoretical perspectives include structuralist, poststructuralist, and feminist.

Prerequisites: ENG 101 or ENG 111 or WR 101 or WR 101H

Attributes: English Area 1 - Writing, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

ENG 484 Spec Topics in Critical Theory (3 credits)

This course provides an intense focus on a particular area of contemporary literary theory. Depending on the instructor, the course may cover major theoretical movements (e.g., feminist theory, deconstruction, new historicism) or concentrate on certain major figures (e.g., Bakhtin, Derrida, Cixous, Foucault).

Prerequisites: ENG 101 or WR 101 or WR 101H

Attributes: Undergraduate

ENG 492 English Internship (1-6 credits)

This course is designed to help guide students who wish to earn credit for professional work experience in writing, editing, social media management, or journalism, to name a few. Possible venues include, but are not limited to, newspapers and magazines, academic journals, publishing companies, television stations, radio stations, public relations firms and communications departments, online media outlets, advertising agencies, governmental and university departments, nonprofit organizations, and private and public schools. Students must complete a minimum of 112 hours at the internship site during the semester. Course requirements include a statement of goals, a journal or field notes, a profile of an English alum for the English Department blog, attendance at a career-related panel or activity, a letter of assessment from an internship supervisor, a final Reflection Essay, and an updated resume or link to a web-based resume. A minimum GPA of 3.0 (or cumulative average of 3.4 or higher for courses in the major field), or permission of instructor is required. Minimum GPA of 3.0 (or cumulative average of 3.4 or higher for courses in the major field), or permission of chair.

Attributes: English Area 1 - Writing, Undergraduate

ENG 493 Indep Research Project (Fall) (3,6 credits)

Includes College Honors theses. Requirements for college honors are listed above and under 'Honors Program'.

Attributes: GEP: Art/Literature, Undergraduate

ENG 494 Indep Research Project (SPR) (2-6 credits)

Includes College Honors theses. Requirements for college honors are listed above and under 'Honors Program'

Attributes: GEP: Art/Literature, Undergraduate

ENG 550 The Practice of Writing (3 credits)

An overview of the work of a practicing writer, with explorations of particular genres of interest to individual students in the course.

Assignments may include a writer's history (autobiographical account of interest in writing) and a writer's apprenticeship (in-depth examination of a writer admired by the student).

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 560 Rhetoric Then & Now (3 credits)

Consideration of the history of rhetoric, from the Sophists to the present day, with particular concern both for the ethical considerations involved in persuasive uses of language and for the stylistic choices in developing written work.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 600 Poetry Today (3 credits)

Exploration of the current poetry scene, particularly in America, reading collections from a wide variety of poetic schools and from the theoretical positions that inform the poems. Movements covered may include feminist and identity poetics, the New York School, poetry of witness, neo-confessional, Language Poetry, and the New Formalism. Use of imitation to experiment with difference poetic stances and styles.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 610 Science Writing (3 credits)

This course focuses on the idea of "science accommodation," or making complex scientific subjects more accessible to the general public or science writing for popular audiences. Readings include technical reports, original research studies, literature reviews, and abstracts, alongside memoirs, fiction, and poetry with medical, environmental, and scientific content. Assignments may include articles for popular audiences, literature reviews, abstracts, social media campaigns, posters, or creative writing drawn from scientific research. Students engage in several writing projects (one of which may be community-based) for different audiences and purposes. This course is distinct from Scientific Writing, which is technical in nature

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 612 Biography (3 credits)

This course will focus on reading and critiquing a number of important biographies, in order to see how various professional biographers have approached their task. Concomitantly, each student will be asked to choose a contemporary subject worthy of a biography (not a relative), who lives within a 50-mile radius of Philadelphia. Students will search out publications that often include biographical essays/profiles, gather detailed information about their subjects from various sources they determine to be important, and do the necessary interviews, with the aim of writing a biographical essay/profile.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies.

Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 614 The Short Story (3 credits)

This course focuses on reading and writing short stories with a particular focus on single-author contemporary and classic short story collections and their significance. Authors that maybe considered include Atwood, Diaz, Fitzgerald, Hurston, Lahiri, Munro, Millhauser, Poe, and Twain.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies.

Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 615 Road to Revolution in 1960s (3 credits)

A study of the American cultural scene during the 1960s including how racial discrimination, gender discrimination, sexual repression and anti-war activism appeared in writing and culture. Writers may include: Jack Kerouac, Nikki Giovanni, Eldridge Cleaver, Kurt Vonnegut, Joseph Heller, Betty Freidan, and some Beat poets. Films were also consequential both in propelling and in reflecting revolutionary changes in American life through the 1960s. Several key films that may be considered include In the Heat of the Night, Bonnie and Clyde, The Graduate, Easy Rider.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies.

Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 616 Writing and Inciting (3 credits)

This course will explore how Irish novelists and short-story writers have represented "the Troubles"-a protracted period of politically motivated violence in Northern Ireland, Great Britain, and the Republic of Ireland, which began in the late 1960s and has not fully ended today. Key questions include the following: What is the role of the artist in representing politically motivated and other types of violence? Should artists offer solutions or only pose problems? What are the moral and aesthetical stakes involved in making art out of atrocity? How might studying the fiction of the Northern Irish "Troubles" provide students in the M.A. in Writing Studies with thematic, technical and ethical insights for their own artistic investigations of the many forms of violence within their own societies?

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies.

Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 617 Writing and the Other Arts (3 credits)

Study of relationship between the work of writers and that produced by other kinds of creative people (in music, in architecture, in painting and drawing, in film) in order to get a full sense of any particular cultural moment (the Renaissance, the Age of Enlightenment, the Roaring 20's, the Rebellious 60's).

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 619 Reading & Writing Y.A. Novels (3 credits)

In this course we immerse ourselves in a range of contemporary literary texts written for, read by, assigned to, or kept from young adults (ages 12-18). Our goals will be to become both more familiar with the wide variety of texts geared toward adolescents and more attuned to our own experiences as readers and writers of young adult literature. At the same time, we will be attempting to think through the multiple ways in which adults (particularly parents and teachers) and adolescent readers interact with these texts and with each other.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 620 Special Topics in Lit/Culture (3 credits)

This course will consider a particular aspect of literature and culture relevant to contemporary writers. Content will vary according to the instructor. Course can be repeated when content varies.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 621 Horror in Literature & Film (3 credits)

When the novel came into being in the middle of the eighteenth century, its most popular genre was the Gothic-the novel of horror. In fact, the modern era-the era of science, reason, and democracy-has been obsessed with terror, fear, and the unknown since its very inception. What is it about horror fiction that so appeals to modern culture? Beginning with one of the earliest Gothic horror novels, the course will trace out a literary, philosophical, and filmic history. Each unit of the course will explore how a different psychological/cultural concept of terror plays out in an aesthetic context.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 622 Contemporary Lit and Science (3 credits)

This course considers the ways in which contemporary authors reacted to scientific revolutions such as Einstein's relativity theories, Bohr's theory of complementarity, and Heisenberg's uncertainty principle.

While focusing on the influence that an observer can have on an act of narration, we will study how this influence changed the narrative form.

We will also consider the portrayal of scientific paraphernalia, such as microscopes, telescopes and lenses, as representations of science and scientific principles. While studying the reception and popular/literary engagements with these scientific theories, this course will chart the movement away from uncertainty and relativity in popular discourse, as, especially towards the early 21-st century, both popular and literary representations started to reflect the certainties of climate change.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 624 Science Fiction in Lit & Film (3 credits)

This course focuses on the evolution of science fiction and its relationship to science from the Enlightenment to the present. Genres covered include popular scientific nonfiction, the short story, novels, film, and science fiction narratives in gaming and online culture. Science fiction related to climate change and utopian/dystopian futures are emphasized.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 626 Climate Change Stories (3 credits)

This course focuses on the narratives of climate change in fiction ("Cli-Fi," "Climate Fiction), nonfiction, and popular culture. Through an examination of dystopian and utopian modes of thought, the course will examine how rhetorics of fear and hope construct future histories and direct human action relative to climate change.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 628 Nature & Environmental Writing (3 credits)

Nature Writing & the Environment explores methods of restoring relationships with nature and with one another by writing about nature and the environment in a way that encourages others to care and act. It asks students to retain a sense of wonder in a time of justifiable fear and to write artistically without sacrificing scientific accuracy. In response to reading, discussion, and students' own experience of nature and the environment, students will write both creatively and analytically and compose and revise a substantial essay or article to submit to a journal or magazine.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 629 Writing and Envir. Justice (3 credits)

Writing and Environmental Justice considers how systemic racism and the exploitation of the earth are intertwined and unpacks why environmental hazards—oil refiners, landfills, and factories that pollute—are often located in communities of color. Writers will be invited to consider how exposure to environmental toxins affects the quality and length of lives in communities of color through consideration of crises like the lead in the water crisis in Detroit. Offered as community-engaged learning, writers will work with community-partner organizations on social media campaigns to address issues in their communities.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 630 Composition Theory (3 credits)

Exploration of theories of composition, with particular emphasis on contributions to the field in the past half century.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 635 The Writing Teacher Writing (3 credits)

Consideration of the writing that teachers can do in order to develop their approach to the teaching of writing.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 636 Writing & Empowerment (3 credits)

In this course students will explore how writing can be used as a tool, a method, and a means of empowerment. They will consider how the ability to tell one's story can be empowering and what the risks of telling that story are. They will also consider what an author might choose to leave out of the telling of a particular tale. Finally, students will research stories of empowerment and write their own stories of empowerment. Each student will complete two projects in different genres including fiction, nonfiction, pedagogy, poetry, and academic prose.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

ENG 640 Experiments in Narrative (3 credits)

Through examination of fictional and nonfiction narratives and narrative theories, this course considers such issues as the shift from oral to print to hypertext narratives, linear and nonlinear structure, writing "taboo" subjects, and the impact of social-cultural-historical circumstances upon narrative form and function. Content varies with instructor.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 641 RhetoricalTheory:SpecialTopics (3 credits)

Study of select issues in the domain of rhetoric, to be determined by the instructor.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 642 Style (3 credits)

This course considers the history of style from a rhetorical perspective and then moves to the work of 20th and 21st century writers to explore the use of style in contemporary writing, including your own. A discussion-based seminar with a workshop component, this course requires a high level of participation.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 643 Special Topics in Essay (3 credits)

An exploration of a particular topic related to the essay. Topics may include women essayists, personal essays, writing and memory, or other topics.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 644 Rhetoric of Science (3 credits)

This course studies scientific discourse as a mode of argument in specific historical contexts. Students will study the principles of persuasive and informational rhetoric from ancient and modern sources, and will analyze scientific texts from the ancient world through the current day. Students will develop an understanding of the scientific discourses of important figures in the history of science.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 645 Physics Writing & Communicatio (3 credits)

We are living during an exciting moment when engaging forms of physics writing and communication are widely accessible to popular audiences. Examples (to name just a few) include Brian Greene's lucid writings on relativity, quantum mechanics, and string theory; Carlo Rovelli's poetic reflections on time; and Neil deGrasse Tyson's lively podcast Startalk Radio. Such communication has the power to disseminate intricate physics theories and concepts in a digestible way, spark newfound understandings, philosophical reflection, and critical thinking among diverse audiences, and promote young people's entry into science-related fields. In this course, we will both rhetorically analyze and engage in physics writing and communication. We will study a wide range of physics-related communications designed for popular audiences (including books, articles, podcasts, and short videos), analyze their rhetorical workings, and compose and circulate our own writing and communication about physics.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies.

Attributes: Graduate

ENG 646 Multimedia Writing Workshop (3 credits)

A writer's work can be incredibly varied and provide a multitude of challenges and opportunities for creativity. Multimedia writers may create a script for a storyboard developed by a graphic artist. They may also create the text for Twitter, Facebook, and Instagram posts. They might write copy for a news broadcast, or their own blog. The goal of this intensive writing workshop is to build a writing portfolio and introduce the many facets of multimedia writing while encouraging each student to find their own method, approach, and voice within the structures of each multimedia platform. Students will be guided in exploring, discovering, and strengthening their voices and writing styles with the goal of enhancing and expanding their analytical and creative communication skills, and preparing them for real world jobs.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 665 Memoir (3 credits)

Consideration of the writing that comes directly from life experience and development of an autobiographical narrative that reflects past achievements in this genre. Can satisfy Area I.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 668 Creative Nonfiction Workshop (3 credits)

Workshop course in creative nonfiction; several pieces of nonfiction will be prepared for submission. Can be repeated with the permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 669 Poetry Writing Workshop (3 credits)

In-depth look into the concerns of a publishing poet. Students will hone their own work, putting together a final portfolio of polished writing, and will explore publication options including chapbooks and literary magazines. Toward this end, the class will include workshoping and one-on-one conferences with the instructor, as well as reading and responding to contemporary poetry, with attention to the practical concerns of the poet. Can be repeated with the permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 670 Fiction Writing Workshop (3 credits)

Workshop method of critique, with students expected to put together a portfolio of polished short stories. Published short stories will be read as models, and there will be discussion of strategies of getting fiction published. Content varies with the instructor. Fiction-writing workshop I can be taken either before or after Fiction writing workshop II. Can be repeated with the permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 671 Fiction Writing Workshop II (3 credits)

Workshop method of critique, with students expected to put together a portfolio of polished short stories or a short section of a novel or novella. Published short stories and novels will be read as models, and there will be discussion of strategies of getting fiction published in a variety of locations. Content varies with the instructor. Fiction-writing workshop II can be taken either before or after Fiction writing workshop I. Can be repeated with the permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 672 Intro to Medical Writing (3 credits)

In this course, you will study the mechanics of language and usage as related to scientific manuscripts and other documents, with the 11th edition of American Medical Association Manual of Style and its online resources as our primary guide. Topics covered include correct grammar, punctuation, capitalization, and usage in scientific writing; medical nomenclature, eponyms, and abbreviations; structure of common article types and other deliverables; referencing; reporting numbers and statistics in medicine; tables and figures; roles of author, writer, and editor in medical writing; and publication ethics, among others. Course activities will include a mix of lectures and class discussions reinforced by readings as well as practice exercises and quizzes. Medical editors working in the field will also be invited to share their experiences.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 673 Screenwriting Workshop (3 credits)

Exploration of screenwriting in a workshop format with consideration of the whole process involved in development of screen projects.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 674 Scientific and Medical Writing (3 credits)

This course will introduce you to professional scientific writing in the health sciences. You will learn techniques that will help you write effectively and efficiently, summarize and analyze scientific research, evaluate the soundness and ethics of research methodologies, display scientific data, and present on scientific topics. Genres covered are abstracts, proposals, scientific research articles, review essays, presentations, and patient education websites. To get the most out of this class, a strong background in science is encouraged.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 675 Special Topics Writing Wkshop (3 credits)

Exploration of a particular topic not covered in other writing workshops. Examples include "Playwriting," "Writing and Memory," "Writing through Race, Class, and Gender," "Food Writing," and "Nature Writing." Content varies according to instructor. Course may be repeated with permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in CreativeProfessional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 676 Writing for Publication (3 credits)

Successful freelance publishing begins with an awareness of what editors and their readers want. It demands knowledge of the manuscript market and familiarity with the requirements of specific publications: subject, length, organization, style. Unpublished writers can perfect their skills by analysis and imitation of authors who already write for the publications in which learners wish to appear. The course requires that assignments be composed from the beginning for specific publications and that completed work will be submitted for publication. Content can be fiction, nonfiction, or journalism and varies with the instructor. Can be repeated with the permission of the graduate director.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing, Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 677 Case Study: Public Relations (3 credits)

Comparative analysis of several public relations campaigns, with consideration of the rhetorical principles involved in the effort to sway public opinion.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

ENG 678 Case Study: Magazine Publishing (3 credits)

Exploration of magazine publishing, and the study of several magazines- their histories and editorial styles- with consideration for changing demographics and the practical considerations of achieving success in the magazine market. Consideration of the state of magazine publishing in both print and the web, and the development of articles from pitch to publication.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 679 Special Topics in Journalism (3 credits)

Exploration of a particular topic in journalism. May include sports journalism, literary journalism, or other topics as determined by the instructor.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 680 Writing for Nonprofits (3 credits)

This course will teach you the basics of how to write for a nonprofit organization, and how to tailor your message and style to various audiences. Focusing primarily on grant writing, you will learn the basics of how to ask for money from organizations in writing and how to navigate the grant-making process from the initial research to the submission of the final proposal. You will also practice writing other important pieces for any nonprofit, like appeal letters, blog posts, social media outreach, performance reports, and more. Through hands-on practice with real Philadelphia-area nonprofits, you'll learn how to write for the different audiences a nonprofit organization needs to reach. While this course is geared towards the writing skills suited to nonprofit organizations, many of these skills are also transferrable to writing at other kinds of professional organizations.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 681 Writers at Work (3 credits)

This course is designed to set your professional life as a writer in motion. Over the course of 15 weeks, you'll meet a series of working writers from around Philadelphia who will visit our class. During these visits, you'll have the opportunity to network with professional writers and learn about possible career paths, from public relations to publishing. Each writer's visit will tie into a different writing assignment so that you can begin building a portfolio of professional work (likely assignments will include: a press release, a review, a book proposal, an edited manuscript, plus a professional resume and bio.) At the end, you'll develop an online portfolio that you can use as a calling card.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 682 New Media (3 credits)

Exploration of new communications media as the hypertext world expands and technology continues to make possible increased broadcast media opportunities.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 683 Editing Practicum (3 credits)

Assignment to a specific, actual editing project, with expectation that the student will engage in several editorial functions in preparing manuscripts for publication.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

ENG 684 Health Writing (3 credits)

Are pharmaceutical makers influencing scientific research? What emerging infectious disease is likely to be the next big scare? What are the pros and cons of universal healthcare? Is chocolate really good for the heart? This course will teach students how to report and write on some of the pressing health issues of the day and encourage them to become more discerning consumers of medical news. Students will learn how to analyze research studies, conduct interviews of doctors, scientists and patients, and translate findings into lively and informative stories for the lay reader. The course will explore the connection between the environment and disease and examine trends in medicine as technology advances and funding shrinks. Students will get the latest information from guest speakers who are leaders in the fields of medical research, public relations and the media. This course will help prepare students for a career in health-related writing or sharpen their communication skills for whatever field they are pursuing.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Creative Professional Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 685 Health, Advocacy, Storytelling (3 credits)

We read memoir, novels, poems, creative nonfiction, and films in order to explore how race, class, gender, sexuality, and disability are depicted through the writing of caregivers, medical professionals, and patients. The course focuses on how cultural differences affect access to medical care and how illness and health are narrated depending on the writer's intersectional position. Mental health diagnoses, addiction, chronic illness, and trauma may also be explored.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 686 Literature and Medicine (3 credits)

Literature and Medicine considers how patients, doctors, and health care professionals write poetry, memoir, and fiction about health, wellness, illness, death, dying and suffering. It particularly considers how race, class, gender, sexuality, and disability influence the stories that are told. Projects can include writing narratives of our own encounters with the health care system, profiling doctors and other healthcare professionals, and community-engaged learning with community partners who are dedicated to health care.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 688 Racism, Science, Medicine (3 credits)

Racism, Science, and Medicine explores how systemic racism appears in what is purported to be the neutral language of "science." Because language shapes what we think and how we think it, we will consider how changing our language can work toward social change. By exploring how race was written in 19th, 20th, and 21st century scientific and medical texts, writers will be then encouraged to engage in a look at how race is encoded in contemporary science and medical writing. Writers will explore what anti-racist science and writing look like, and consider how other biases like gender, disability, and sexuality, are inscribed in writing. Offered as community-engaged learning, Racism, Science, and Medicine will invite students to complete projects for environmental and medical organizations committed to addressing systemic racism.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 692 Reporting on Sci & Medical Lit (3 credits)

Science writing relies on understanding and interpreting scientific and technical genres (such as clinical studies and reports and scientific research and review articles) for lay audiences. This class will teach you how to read, understand, and critique primary research studies in a variety of scientific and medical disciplines, focusing on the right questions to ask about methodologies, funding, research ethics, and presentation and interpretation of results in context. Case studies will highlight high-impact research that had undue influence on public health and other areas of intersection between science and society (e.g., the Women's Health Initiative 2002 study), as well as cases of false reporting or misunderstanding of scientific studies. Students will build a heuristic for reading scientific literature, will critique scientific studies, and will write science accommodations, e.g. publicizing high profile studies for select lay audiences.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 750 Topics in Sci & Literature (3 credits)

This course will consider a particular aspect of science and literature relevant to contemporary writers. Content will vary according to the instructor. Courses can be repeated when content varies.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 760 ST Technical/Medical Writing (3 credits)

Special Topics courses will be offered based on students' interests and the changing marketplace.

Restrictions: Students cannot enroll who have a major, minor, or concentration in Scientific Writing or Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 770 Directed Readings (3 credits)

An independent study course, overseen by an instructor with the approval of the director. This course is utilized to fulfill a degree requirement under special circumstances with an emphasis on assigned readings.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in English. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 771 Directed Research (3 credits)

An independent study course, overseen by an instructor with the approval of the director. This course is utilized to fulfill a degree requirement under special circumstances with an emphasis on researching a particular topic.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in English. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 772 Directed Writing (3 credits)

An independent study course, overseen by an instructor with the approval of the director. This course is utilized to fulfill a degree requirement under special circumstances with an emphasis on writing assignments.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in English. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 773 Directed Fieldwork (3 credits)

An independent study course, overseen by an instructor with the approval of the director. This course is utilized to fulfill a degree requirement under special circumstances with an emphasis on community writing/teaching. *Restrictions:* Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 791 Graduate Internship (3 credits)

Students have workplace internship assignments in areas of career interest that involve writing (research, editing, writing). A component of the course will be research in the internship field, in addition to writing of various kinds about the actual internship activity, some of it done with an eye to publication. Each placement involves approximately 200 hours of work over the course of the internship, a letter from a supervisor upon completion of the internship, and a journal documenting the work of the internship

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 793 Thesis Project I (3,6 credits)

The thesis project can involve either an analytical study in some area covered by the program or a collection of original creative material. Each project will have a faculty director, selected by the student in consultation with the Writing Studies Program Director. For a project to be completed in one registration period, register for ENG 793 and ENG 794, 3 credits each, for a total of 6 credits. For a project to be completed in two separate registration periods, register first for ENG 793 for 3 credits, then later, for ENG 794 for the remaining 3 credits. It is recommended that each project also be read by a second reader, who will be chosen by the student and thesis director, and approved by the graduate director. At the completion of the thesis project, students will make a formal presentation of it in one of three ways: (1) A public reading of a selected portion of the project (2) A formal defense whereby the thesis will be explained and questions about it entertained (3) A public reading coupled with a formal defense. The method of public presentation would be agreed upon by the student and the thesis director. The English Department will host opportunities for public readings two times a year (in December and May) close to expected completion of degree requirements and the thesis project. Once complete, thesis projects will receive a P (pass). In progress thesis projects will be graded as Incomplete. *Nota Bene:* The Writing Studies diploma will not be conferred until the candidate has successfully completed the above steps, as well as submitted the thesis project in the correct format for binding. Details about the procedure for binding the thesis can be found on the Writing Studies website.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

ENG 794 Thesis Project II (3 credits)

The thesis project can involve either an analytical study in some area covered by the program or a collection of original creative material. Each project will have a faculty director, selected by the student in consultation with the Writing Studies Program Director. For a project to be completed in one registration period, register for ENG 793 and ENG 794, 3 credits each, for a total of 6 credits. For a project to be completed in two separate registration periods, register first for ENG 793 for 3 credits, then later, for ENG 794 for the remaining 3 credits. It is recommended that each project also be read by a second reader, who will be chosen by the student and thesis director, and approved by the graduate director. At the completion of the thesis project, students will make a formal presentation of it in one of three ways: (1) A public reading of a selected portion of the project (2) A formal defense whereby the thesis will be explained and questions about it entertained (3) A public reading coupled with a formal defense. The method of public presentation would be agreed upon by the student and the thesis director. The English Department will host opportunities for public readings two times a year (in December and May) close to expected completion of degree requirements and the thesis project. Once complete, thesis projects will receive a P (pass). In progress thesis projects will be graded as Incomplete. *Nota Bene:* The Writing Studies diploma will not be conferred until the candidate has successfully completed the above steps, as well as submitted the thesis project in the correct format for binding. Details about the procedure for binding the thesis can be found on the Writing Studies website.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Writing Studies. Enrollment is limited to Graduate level students.

Attributes: Graduate

English as Second Lang (ESL)

ESL 170 Special Topics in ESL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ESL 201 Composition & Crit Thinking (3 credits)

This course provides the non-native student with the critical reading and writing skills necessary to perform well in required introductory courses in English. Special emphasis is placed on analyzing both the literal and figurative levels of the language of literature and communicating these perceptions in organized, persuasive, and creative English prose. These aims encompass the writing needs of all non-native students, undergraduate and graduate.

Prerequisites: Language Placement with a score of ES201

Attributes: Undergraduate

ESL 202 Composition & Crit Thinking (3 credits)

This course provides the non-native student with practice in reading and writing critically about essays in a variety of disciplines with an emphasis on the humanities. Class discussion develops the proficiency needed to engage in and master introductory courses. Current research skills are developed, which lead the student to a completed paper and its presentation. These aims encompass the writing and speaking needs of all non-native students, undergraduate and graduate.

Prerequisites: Language Placement with a score of ES202

Attributes: Undergraduate

ESL 270 Special Topics in ESL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ESL 370 Special Topics in ESL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ESL 470 Special Topics in ESL (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

Environmental Science (ENV)

ENV 102 Environmental Ethics (3 credits)

An introduction to the political, economic, social, scientific, and philosophical concerns involved in environmental issues. Students will read, discuss, and write about current and controversial topics or problems integrating the aforementioned disciplines of study. A major goal of this course is to expose the students to the interdisciplinary nature of environmental science and the challenges of solving environmentally related problems.

Attributes: GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate

ENV 105 The Environment (3 credits)

An examination of the fundamental themes of ecology with an emphasis on the impact of humans on their environment. Included are discussions of current interest topics such as oil spills, nuclear waste, and rain forest destruction.

Restrictions: Students cannot enroll who have a major in Biology, Chemistry, Chemical Biology or Physics.

Attributes: GEP: Natural Science, Undergraduate

ENV 106 Exploring the Earth (4 credits)

A lab-based course that provides an overview of the functioning of the Earth. Ecology, basic biology, environmental science, and current events are used to examine the earth. Topics include natural resources, population, pollution, ecosystems, biogeochemical cycles, and biodiversity.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

ENV 106L Exploring the Earth Laboratory (0 credits)

Students who register for ENV 106 must also register for the ENV 106L laboratory. For example, if you register for ENV 106 you must, at the same time, register for a section of ENV 106L, because they are corequisites.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

ENV 150 Global Climate Change (3 credits)

This course explores the scientific basis of global climate change, the impacts of climate change, and the solutions needed to solve the problem. It also explores Catholic Social Teaching on the subject of care for the environment.

Restrictions: Students cannot enroll who have a major, minor, or concentration in Environmental Science.

Attributes: First-Year Seminar, Undergraduate

ENV 170 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENV 270 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENV 302 Environmental Geology (3 credits)

This course will provide an introduction to the earth's environmental systems and resources through an integrated study of relevant topics in geology, hydrogeology, and environmental science.

Prerequisites: CHM 120 or CH 101

Restrictions: Enrollment is limited to students with a major in Biology, Chemistry, Environmental Science or Physics.

Attributes: Undergraduate

ENV 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENV 390 Environmental Science Seminar (0 credits)

This series of speakers will introduce majors and minors to current environmental science research, career options and experts in relevant disciplines inside and outside of the natural sciences.

Attributes: Undergraduate

ENV 440 Environmental Toxicology (3 credits)

Course covers the physiological and systemic interaction of environmental pollutants with plants and animals.

Prerequisites: CHM 120 or (CH 101 and CH 103)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Environmental Science.

Attributes: Undergraduate

ENV 470 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

ENV 471 Environmental Law (3 credits)

This course provides students with an introduction to the laws and regulations that have been enacted to address environmental protection issues in the United States. The focus of this survey course will be the federal environmental regulatory system. The course addresses the history and regulatory components of a number of federal environmental statutes. A common theme is the role that enforcement mechanisms, like civil judicial and criminal enforcement actions, play in the achievement of the goals set forth in these statutes. The course will also explore current topics, such as the environmental and regulatory issues surrounding: regulation of e-waste; hydraulic fracturing and climate change.

Attributes: Undergraduate

ENV 490 Environmental Sci Internship (3 credits)

The Environmental Science Internship entails spending a minimum of ten (10) hours each week in a supervised fieldwork experience or approved environmental field course. Grading is based on student reports during weekly meetings with internship instructor, preparation of an internship journal, academic papers, exams, and formal evaluation by internship supervisor. Junior and senior Environmental Science majors and Environmental Science and Studies minors only

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Environmental Science.

Attributes: Undergraduate

ENV 493 Undergraduate Research in Env (1-3 credits)

This course pairs individual students with faculty mentors to perform independent environmental science related research.

Attributes: Undergraduate

Exercise Physiology (EPH)

EPH 120 Foundations: Exercise Science (3 credits)

This is an introductory course to the systems and mechanisms regarding the human body's response to exercise. A spectrum of careers relating to a foundation in exercise science will be addressed. Proper utilization of exercise science principles in relation to exercise, health and fitness will be discussed.

Attributes: Undergraduate

EPH 201 Personal Training Essentials (3 credits)

This course offers a thorough foundation in personal training, combining rigorous scientific theory and proper exercise technique with practical application. Covering anatomy, biomechanics, exercise physiology, and nutrition, students will learn to design and implement effective training programs for diverse populations. Behavior change, client screening, and exercise psychology are integrated to develop coaching skills essential for client success. Additionally, the course addresses legal and business considerations of personal training. Designed for those seeking personal training certification, it equips students with the knowledge and skills necessary for excellence in the field.

Attributes: Undergraduate

EPH 205 Mind & Muscle: Science of Success (3 credits)

The only two things we have voluntary control over are thoughts and actions. This course explores health, fitness, and the cultivation of a value-driven mindset, offering coaching and goal-setting strategies to guide students on a journey of self-discovery, helping to identify their present circumstances, future goals, and a roadmap to realize them. It integrates not just the physical dimension of health, but all the dimensions as they relate to human performance and personal achievement. The course discusses and emphasizes that the mind, like any muscle, requires challenge, testing, and consistent effort to grow stronger and more resilient. Students will learn to apply these principles to pursue their own goals. Through theoretical insights and practical exercises, this course offers a transformative experience, preparing students for success in all endeavors and equips them with the fundamental tools for not just physical, but all personal success and professional development.

Attributes: Undergraduate

EPH 210 Athletic Injuries & Sports Rehab (3 credits)

This course is designed to provide you with a comprehensive understanding of sports injuries and the rehabilitation process. Throughout this course, you will learn about the different types of sports injuries, their causes, and methods of prevention. You will gain knowledge about the rehabilitation process, including the different stages of rehabilitation, the use of therapeutic modalities, and techniques for promoting recovery. Furthermore, this course will equip you with practical skills to aid in the rehabilitation of sports injuries, including basic therapeutic modalities and taping and wrapping techniques. By the end of this course, you will have gained valuable insights into the causes and prevention of sports injuries, the rehabilitation process, and the practical skills necessary for successful sports injury rehabilitation.

Attributes: Undergraduate

EPH 221 Exercise Pharmacology (3 credits)

This course is designed to provide the student with a foundation for understanding basic pharmacology including how drugs affect the physiological processes in the body and how the body handles the absorption, metabolism, and excretion of drugs. Special emphasis is placed on how exercise can alter the efficacy of a drug and how a drug can impact performance. Additionally, the ergogenic properties of nutrients will be discussed.

Attributes: Undergraduate

EPH 260 Health and Wellness (3 credits)

This course focuses on health and wellness concepts important in making informed choices about one's own health. A personal approach to health and wellness will be explored through self-assessment and practical application to everyday life as it relates to the dimensions of health. Topics such as fitness, obesity, weight management, nutrition, stress, substance use and abuse, prevention of diseases, sexual health, and relationships will be discussed.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

EPH 270 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EPH 271 Motor Learning (3 credits)

This course is an introduction to the theoretical concepts involved in motor skill development, acquisition and motor control. A combination of psychomotor skill and neuromuscular function in the control of movement, as it relates to sport and performance will be emphasized, in addition to developing effective training regimes.

Attributes: Undergraduate

EPH 276 Applied Sports Nutrition (3 credits)

This focused course dives into the essential topics of sports nutrition, guided by the position stands of the International Society of Sports Nutrition (ISSN). Students will analyze and discuss the ISSN's evidence-based positions, learning to translate scientific research into practical nutritional strategies for athletes and active individuals. The curriculum prepares students for the Certified Sports Nutritionist (CISSN) exam, emphasizing the application of sports nutrition principles to enhance health and athletic performance. By the end of the course, students will be equipped with the theoretical knowledge and practical skills necessary to prepare for the field of sports nutrition.

Attributes: Undergraduate

EPH 300 Exercise Testing & Prescription (4 credits)

This course covers the five health-related physical fitness components throughout the complete process of exercise testing and prescription, incorporating the pre-screening evaluation. Emphasis will be placed on functional tests most appropriate for individualized exercise prescription to accommodate the client's needs and goals ranging from health, to fitness, to high-level competitive athletics.

Attributes: Undergraduate

EPH 301 Exercise Physiology (4 credits)

This course in Exercise Physiology aims to provide an understanding of the physiological responses and adaptations that occur in the body during and in response to exercise. The course covers acute responses to exercise, such as changes in heart rate, blood pressure, and ventilation, as well as chronic adaptations with regular exercise, including improvements in muscle mass, strength, and cardiovascular function. Additionally, students will learn about different training programs used to elicit these adaptations and apply their knowledge through laboratory exercises measuring aerobic and anaerobic fitness, muscle function, and metabolic responses to exercise.

Attributes: Undergraduate

EPH 302 Cardiovascular Pathophysiology (3 credits)

This course will present an overview of coronary heart disease (CHD); its scope, etiology, diagnosis, treatment, and prognosis. The material, presented on an introductory level will serve as a foundation for future cardiovascular education. The course will also discuss EKG interpretation at an introductory level.

Prerequisites: EPH 301 or FT 301 or EPH 300 or FT 303

Attributes: Undergraduate

EPH 310 Ethics in Sports (3 credits)

This course will provide students with the opportunity to examine personally held ethical beliefs as well as the ethical dilemmas in past and current sporting events including legal repercussions of participant. This course will assist students in defining and understanding legal, ethical, and professional judgment in sport. Students will study and apply the various theories and models of sportsmanship and ethics in sports.

Attributes: Undergraduate

EPH 311 Essentials of Sports Science (3 credits)

This foundational course explores the evolving role of technology in sports science. Through a focus on the latest innovations, from wearable technology to performance analytics, students will learn to apply scientific principles and technological advancements to optimize athletic performance and recovery. The curriculum emphasizes practical skills in data analysis, the integration of technology in training programs, and the critical evaluation of technological tools in sports. This course is designed to equip future sports scientists with the knowledge and expertise to leverage technology in the pursuit of athletic excellence, also preparing students for the NSCA Certified Performance and Sport Scientist (CPSS) certification.

Attributes: Undergraduate

EPH 321 Tactical Strength & Conditioni (3 credits)

This specialized course offers an in-depth exploration of the field of tactical performance, preparing students for the NSCA Tactical Strength and Conditioning Facilitator (TSAC-F) certification. It focuses on developing physical training programs tailored for military, law enforcement, fire and rescue, and other emergency personnel. The curriculum integrates exercise physiology principles with practical applications, emphasizing strategies to enhance performance, resilience, and injury prevention in tactical populations. Students will learn to design and implement strength and conditioning programs that meet the unique demands of tactical operatives, ensuring readiness for the physical challenges faced in the line of duty.

Prerequisites: EPH 120 or EPH 201 or EPH 300 or EPH 301 or EPH 411

Attributes: Undergraduate

EPH 340 Exercise Psychology (3 credits)

This course will discuss the relationship of psychological factors on physical activity and exercise behavior. We will explore how physical activity affects psychological and social wellness, and how psychological and social factors affect participation in exercise and physical activity. Topics discussed will be the relationship between exercise and personality, self-esteem, self-concept, mood alteration and motivation. Emphasis will be placed on how to design exercise experiences that enhance fitness and quality of life as well as exercise adherence.

Prerequisites: PS 101 or PSY 100 or PSY 101

Attributes: Undergraduate

EPH 350 Research Methods in Kines (3 credits)

The course will provide an overview of the scientific method, research process and available methods useful for students researching within all subdisciplines of kinesiology and exercise science. The course covers human participant protections, research designs, instrumentation, quantitative and qualitative data analyses, and drawing conclusions. Students are responsible for selecting a problem of interest, gathering and critiquing current research, writing literature review and developing a research proposal. Students will review research articles investigating aspects of exercise science, health and wellness

Attributes: CCC: Writing Intensive, Undergraduate

EPH 355 Research Experience (1-3 credits)

This course will provide students the opportunity to design, implement and analyze research in a hands-on setting. There will be an emphasis on the application of research methodology, principles and techniques, subject recruitment and data collection in a laboratory setting with a concentration on health and fitness related inquiry

Attributes: Undergraduate

EPH 360 Fitness & Sports Nutrition (3 credits)

This course will examine the relationship between nutrition, exercise, weight management, metabolism, human performance, and disease prevention from various perspectives: scientific principles, consumer knowledge, and holistic health concepts. Intelligent application of information will be encouraged to enable students to succeed in implementing healthy nutritional practices in their own lives. An emphasis will be placed on the nutrient demands in a variety of exercise and sport settings. The content material of EPH 360 overlaps with the content of CHM 110, CHM 111, HSC 253 and BIO 219 (USCI Legacy BS 219).

Attributes: Undergraduate

EPH 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

EPH 380 Introduction to Kinesiology (3 credits)

This course introduces students to the foundational principles of kinesiology, combining anatomy, biomechanics, and movement science to explore how the human body performs dynamic motion. Students will examine the structure and function of the musculoskeletal system, movement efficiency, and the concepts underpinning everyday and athletic activities. The course emphasizes the practical application of these principles across various domains, including sports, strength and conditioning, clinical settings, and ergonomics. By the end of the course, students will develop a deeper appreciation for the elegance and complexity of the body's functional anatomy and its application to real-world scenarios, preparing them for advanced coursework in exercise physiology and related fields.

Attributes: Undergraduate

EPH 387 Biomechanics (3 credits)

This course offers an in-depth introduction to the mechanical principles underlying human movement. Through a blend of theoretical knowledge and practical application, students will learn to assess and improve human performance, prevent injuries, and understand the biomechanical demands of physical activities and sports. Key topics such as kinematics, kinetics, muscle mechanics, and movement analysis will be covered, equipping students with the skills to apply biomechanical principles in both clinical and athletic settings.

Attributes: Undergraduate

EPH 401 Adv Ex Physiology (3 credits)

This course is designed to provide the student with advanced understanding of physiological changes and adaptations corresponding to exercise and the factors which affect physiological function during exercise such as nutrition, age, disease, gender, and the environment.

Prerequisites: EPH 301 or FT 301

Attributes: Undergraduate

EPH 411 Strength and Conditioning (3 credits)

This course is designed to build on the scientific principles learned in Anatomy and Physiology and other Exercise Physiology courses within the context of strength and conditioning for athletic populations. Special emphasis will be placed on muscle physiology, athletic training adaptations, and strength and conditioning program design for a variety of athletes. Additionally, this course will include hands-on strength and conditioning technique training. This course is ideal for students who wish to become NSCA Certified Strength and Conditioning Specialists (CSCS), which is a well-respected professional certification for those working in health and fitness, strength and conditioning, and physical therapy settings.

Prerequisites: EPH 120 or EPH 201 or EPH 210 or EPH 300 or EPH 301 or EPH 360 or EPH 380

Attributes: Undergraduate

EPH 415 Strength & Conditioning I (3 credits)

This course covers the fundamental principles of strength and conditioning, emphasizing anatomy, physiology, and biomechanics as they relate to exercise programming. Students will engage with hands-on training to master exercise techniques and to start building effective programs. The course is geared towards those aiming for the NSCA Certified Strength and Conditioning Specialist (CSCS) certification, providing foundational knowledge critical for the exam and future practice. This is the first in a two course sequence.

Prerequisites: EPH 300 or EPH 301

Attributes: Undergraduate

EPH 416 Strength & Conditioning II (3 credits)

Strength and Conditioning II advances students' expertise in program design and implementation. Covering anaerobic and aerobic training adaptations, nutrition for performance, and sports psychology, the course hones the practical application of strength and conditioning principles. Additional emphasis is on fitness and sport specific prescription, periodization and essentials of facility design, policy, and organization. It's ideal for students progressing towards the NSCA Certified Strength and Conditioning Specialist (CSCS) certification and a professional career in fitness and sports performance. This course is the second of a two course sequence.

Prerequisites: EPH 415

Attributes: Undergraduate

EPH 421 Pediatric Clinical Ex. Phys (3 credits)

This course is designed to provide the student with an introduction to Pediatric Exercise Medicine. From an overview of the cellular level to the larger organ system responses to exercise and normal cardiac anatomy and physiology. A comparative understanding of acute and chronic adaptations to exercise in patients with normal physiology and normal metabolism to how this is similar or different for children vs. adults, and those with congenital vs. acquired cardiac, pulmonary, metabolic, and or structural diseases and defects. Exercise testing in pediatric populations - how and why we test are examined. Basic electrocardiography will be examined, as well as basic practice reading ECG's.

Prerequisites: EPH 120 or EPH 300 or EPH 301 or BIO 261 or BIO 311

Attributes: Undergraduate

EPH 431 Exercise For Special Popultns (3 credits)

This course provides a concise yet comprehensive approach to exercise programming for individuals with unique needs, including those with conditions like diabetes, arthritis, cancer, and cognitive disorders. Students will learn to identify special precautions, and adapt exercise recommendations based on current research and clinical guidelines to optimize safety and efficacy. The curriculum prepares students to craft inclusive exercise interventions across the lifespan and also for the NSCA Certified Special Population Specialist (CSPS) certification.

Prerequisites: EPH 120 or EPH 201 or EPH 210 or EPH 300 or EPH 301 or EPH 380

Attributes: CCC: Diversity, Undergraduate

EPH 481 Internship (3 credits)

Internships are off-campus experiential learning activities designed to provide students with opportunities to make connections between the theory and practice of academic study and the practical application of that study in a professional work environment. Internships offer the opportunity to "try out" a career while gaining relevant experience and professional connections. Internships are completed under the guidance of an on-site supervisor who in combination with the student will create a framework for learning and reflection.

Attributes: Undergraduate

EPH 482 Internship II (3 credits)

This advanced internship provides students with an additional opportunity to gain practical experience and further refine their professional skills in a specialized work environment. Designed for students seeking deeper engagement in their field, this course emphasizes advanced responsibilities, greater autonomy, and the application of higher-level critical thinking and problem-solving skills. Students will work under the mentorship of an on-site supervisor and complete a comprehensive reflection on their advanced learning outcomes, preparing them for professional or graduate-level opportunities. The second internship must be completed at a different site than the first to ensure a broader range of professional experiences.

Attributes: Undergraduate

EPH 483 Fitness and Health Management (3 credits)

This course is designed to give students the opportunity to acquire practical knowledge, under a qualified supervisor, in a selected work setting within the field of exercise science. This is a culminating educational field experience in which students apply content from coursework under careful observation and in cooperation with a skilled practitioner.

Restrictions: Enrollment is limited to students with a major in Exercise Physiology or Health Science.

Attributes: Undergraduate

Finance (FIN)

FIN 100 Personal Financial Management (1 credit)

This course provides an overview of personal finance topics to help students set and work toward their particular financial goals. This course is designed for students of any major who want to be better prepared at managing their own financial affairs. *Does not satisfy any major or minor Finance, FPL, RMI, or REF requirement.

Attributes: Undergraduate

FIN 150 Finance through Movies (3 credits)

This First-Year Seminar is designed to introduce students to the field of finance through the lens of movies. Students will gain an understanding of a breadth of topics including corporate form of business entity, corporate governance, and role of a corporation in a society. We will also cover stock trading and role of information in stock trading. Finally we will discuss value creation through mergers and divestitures. Does not satisfy any major or minor Finance requirement. Does not satisfy any free elective credit.

Attributes: First-Year Seminar, Undergraduate

FIN 170 Special Topics in Finance (3 credits)

These courses are designed to give in-depth coverage to finance subjects that are not covered in great detail in other courses. The prerequisites and topics selected are at the discretion of the instructor.

Attributes: Undergraduate

FIN 200 Intro to Finance (3 credits)

This course provides a survey of financial theory and practice as it relates to the management and valuation of firms. Topics include: organizational forms, the role of capital markets, the determination of interest rates, financial statement analysis, the time value of money, stock and bond valuation, risk and return, and capital budgeting. This course is required for all business students and is a prerequisite for all other 200- to 400 level finance courses.

Prerequisites: ACC 101 and DSS 100 and ECN 101

Attributes: Undergraduate

FIN 201 Markets and Institutions (3 credits)

This course covers the role and workings of financial markets: money and capital markets, mortgage markets, bond markets, stock markets, foreign exchange markets, and derivative markets. Interest rate theory and the term structure of interest rates are studied. Functions of the Federal Reserve System along with the foundations of monetary theory and policy are studied. The course also examines the management of assets and liabilities by financial institutions including commercial banks, insurance companies, mutual funds, and investment banking.

Prerequisites: (FIN 200 or FIN 225)

Attributes: Undergraduate

FIN 202 Finance Practicum (1 credit)

This course enables students working in the financial industry over the course of a semester to earn one credit hour. Students are required to fulfill all job requirements and to submit an 8 - 10 page paper describing their work responsibilities and the finance-related skills they acquired. To apply, the student needs to submit a letter describing the proposed practical training opportunity; approval is at the discretion of the Finance Department chair. Student's major must be Finance. *Does not satisfy any major or minor Finance requirement. Does not satisfy any free elective credit. Grade will be Pass/Fail. May be repeated once if the student has attained a grade of Pass in a previous semester and supervising instructor approves.

Prerequisites: (FIN 200 (may be taken concurrently) or FIN 225)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Finance.

Attributes: Undergraduate

FIN 225 Fund of Quantitative Finance (3 credits)

This course provides a mathematical approach to corporate finance and practice as it relates to financial analysis, investor decisions, risk management, and the valuation of firms. Topics include: the determination of interest rates, the time value of money, annuities, the raising of capital using debt and equity, debt and equity valuation techniques, risk and return, risk management, and capital budgeting. Because this course can be taken in lieu of FIN 200 within the sequence of Business Foundation courses, a student may not receive credit for both this course and FIN 200. This course is also a substitute for FIN 200 when satisfying the prerequisite requirements for all other 200- to 400 level finance courses.

Prerequisites: ACC 101 and ECN 101 and (MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 270 Special Topics in Finance (3 credits)

These courses are designed to give in-depth coverage to finance subjects that are not covered in great detail in other courses. The prerequisites and topics selected are at the discretion of the instructor.

Attributes: Undergraduate

FIN 300 Intermediate Finance (3 credits)

This course focuses on the financial management of fixed assets and long-term capital. Topics include capital budgeting, risk, CAPM, capital structure, cost of capital, dividend policy, asset valuation, and bankruptcy and reorganization.

Prerequisites: (FIN 200 or FIN 225) and (DSS 210 or MAT 118 or MAT 128 or MAT 322)

Attributes: Undergraduate

FIN 301 Investments (3 credits)

This course will teach students how to evaluate the potential risks and returns of investments and portfolios; perform fundamental equity analysis using economic, industry, and discounted cash flow analysis; value bonds; compute the price sensitivities of assets; understand diversification and the basics of portfolio asset allocation; and evaluate portfolio performance. Students are strongly urged to complete FIN 201 before taking FIN 301.

Prerequisites: (FIN 200 or FIN 225) and (DSS 210 (may be taken concurrently) or MAT 118 or MAT 128 or MAT 322)

Attributes: Undergraduate

FIN 302 International Finance (3 credits)

This course focuses on the following topics: balance of payments, international flow of funds, foreign investment, governmental and international agencies, and trade theory.

Prerequisites: (FIN 200 or FIN 225) and (DSS 210 or MAT 118 or MAT 128 or MAT 322)

Attributes: CCC: Mission: Global Citizenship, GEP: Globalization Course, Undergraduate

FIN 303 Small Business Finance (3 credits)

This course focuses on critical strategic and operational issues facing a small firm: how to raise capital in non-public markets from a spectrum of sources from angel investors, private equity, and the SBA; estimating cost of capital, credit policy and terms, liquidity and liquidity management, bank relations, valuation of the business, and exit strategies. Students are required to manage online simulated competing small businesses in teams and make presentations regarding their strategies and results.

Prerequisites: (FIN 200 or FIN 225) and (DSS 210 or MAT 118 or MAT 128 or MAT 322)

Attributes: Undergraduate

FIN 310 Sustainable Finance (3 credits)

This course develops a holistic view of the finance function within our economy and society to facilitate progress towards meeting the United Nations Sustainable Development Goals (UN SDGs). Economic, environmental and social externalities will be discussed along with possible ways to internalize them. The importance of responsible and ethical financial decision-making by households, businesses, investors, and governments will be emphasized in a variety of contexts.

Prerequisites: (FIN 200 or FIN 225)

Attributes: GEP: Ethics Intensive, Undergraduate

FIN 370 Topics in Finance (3 credits)

These courses are designed to give in-depth coverage to finance subjects that are not covered in great detail in other courses. The prerequisites and topics selected are at the discretion of the instructor.

Attributes: Undergraduate

FIN 400 Mergers & Acquisitions (3 credits)

This course covers theory and evidence concerning mergers & acquisitions and corporate control. It examines the accounting and valuation aspect of mergers & acquisitions activities, the M&A process, and reviewing the relevant historical empirical evidence. Mergers and acquisitions activity is evaluated in terms of the strategic alternatives faced by the firm. Cases are used and a graded team buy and sell deal negotiation simulation is required.

Prerequisites: FIN 300 and (MAT 123 or MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 401 Student Managed Funds (3 credits)

This course provides students an opportunity to manage investments. The objective is to earn risk-adjusted returns competitive with a benchmark index. The class decides early in the semester the style of investing and chooses the appropriate index for performance evaluation. Each student is a research analyst and a sector specialist, participates in the construction of the portfolio, and has a functional role. Each sector is represented by a sector team. FIN 402 Portfolio Management is highly recommended, but is not a required prerequisite for the course.

Prerequisites: FIN 301 and (MAT 123 or MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 402 Portfolio Management (3 credits)

This course covers the fundamentals of portfolio management. Topics include asset allocation, portfolio construction, performance evaluation, creating and using indexes, stock valuation models, and hedging with options and futures. Asset pricing theories, market anomalies and different styles of investing are addressed. Market simulation, asset allocation software, databases, spreadsheet modeling, and optimization programs are used.

Prerequisites: FIN 201 and FIN 301 and DSS 210 and (MAT 119 or MAT 123 or MAT 155 or MAT 161)

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Undergraduate

FIN 403 Derivative Securities (3 credits)

This course introduces students to the mathematical formulas and techniques used to value derivative securities including options forward and futures contracts, options on futures, swaps, and interest rate derivatives. Financial engineering and controlling risk are emphasized along with lessons learned from recent derivative-related losses.

Prerequisites: FIN 201 and FIN 301 and DSS 210 and (MAT 119 or MAT 123 or MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 410 Fixed Income Analysis (3 credits)

This course shows students how to evaluate the risk and return characteristics of Fixed Income investments and portfolios of Fixed Income Securities. Students will learn how contractual bond provisions, interest rate movements, and the shape of the yield curve affect the value and volatility of both individual bonds and bond portfolios. Students will also be introduced to mortgage- and asset-backed securities and fixed income derivatives.

Prerequisites: FIN 301 and (MAT 123 or MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 470 Advanced Topics in Finance (3 credits)

These courses are upper division courses designed to give in-depth coverage to finance subjects that are not covered in great detail in other courses. The topics and additional prerequisites are selected at the discretion of the instructor.

Prerequisites: (FIN 300 or FIN 301) and (MAT 123 or MAT 155 or MAT 161)

Attributes: Undergraduate

FIN 493 Independent Research I (3 credits)

Independent study may be approved to allow a student to pursue an in-depth study of a finance topic. Acceptable Independent Study topics include traditional research/reading programs, as well as rigorous pre-approved internship programs with an appropriate academic component as defined by the Department Chair.

Prerequisites: (FIN 200 or FIN 225) and DSS 210

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major, minor, or concentration in Finance.

Attributes: Undergraduate

FIN 494 Independent Research II (3 credits)

A second semester of independent study may be approved to allow a student to continue to pursue an in-depth study of a finance topic. Acceptable Independent Study topics include traditional research/reading programs, as well as rigorous pre-approved internship programs with an appropriate academic component as defined by the Department Chair.

Prerequisites: (FIN 200 or FIN 225) and DSS 210

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major, minor, or concentration in Finance.

Attributes: Undergraduate

FIN 509 Curricular Practical Training (1 credit)**FIN 550 Shareholder Value Management (3 credits)**

This course covers the concepts and practices of value-based financial management. Topics include financial analysis and forecasting, application of time value of money, valuation and stock market signals to management, introduction to risk and modern portfolio theory, capital budgeting, options, cost of capital, and capital structure. This course emphasizes value creation and the role of domestic and international financial management in facilitating this process. ACC 550 and DSS 560 are highly recommended for traditional MBA students, but are not required prerequisites for the course.

Prerequisites: HSB Foundation with a score of FN500

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 551 Managerial Finance (2 credits)

This course picks up with a review of the WACC and applies this to the capital budgeting process. In this module, cash flow projections and initial outlay concepts are developed. The NPV and IRR rules are developed and extended to a general decision making framework. The last section of the module focuses on the concepts of firm valuation and the effects of leverage on the organization.

Prerequisites: FIN 504 or FIN 504 Waiver Score with a score of 1 or HSB Foundation with a score of FN504

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 575 Fundamental Financial Analysis (3 credits)

This course explains how accounting information influences financial decisions. The course prepares students to interpret financial statements, evaluate the alignment between business strategies and financial performance, identify potential business risks, and compare the performance of different companies. The course highlights the role of historical financial information in the forecasting and valuation processes.

Attributes: Graduate

FIN 600 Fin Institutions & Capital Mkt (3 credits)

This course is designed to expose the student to the operations of financial markets and financial institutions which exist within the U.S. financial system. Topics include the financial markets, the properties of the major financial securities traded in these markets, the behavior of interest rates, key characteristics and regulations of major financial institutions, including their risk exposures and various strategies to manage these risks.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 601 Personal Financial Planning (3 credits)

Personal Financial Planning is designed to provide those students who will be dealing with individuals rather than a business entity as a career, an understanding of the problems and concerns that arise in an individual's life cycle. Students will learn how to reach appropriate decisions regarding the allocations of personal wealth between current consumption and future consumption. Current consumption decisions would include discussions of metrics covering the optimal consumption pattern for major purchases, e.g. houses and automobiles, more routine purchases, such as insurance coverage. In addition, the course will examine the appropriate use of credit, either through standard loan contracts or the use of credit cards. There will also be a discussion of the existing consumer protection laws and their effect on individual consumption patterns. Future consumption allocations will include a discussion of metrics involved in reaching optimal decisions regarding long-term health care, retirement, and estate planning.

Prerequisites: FIN 550 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 602 Portfolio Management (3 credits)

This course covers the theory and practice of portfolio management. Topics include asset allocation, capital market models, risk assessment, performance evaluation, mutual funds, international diversification, and managing risk with derivative securities. Recent empirical evidence is also covered. FIN 600 is highly recommended, but is not a required prerequisite for the course.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 603 Tax Plan Mgmt Decision Making (3 credits)

This course identifies the tax considerations inherent in many, if not most, personal and business financial decisions. The material covered in this course will allow students to (1) gain an appreciation for the operation and complexity of the federal tax system; (2) achieve a working knowledge of essential tax concepts and terminology; and (3) develop a basic understanding of the role taxation plays in the everyday conduct of an individual's personal financial affairs and/or the operation of a business enterprise.

Prerequisites: FIN 550 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 604 Personal Insurance Planning (3 credits)

This course is an introductory course in risk management and insurance. It covers the insurance component of the financial planning track. The focus of the course is to introduce the students to the terminology of insurance, reviews contract law, agency relationships, and an overview of the financial services industry. The course then examines personal property and liability insurance, commercial property and general liability insurance. In addition, there will be a discussion of employee benefits, medical plans, and social insurance programs.

Prerequisites: FIN 550 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

FIN 605 Pensions & Benefits Admin (3 credits)

This course is intended to provide students with a basic understanding of the various pension and employee benefit plans available in the workplace. Emphasis will be placed on preparing professionals to make informed decisions about what types and designs of plans are best for their company or client and about how they can best administer their chosen benefit package. Cross-Listed as FPL 300 for Undergraduate FPL Majors (Classes of 2018, 2019, or 2020, or students who declared the Financial Planning major in 2015 or 2016. Requires permission from the Finance Department Chair.)

Prerequisites: FIN 550 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 606 Estate Planning (3 credits)

This course will begin with an overview of basic gift, estate, and generation-skipping-transfer tax law. Fundamental topics of estates and gifts will be covered as well as basic estate planning documents and estate devices. The student will explore how to apply these topics through real-life cases. The second half of the course will be a more in-depth examination of the tools and techniques of estate planning based on the transfer tax rules taught in the first half of the course. This course will cover in great detail the estate planning techniques for lifetime gifts as well as life insurance planning and estate planning for qualified plans and IRAs. Other areas to be discussed will include ownership of family business entities and limited liability companies.

Prerequisites: FIN 550 (may be taken concurrently)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 607 Risk Management (3 credits)

This course is designed to apply the theories and techniques taught in Finance to the complex and specific needs of managing financial risk in the financial services industry. The course will provide an overview of the banking and insurance markets and their products. In addition, several valuation and risk management tools and models designed to measure and manage equity risk, interest-rate risk, and default risk in the financial services sector of the economy will be introduced and implemented.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

FIN 608 Advanced Financial Management (3 credits)

This course covers the theory and practice associated with the management of long-term assets and long-term capital. Topics include single-period and multi-period evaluation of investment opportunities under certainty and uncertainty, risk analysis, capital structure, dividend policy, cost of capital, and firm valuation.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 609 International Finance (3 credits)

This course describes and analyzes the structure and function of international money and capital markets with special consideration for the economics of foreign exchange markets, export/import finance, international financial institutions, Euromarkets, alternative forms of international monetary structure and comparative financial structures.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

FIN 610 Security Analysis & Investment (3 credits)

This course examines security valuation techniques. Topics include fundamental and technical analysis of stocks, bonds, and derivative securities; earnings estimation, risk assessment, and valuation of individual securities.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

FIN 611 Mergers and Acquisitions (3 credits)

This course will cover the theory and evidence concerning mergers and acquisitions and the market for corporate control. It will examine the accounting and evaluation aspect of merger and acquisition activities, discuss the alternative theories of mergers and acquisitions, and review the relevant empirical tests. Mergers and acquisitions activity is evaluated in terms of the strategic alternatives faced by the firm. Restructuring, leveraged buyouts, share repurchases, and takeover defenses etc. are also studied from both a finance and a strategic perspective.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 612 Derivative Markets (3 credits)

Derivatives are financial instruments whose returns are derived from those of other financial instruments. Derivatives can be based on real assets, such as agricultural commodities, metals, and sources of energy, or financial assets, such as stocks. This course is designed to have students learn about the characteristics of the institutions and markets where these instruments trade, the manner in which derivative prices are determined, and the strategies for the effective use of the instruments.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 613 Applied Investment Management (3 credits)

Applied Investment Management provides students with a practical, hands-on education, and an opportunity to manage a live portfolio. The course emphasizes the valuation principles and modern portfolio theory learned in prior classes. This course is taught using a combination of lectures, videos, case studies, readings, and research reports. It is taught over 16 weeks, meeting on a bi-weekly basis, to provide students with the opportunity to analyze the market over a longer period of time. During the course, students work on teams to construct a portfolio through the selection and allocation of equities, write an analyst report, and make a presentation. Short-term trading is not emphasized during the semester.

Prerequisites: FIN 610

Attributes: Graduate

FIN 614 Acct, Fin, & Econ Health Care (3 credits)

In this case-based course, students will improve their decision-making abilities through the logical applications of accounting, financial and economic concepts of health care. Topics covered will include external financial reporting, management control decisions, cash flow management, operational budgeting and comparative analysis of various health care systems. The non-profit and international health care viewpoints will also be explored.

Prerequisites: FIN 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 620 Fin Plan Dev&Presentn Capstone (3 credits)

This course will require students to synthesize and apply comprehensive financial planning concepts and techniques to client circumstances.

The course will require students to perform all functions of the financial planning process. This course is part of the course sequence that fulfills the education requirements to sit for the CFP® certification examination and is especially beneficial for those individuals who are pursuing the CFP® certification. Cross-Listed as FPL 495 for Undergraduate FPL Majors (Classes of 2018, 2019, or 2020, or students who declared the Financial Planning major in 2015 or 2016. Requires permission from the Finance Department Chair.)

Prerequisites: FIN 601 and FIN 605

Restrictions: Enrollment limited to students in the MSFINS program.

Attributes: Graduate

FIN 624 Intro to Markets & Investments (2 credits)

The main objective of this course is to provide the student with a sound understanding of both the theory and practice associated with Investments. Topics included in this course are Financial Markets and Instruments, Risk and Return, Efficient Diversification, Capital Asset Pricing Theory, Arbitrage Pricing Theory, Performance Evaluation and Active Portfolio Management, and Efficient Markets. In addition, the course looks to improve your use of technology in an investment analysis setting by spending time in the trading room working with multiple financial data packages.

Attributes: Graduate

FIN 770 Special Topics in Finance (3 credits)

The topics course covers subjects of current interest in the field of finance. Specific topics will be announced in the course schedule.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FIN 773 Internship (3 credits)

An approved internship in finance.

Food Marketing (FMK)

FMK 170 Special Topics in FMK (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

FMK 202 Overview of the Globl Food Ind (3 credits)

In addition to principles of marketing, this is the foundation course for food marketing majors. The objective of the course is to familiarize students with the global food industry at all levels and in all segments. Basics of agricultural production and economics, food distribution, wholesaling and retailing, both on the retail and foodservice sides of the business, will be covered. We will also cover the critical issues impacting the industry including the decline of food at home, the growth of foodservice and the food-away-from-home market, the impact of consolidation, increasing concentration and globalization on the industry's structure, conduct and performance.

Attributes: Haub Co-op Program, Irish Studies Course, Undergraduate

FMK 250 The Future of Food (3 credits)

This course covers the importance of food to the development of civilization as well as its future. The first part of the course will be devoted to the history of food, eating and its relationship to culture, from the prehistoric hunter-gatherers to what we are experiencing today with some people "Eating to Live" and some people "Living to Eat". The second part of the course will be devoted to understanding the modern food system within the developed world with particular emphasis on the ethical/food justice issues that are currently being debated: organic/conventional, buy local, genetic modification, sustainability, obesity, hunger, food insecurity, food deserts, fair trade, free trade, food safety & other topics.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, Irish Studies Course, Undergraduate, GEP: Writing Intensive

FMK 270 Special Topics in FMK (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

FMK 301 Food Marketing Research (3 credits)

The food industry and the companies that make up the industry are all driven by information. This course will focus on the sources and applications of the information used to make food marketing decisions. The traditional marketing research process will be covered. Applications such as attitude research, product testing and advertising testing will be highlighted. In addition, there will be a great deal of emphasis on the methodology and application of syndicated data such as panel data, scan data, and other information products, such as geodemographic segmentation data.

Prerequisites: DSS 210

Attributes: Undergraduate

FMK 302 Undrstndg Food Cust & Consumrs (3 credits)

This course will combine traditional consumer and buyer behavior theory and methods with a focus on the food industry to help students understand and predict how both household and food supply chain buyers will react to marketing and other stimuli. Concepts such as perceptions, attitudes, and individual and group behavior will be covered, with a specific focus on issues related to the marketing of products to consumers via the global food industry.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 303 Food Marketing Communication (3 credits)

Discussion of the strategy and tactical tools and techniques required to create and execute an integrated marketing communications program in the food industry. We will cover the issues and elements of advertising, sales promotion, and personal selling strategies, with primary emphasis on the advertising function. Targeting, the creative process, media options, budgeting, and evaluation of advertising will be highlighted.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 310 Brand Strategy (3 credits)

This course addresses the brand management challenge of designing and implementing the best combination of marketing variables to carry out a food company's strategy in its target markets. This course presents an integrative, dynamic view of competitive brand strategy applicable to supplier, manufacturer, distributor and retailer levels in the supply chain. It focuses on understanding, developing and evaluating brand strategies that yield a distinctive competitive advantage based on customer, and competitor analysis will be presented and applied in various situations throughout the course. Topics include strategies for pioneering brands, strategies for late entry, growth strategies, strategies for mature and declining markets, and defensive marketing strategies.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 311 Food Retailing (3 credits)

Today's food retailer faces a series of unique challenges that may be different than any other challenges that she/he have faced. This course looks at the fundamentals of food retailing together with their application(s) to the structural changes taking place in the food retailing landscape. A critical part of this course will be student teams working on a "Challenge" project with TARGET STORES on a problem/situation that TARGET STORES is facing. Cash prizes will be awarded to teams presenting the most unique and actionable solution to TARGET STORES problem/situation

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 312 New Product Development (3 credits)

This course covers the processes and issues involved in conceiving, developing and launching new food and allied products into the retail market for both consumer and foodservice products. Topics covered include new product strategies and approaches, organizational structures, steps in the process, new product research, and creating programs to support product introduction. The course includes a semester-long project whereby student teams will research a product category, create a new product concept, and develop and present a launch program.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 313 Food Distribution & Logistics (3 credits)

This course emphasizes the efficient movement of food products from the farm to the table. This course will include discussion of the characteristics of supply chains, the concepts of efficiency in logistics, demand and inventory management and flow, transportation system management, network design and control, and performance measures and pricing decisions. All of these topics will be covered from both global and domestic and retail and food service perspectives.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 314 International Food Marketing (3 credits)

The concepts, methods and challenges of firms doing business in international markets are discussed. Specific economic, political, legal, cultural and competitive risks are examined. The focus will be on the operation of food suppliers, manufacturers, distributors, and retailers and foodservice operators in the international marketplace. Attention focuses on the need to adapt to diverse business conditions and geographic markets.

Prerequisites: FMK 202 or MKT 201

Attributes: Irish Studies Course, Undergraduate

FMK 315 Globalization and Food Policy (3 credits)

An examination of the global trade environment for agriculture and foodstuffs and an introduction to the numerous policy agencies overseeing food trade and food policy, such as the WTO, UN, FAO, WHO, Codex Alimentaries, EU and other governmental bodies. Attention will focus on global issues impacting the economics of the food industry including biotech crops, health claims, obesity, food bioterrorism, novel ingredients, environmental policies, corporate consolidation, food advertising, hunger, and infectious diseases such as Mad Cow and Hoof and Mouth. The course will qualify towards Faith/Justice certificate/minor fulfillment.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 316 Selling Skills & Decisn Making (3 credits)

This course focuses on providing students with the comprehensive knowledge and skill base necessary for making and executing data-based decisions and plans. Methods of critical evaluation of data needed to support marketing and customer event planning, implementation, and evaluation will be stressed. Students will use syndicated sources and commercial software to analyze and evaluate data, assemble strategies and assess outcomes for CPG and foodservice.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 317 Sales Mgt for CPG & Foodserv (3 credits)

This course studies the complex and demanding responsibilities of sales management, for both consumer packaged goods and foodservice. The course will include creation of the sales strategic plan, managing the sales force, coordination of the interface with marketing, establishing sales force objectives, forecasting, understanding customer relationships, motivating and training the sales force and the role of fact-based decision making. Topics will also include the relationship of the sales force to the chief executive officer and social, ethical and legal responsibilities of sales management.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 318 Retail Food Market Management (3 credits)

Most management decisions and strategies in food marketing today are driven by the analysis of shopper, competitive, and business data; often based on very large data sets. To prepare students to be successful in this new environment, this course will use Excel, IRI/Nielsen data sets, and other quantitative tools to work through analysis and planning at the interface between food manufacturers and food distribution channels (e.g. Grocery and Foodservice). Common food industry business practices such as category management and promotion and media optimization will be examined. There will be opportunities to add realism through the use of case studies and in-class competitions based on actual companies

Prerequisites: (FMK 202 or MKT 201) and DSS 220

Attributes: Undergraduate

FMK 320 Foodservice Marketing (3 credits)

This course provides the food marketing student with an overview of the foodservice industry. It is an introduction into the supply chain members- suppliers, manufacturers, brokers, distributors, logistics providers, foodservice operator customers and finally the foodservice consumer in the food-away-from-home market (FAFH) market. The drivers of FAFH will be studied including consumer, demographic, organizational, culinary, and technological and their roles in foodservice marketing. In addition, the structure of the industry will be studied to understand the wide variety of operations across the commercial and non-commercial (on-site) foodservice venues and their unique marketing issues.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 330 Interntl Food Mktg Study Tour (3 credits)

Specially designed on-site tour to varying international locations which offer students a unique opportunity to experience and study the global food industry. The tour may include visits to food industry suppliers, growers, manufacturers, distributors, regulators, and retailers. Students will be introduced to the marketing and business issues of the global food industry and experience the culture and pace of the world's major cities. The course will involve pre- and post-meetings and assignments.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 331 On Site Food Service (3 credits)

This course provides an introduction into the roles and factors that affect the product selection, menus, operations, marketing, merchandising and promotions of on-site (non-commercial) foodservice operations. Students will develop an understanding of the decision making factors that shape the marketing strategies and tactics in each segment of the on-site foodservice. Segments reviewed in this course include schools, colleges and universities, businesses, healthcare, sports and entertainment venues, parks and recreation facilities, military, transportation, vending and corrections. In addition to class learning, students will participate in local tours of facilities to analyze and critique the similarities and differences in the operator customer strategies and marketing techniques.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 332 Commercial Food Service (3 credits)

The bloomin' onion, a "Happy Meal", "take it up a notch". How do all these tactics help create the marketing strategies and positions of these successful restaurants? This course will provide students in depth look at the restaurant industry-how the roles of chefs, menus, marketing strategy, positioning, themes, signature items and economics make a success or failure of a restaurant or chain. Students will review the structure, and functions of this industry and how it compares to the supermarket industry. In addition to class learning, students will participate in local tours of facilities to analyze and critique the similarities and differences in the operator customer strategies and marketing techniques.

Prerequisites: MKT 201 or FMK 202

Attributes: Undergraduate

FMK 333 Foodserv Manufactg & Distribtn (3 credits)

This course examines the dynamics of the ever changing distribution network between a manufacturer and the food service operator. Manufacturers face the challenges of maintaining or increasing their market share against the competition and selecting the best distribution channels to get their products to the foodservice operator. Distributors' challenges include the increased costs of operations and pressure between balancing manufacturer brands or their own private label brands and how that affects what foodservice operators and customers will buy. Students will learn what roles logistics and ordering technologies, marketing incentives, and direct or brokers sales forces play in the success of a manufacturer product as it travels through the distribution channel.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 355 FMK Industry Case Challenge (1-3 credits)

This course will be focused on developing and presenting a marketing strategy case to compete in national food industry case competitions such as the National Grocers Association (NGA) case competition. Students will learn and practice how to integrate research, strategy, creativity, and presentation skills and outcomes directly useable in executive business situations. The course will draw material from several sources and disciplines. Graded work will be heavily weighted towards presenting components of a final case as developed during the semester. The first part of the course will be spent setting up and developing skills and then transition to working on a real case problem provided from the NGA and potentially other industry organizations. The team that goes to the NGA competition in Las Vegas will be selected from this course.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 370 Digital & Social Media (3 credits)

Digital and social media represent a significant shift and change in consumer behavior, leaving marketers scrambling to take advantage of the changing environment. Consumers are spreading opinions and information about restaurants, food brands and grocery stores on sites such as Yelp, Facebook and Twitter. This course takes a broad look at digital and social media and investigates social networks, social media platforms and online advertising. A common theme throughout this course is to identify and discuss the differences between traditional and social media while highlighting the interaction and synergy between the two for key factors such as word of mouth, sales promotions and advertising. At the end of the course, students have the knowledge and insights necessary to establish key, clear marketing objectives and strategies, choose the proper social media platforms and measure the effectiveness of the online campaigns.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 401 Food Marketing Strategy (3 credits)

With a focus on food and consumer products marketing, strategic concepts such as leadership, business definition, situation assessment, planning and objectives, and strategy selection and implementation will be covered, along with strategies that work in different competitive and market situations. Both the theory and application of strategic decision making will be highlighted.

Prerequisites: FMK 202 and (FMK 301 or FMK 713) and FMK 302 and FMK 303 and FMK 318

Attributes: Undergraduate

FMK 402 Future Issues in Food Mktg (3 credits)

This course will be periodically offered to cover a variety of different topics that are timely, significant or contemporary. Each time the course is offered it will focus on a different and specific food marketing topic. Examples of courses that might be offered include Marketing to Hispanic Consumers, Strategies for Marketing Nutrition and Health, and Technology and the Food Supply Chain and others that may evolve. All future issues courses can be used to satisfy a general upper division course requirement or a free elective.

Prerequisites: FMK 202 or MKT 201

Attributes: Undergraduate

FMK 403 Independent Study Food Mktg (3 credits)

This course is designed to accommodate those students who have an interest in a research-worthy topic that can be examined on an independent research basis. The student will work closely with a professor on a research area that will require the identification of a topic, a literature review, appropriate methodology, and analysis. Chair approval required.

Attributes: Undergraduate

FMK 470 Special Topics in FMK (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

FMK 493 Independent Research I in FMK (3 credits)

Students will study a topic in food marketing with a faculty mentor.

Attributes: Undergraduate

FMK 494 Independent Research II in FMK (3 credits)

Students will study a topic in food marketing with a faculty mentor.

FMK 509 Curricular Practical Training (1 credit)**FMK 570 Special Topics (3 credits)**

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

FMK 710 Introduction to Agribusiness (3 credits)

This course examines the agribusiness industry and looks at the production and marketing of agricultural products. This course will use a marketing lens as well as case studies to explore how agricultural products are sourced and moved through the supply chain.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 711 Overview & Mgmt: Food & Beverage Ind (3 credits)

The purpose of Overview and Management of the Food & Beverage Industry is to introduce students to concepts and terminology within the food and beverage industry. This will focus on various aspects of the food supply chain from agriculture to retail, as well as the supporting activities that comprise this supply chain. In addition, students will focus on how these key concepts and techniques are useful in appraising and prioritizing marketing activities within the broader context of firm management.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 712 Overview Hospitality Industry (3 credits)

This course examines the hospitality industry at a macro level, along with the environment in which the hospitality industry operates. As an overview course it is designed to introduce students to the fundamentals and trends of the hospitality industry with a focus on lodging, food service and beverage operations. The course will focus on hotel/lodging operations and include dining and catering, culinary development, various restaurant hospitality segments such as FSR, QSR, Fine Dining, and Ghost Kitchens. Additionally, the course is designed to ensure students understand consumer expectations and how management and staff can deliver a great hospitality experience.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 713 Food & Beverage Mktg Strategy (3 credits)

Food and Beverage Marketing Strategy is designed to allow the student to integrate and apply the various marketing tools and techniques associated with developing a winning marketing strategy. Topic sequence has been structured around the strategic marketing planning process.

The major learning vehicles will be the analysis of marketing strategy in a competitive context and the identification of the rules of strategy. Time will be spent discussing topics such as defining the business, assessing the business situation, analyzing the environment, analyzing the product portfolio, and identifying competitive market structures.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 714 Food & Beverage Mktg Analytics (3 credits)

Food and Beverage Marketing Analytics, Data, Forecasting, and Pricing is designed to help understand the wealth of data available to food and beverage marketers. It will focus on solving food and beverage industry questions using food and beverage industry data. Particular attention will be paid to how to interpret the data as well as how to select relevant data for specific questions. Several different types of questions will be covered including general customer analytics, demand forecasting, and pricing optimization.

FMK 722 Food & Beverage Mktg Research (3 credits)

Food & Beverage Marketing Research will be an introduction to the market research process with applications to either students' own companies or companies in the market place. This course will cover secondary, qualitative and quantitative research, as well as converting management problems to answerable research questions. Each section will have a focus on best practices to collect and interpret the data. One major focus of the course is qualitative research as it is a powerful tool which plays a part in conducting food and beverage marketing research into customer value analysis, branding and naming, new product launch, customer satisfaction, and market segmentation, among other food and beverage marketing areas. Its techniques include all types of focus groups, in depth one-one-one interviews, intercept studies and observational research. Another major focus is quantitative research and survey design. This section of the course will help students understand how to write surveys and interpret surveys that are unbiased and help them develop real, tangible consumer insights. Then, the course will focus on the strategic decisions that market research can help influence, as well as the future of market research. Students will be assessed by completing a full market research report from hypothesis generation to analysis and will involve all three aspects of the research process.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 724 Revenue Growth Management (3 credits)

This class brings to life an understanding of Revenue Growth Management in CPG, and how to achieve RGM Excellence at the center of commercial integration. Students will learn more around “ways-of-working” and how RGM is the central conductor of the entire commercial process. We'll get specific on the practice, the skills, the people, and discipline needed to collaborate for excellence! Students will gain an understanding of the trade-offs when taking price is a critical component of RGM. It requires a balance of art and science, where more often than not, math and science are running the show. However, communication, different channels, and supply chain constraints play a role. As inflationary pressures build, you'll learn how proper planning, collaboration, and responsiveness lead to better outcomes for teams and trading partners. This class will have a number of guest speakers who are expert in the area of Consumer Products and RGM. The class will listen to each speaker and then discuss how this applies to their experience, products, and companies.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 725 Food & Beverage Consumer Insight (3 credits)

Consumer Insight and Food & Beverage Consumer Behavior applies concepts, principles, and theories from the various social sciences (psychology, anthropology and sociology) to the factors that influence the acquisition, consumption, and disposition of consumer packaged products, services, and ideas. Knowledge of consumer behavior principles is becoming increasingly important for the food and beverage marketing manager and the public policy maker. Quite simply, in order to make good decisions the manager must have an understanding of how consumers are likely to respond to the actions of the firm or the government. In addition, an understanding of the factors that influence consumers may assist an individual in understanding their own buying patterns.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 726 Innovation & New Product Dev (3 credits)

Innovation & New Product Development describes the processes and issues involved in conceiving, developing and launching new food and beverage products into both the retail and foodservice markets. Topics covered include new product strategies and approaches, organizational structures, steps in the product development process, new product research, and creating marketing and sales programs to support product introduction. Application of skills will be demonstrated through individual written assignments and a team-based new product development project.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 728 Qualitative Techniques (3 credits)

This course will be an introduction to the market research process with applications to either students' own companies or companies in the marketplace. This course will cover qualitative research, as well as converting management problems to answerable research questions. Each section will have a focus on best practices to collect and interpret the data. The focus of the course is qualitative research as it is a powerful tool which plays a part in conducting food and beverage marketing research into customer value analysis, branding and naming, new product launch, customer satisfaction, and market segmentation, among other food and beverage marketing areas. Its techniques include all types of focus groups, in depth one-one-one interviews, intercept studies and observational research. Students will be assessed by completing a full market research report from hypothesis generation to analysis and will involve multiple qualitative methods. This course counts for the market research requirement in the Food Marketing MBA.

Attributes: Graduate

FMK 729 Quantitative Techniques (3 credits)

This course will be an introduction to the market research process with applications to either students' own companies or companies in the market place. This course will cover quantitative research, as well as converting management problems to answerable research questions. The major focus is quantitative research and survey design as well as secondary research. This section of the course will help students understand how to write surveys and interpret surveys that are unbiased and help them develop real, tangible consumer insights. In addition, we will cover introductory statistical techniques to analyze quantitative research. Students will be assessed by completing a full market research report from hypothesis generation to analysis. This course counts for the market research requirement in the Food Marketing MBA.

Attributes: Graduate

FMK 730 Cust Serv Excell Hospitality (3 credits)

This course explores the dynamics of customer experience and need for service excellence as a competitive differentiator in the hospitality industry with a focus on lodging/hotel operations, and accompanying food and beverage operations. The course is designed to explore and evaluate customer service strategies, systems, and approaches that create service excellence resulting in high customer evaluation, retention, and loyalty. Students will examine the best practices to build a service-minded workforce to establish a culture of service excellence that raises the standard of service for an organization, business unit, division, or team.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 732 Consumer Advertising & Promo. (3 credits)

Communications in Food & Beverage Marketing is designed to investigate the strategy and tactics required to create and execute an integrated consumer marketing communications program in the food industry. Communication theory and application will be discussed in their relation to advertising. Targeting, the creative process, media options, budgeting and the evaluation of advertising and consumer promotion will be highlighted. Effective creation, communication and implementation of promotional strategies will be evaluated. The role of consumer promotions (coupons, rebates, contests, sampling, etc. within the context of Marketing Strategy will be examined, as well as their advantages and limitations. Creative strategies to maximize impact and program development/evaluation will also be discussed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 734 Trade Promotion & Optimization (3 credits)

While consumer advertising and promotion is more visible to the consumer, trade promotion is about half of a food companies' budget. One can think of consumer promotion getting product to move off the shelf, trade promotion is how to get products on the shelf. This course will look at the various forms of trade promotion such as off invoice, bill backs, slotting allowances, advertising allowances, sponsorships, end caps etc. Attention will be given to optimization of trade promotions.

Attributes: Graduate

FMK 735 Event Planning & Execution (3 credits)

The use of event marketing as a strategy to reach consumers beyond traditional advertising and promotion mediums has become increasingly important as a marketing tool. The course will focus on how to plan and execute events including event program planning and design, marketing and program evaluation to effectively engage prospective consumers, build brand awareness, and market a company's products and services.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 742 Multicul&Int Food&Beverage Mkt (3 credits)

Multi-Cultural & International Food & Beverage Marketing will explore the opportunity for food and beverage retailers and manufacturers to increase sales by better understanding the tastes and needs of an ethnic community. As the U.S. consumer demographics are shifting, it is critical to have a better understanding of current customers and potential customers. We will discuss products, advertising, promotional opportunities, community relations and important holidays. The goal will be to show how companies can create an "attitude" that will let people find the foods and beverages that they want in an atmosphere that makes them feel good. While the growth markets are the emerging markets, the bulk of food and beverage trade is still in the developed markets of the world such as the E.U., Canada, and Asia. This course will study exactly what the new rules of trade are and how they affect American food business. This course also explores the expanding market opportunities in the BRIC (Brazil, Russia, India and China) for food and beverage products and retailing formats, focusing on how business models differ between emerging countries and between developing countries.

Restrictions: Enrollment limited to students in the MBAFMKT or MSFMKT programs. Enrollment is limited to Graduate level students.

FMK 743 International Marketing (3 credits)

While the "growth markets" are the emerging global markets, the bulk of food and beverage international trade is still in the developed markets of the world such as the E.U., Canada, and Asia. This course will study exactly what the rules of trade are in global food marketing and how they affect American food business. This course also explores the expanding market opportunities in the BRIC (Brazil, Russia, India and China) for food and beverage products. The course will also focus on how business models differ between emerging countries and between developing countries.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 753 Food & Beverage Retail Mktg (3 credits)

Retailing in the food and beverage industry is constantly changing. From dollar stores to full service supermarkets to online venues, the industry has never been more diverse and competitive. Food & Beverage Retailing Marketing will seek to understand the strategic decisions that retailers make throughout the diversity of retail formats. A variety of perspectives including manufacturer and consumer on the retail landscape will also be covered. Students will be responsible for developing a retailing strategy in this course.

Restrictions: Enrollment is limited to students with a major in Food Marketing. Enrollment is limited to Graduate level students.

FMK 762 Food & Beverage Policy (3 credits)

Sustainability, both operational and environmental, and consumer well-being are driving forces within the food and beverage industry and stimulating key issues in food and beverage policy, especially for food and beverage security, environmental and obesity challenges. Food & Beverage Policy, Sustainability and Consumer Well Being will introduce marketers to fundamentals and current issues in food and beverage policy, sustainability stakeholders, and food and beverage well-being concepts. The course emphasizes a marketing perspective to drive consumer well-being and sustainability for competitive advantage and meaningful differentiation thereby optimizing growth and profitability in the context of a regulated environment.

Restrictions: Enrollment is limited to Graduate level students.

FMK 770 Special Topics (3 credits)

Future Issues/Special Topics in Hospitality Management is designed to address new and emerging trends, evolving areas that have just appeared on the hospitality front, or issues that merit special examination.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 772 Foodservice Mktg Management (3 credits)

Foodservice Marketing Management provides an introduction to the role and function of foodservice marketing and the foodservice marketing channel. Students will develop an understanding of the commercial and non-commercial on-site segments and the underlying factors and processes that shape strategy and tactics for foodservice marketing. This course examines the dynamics of the ever-changing distribution network between a manufacturer and the foodservice operator. Manufacturers face the challenges of maintaining or increasing their market share against the competition and selecting the best distribution channels to get their products to the foodservice operator. Distributors' challenges include the increased costs of operations and pressure between balancing manufacturer brands and their own private label brands, and how that affects what foodservice operators and customers will buy. Students will learn logistics and ordering technologies, marketing incentives, and how direct or brokers sales forces play in the success of a manufacturer product as it travels through the distribution channel.

Restrictions: Enrollment is limited to Graduate level students.

FMK 781 Indep Study: Food & Bev Mktg (3 credits)

Independent Study in Food and Beverage Marketing is designed to accommodate those students who have an interest in a research-worthy topic that can be examined on an independent research basis. The student will work closely with a professor on a research area that will require the identification of a topic, a literature review, appropriate methodology, and analysis.

Restrictions: Enrollment is limited to students with a major in Food Marketing. Enrollment is limited to Graduate level students.

FMK 783 Food & Beverage Mktg Digi Stra (3 credits)

The food and beverage industry is changing as consumer preferences and technology changes. Digital Strategy for Food & Beverage Marketing investigates current trends in the food and beverage industry focused along technological advances through the internet and social media. Specifically, the rise of online grocery ordering and delivery will be investigated from a consumer and retailer perspective. The best strategies for online ordering will be discussed utilizing consumer behavior and preferences. Additionally, consumers are flocking online and on mobile channels to stay connected with brands through social media sites such as Facebook, Twitter, Snapchat and Instagram. The benefits and strategies for these social networking sites will be analyzed and discussed. The strategies for engaging customers through the mobile platform will also be discussed including loyalty programs, product information and shopping assisting tools.

Attributes: Graduate

FMK 784 Food & Beverage Indry Summit (2 credits)

The content for Food & Beverage Industry Summit seminar is based on the annual Department of Food Marketing Food Industry Summit event. Students will attend the one day event and then continue the discussion of the topic during the second day of the course. The actual topics for the course are determined when the Department selects the topic for the Food Industry Summit. These will be contemporary and important issues to the industry.

Restrictions: Enrollment limited to students in the MBAFMKT or MSFMKT programs. Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 785 ST: Food & Beverage Mktg (3 credits)

Future Issues/Special Topics in Food and Beverage Marketing is designed to address areas that will be very contemporary and may have just appeared on the food and beverage horizon or issues that warrant special examination. These may be open to the public for either all or part of the course.

Restrictions: Enrollment is limited to students with a major in Food Marketing. Enrollment is limited to Graduate level students.

Attributes: Graduate

FMK 795 Capstone (3 credits)

This integrative course is designed to permit students, near the end of the course of study, to integrate the knowledge from their previous courses. Also, this capstone course is intended to give students the opportunity to demonstrate the application of the concepts learned during their tenure in the program.

Attributes: Graduate

French (FRE)

FRE 101 Beginning French I (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students with no experience with the French language. Fulfills one course of a sequence that fulfills the non-native language requirement.

Prerequisites: French 101 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the French 102 Placement, French 201 Placement, French 202 Placement or French 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

FRE 102 Beginning French II (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice mid/high level according to ACTFL - American Council on the Teaching of Foreign Languages. Fulfills the non-native language requirement.

Prerequisites: FRE 101 or French 102 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the French 201 Placement, French 202 Placement or French 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

FRE 102L Beginning French II Lab (0 credits)

Required lab component for FRE 102.

Attributes: Undergraduate

FRE 170 Special Topics in French (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

FRE 201 Intermediate French I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice high/intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages. Fulfills the non-native language requirement.

Prerequisites: FRE 102 or French 201 Placement with a score of 1

Restrictions: Students with the French 202 Placement or French 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

FRE 202 Intermediate French II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar, pronunciation, and writing will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the intermediate low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. Fulfills the non-native language requirement.

Prerequisites: FRE 201 or French 202 Placement with a score of 1

Restrictions: Students with the French 301 Placement attribute may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

FRE 270 Special Topics in French (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

FRE 301 French Conversation (3 credits)

This course is designed to help students improve their oral communication skills in French through participation in interactive tasks. Much attention will be paid to the practice of new vocabulary. Discussion of grammar and communicative strategies will be integrated as needed in order to facilitate students' attempts at various rhetorical functions, such as describing, narrating, explaining, defining, expressing and supporting opinions, and tailoring the discourse to the audience and context. This course is aimed at developing the intermediate mid/high level according to ACTFL - American Council on the Teaching of Foreign Languages. Counts toward the Francophone Studies Program. Fulfills the non-native language requirement.

Prerequisites: FRE 202 or French 301 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

FRE 302 French Composition (3 credits)

This course is designed to improve students' ability to communicate in written French and to develop the writing skills they will need to succeed in advanced French courses. Skills are developed through a process-oriented approach to writing, including steps related to vocabulary generation, organizing an outline, writing a draft, editing and revising, and writing a final version. Prerequisite: completion of the language requirement in French. Fulfills the Writing-Intensive Overlay requirement.

Prerequisites: FRE 301 or Language Placement with a score of FR302

Attributes: CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

FRE 309 Love and Hatred (3 credits)

Love and hatred are emotions that are at once universal and complicated. Studying these two themes will allow us to discover Francophone literature from diverse genres and time periods. In addition, the course will incorporate videos, music and art to enhance our understanding of the roles played by love and hatred in the Francophone world across the centuries.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 310 Identity (3 credits)

This course focuses on a complex and multi-layered concept at the heart of what it means to be human. Exploring this idea in Francophone literature, music and film will allow us to develop a nuanced view of identity, belonging and community, learning about diverse cultural perspectives while also developing skill at analyzing and commenting on literary texts in different genres.

Prerequisites: FRE 301 or FRE 302 or Language Placement with a score of FR310

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 315 Comp Stylistics & Translation (3 credits)

Students will compare the linguistic structures and modes of expression in English and in French, doing exercises in translation (English-French and French-English) as a means of acquiring a better understanding of both languages and improving their expression in written and spoken French.

Prerequisites: FRE 301 or FRE 302

FRE 318 French for Healthcare (3 credits)

French for Healthcare is a course designed to help students develop French language proficiency and intercultural competencies to facilitate future interactions with French speakers in situations related to healthcare. Students will enhance your healthcare-related vocabulary, communication skills, health literacy, and ability to relate from a cross-culturally responsive perspective. Students will read, write, and speak about a variety of healthcare topics, and multimedia materials are incorporated throughout the course to practice listening. In addition, students will practice oral communication during class discussions, presentations, and role plays.

Prerequisites: FRE 301

Attributes: Undergraduate

FRE 321 Love & Desire in Med Fr Lit (3 credits)

Study of the origin and development of the literature and culture of the Middle Ages. Students will read a selection of texts that evoke love and desire in a variety of thematic form and we will also examine representations of love in desire in music, images, and other cultural products and practices.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 322 Mkg Vces Hrd: FrWomWri MA &Ren (3 credits)

A study of representations of women in works written by French women writers of the Middle Ages and Renaissance, with special emphasis on issues of female identity and voice in the texts.

Prerequisites: (FRE 301 or FRE 302) and ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, Gender Studies Course, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

FRE 325 The Francophone World (3 credits)

This course is an introductory course for the Francophone Studies major while serving simultaneously as a language and culture course for French majors organized around the notion of "Francophonie." There are four major intellectual components to the course: 1) the historical background of French and Belgian colonization (through research and readings), with particular reference to North America, to the Caribbean, to North Africa and to Sub-Saharan Africa; 2) a sampling of critiques of French colonialism; 3) select texts in postcolonial theory; 4) an overview of the contemporary Francophone world.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate

FRE 330 Medieval to Early Mod France (3 credits)

This course offers a cultural orientation to the French nation, focusing on the development of languages, ideas, art, architecture and social, political and economic structures within the geographical area sometimes identified as "The Hexagon," from the tenth century to the seventeenth.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 331 France: Enlightenment to Today (3 credits)

This course offers a cultural orientation to France and the francophone world, focusing on the evolution of ideas, artistic and literary movements, and political, social and economic structures, from the eighteenth century to the twenty-first.

Prerequisites: FRE 301 or FRE 302

Attributes: European Studies Course, GEP: Art/Literature, Undergraduate

FRE 351 French Canada (3 credits)

In this course, we will explore the culture, history, and literature of French-speaking Canada, concentrating specifically on Québec and Acadia.

By focusing on questions of language, heritage, and identity, students will examine what it means to be a Francophone in Canada, deepen their knowledge of the unique cultural contributions made by these communities, and enhance their understanding of the complex identities of French speakers in eastern Canada.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 352 Francophone America (3 credits)

In this course, we focus on the question of identity: What does it mean to be a part of a Francophone community in the United States? By exploring the culture, history, and literature of Louisiana and New England—as well as the places where we see French influence in Philadelphia and at SJU—students will deepen their appreciation of the richness of Francophone communities in the United States and enhance their understanding of the challenges facing members of a group whose language and heritage sets them apart.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 366 Current Events in Fr-LangMedia (3 credits)

This course is intended to give students a better understanding of the contemporary French-speaking world and its cultures through analysis and discussion of current events covered in the Francophone news media, both in France and elsewhere. The course will develop listening and reading skills, as well as writing and speaking skills.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate

FRE 370 Special Topics in French (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the French-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Prerequisites: Language Placement with a score of FR370

Attributes: Undergraduate

FRE 402 Advanced French Composition (3 credits)

This course will develop students' ability to communicate in written French by adding complexity and versatility to their writing skills. The course will guide students in a process-oriented approach to writing, seeking to increase their autonomy as writers and giving them writing and editing practice in a variety of genres.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate, GEP: Writing Intensive

FRE 403 Adv Convrstion: A Just Society (3 credits)

This conversation course focuses on current events and contemporary culture, paying particular attention to ethical thinking and the notion of fairness as a principle of social organization. Discussion of controversial topics will be an important aspect of students' work. The course will be informed by justice-focused ethical frameworks (Rawls, Nussbaum, Pope Francis). Participants will be asked to reflect on and to analyze issues as they are represented in television news reports, newspaper and magazine articles, popular songs, film and other media in French.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Ethics Intensive, Undergraduate

FRE 409 Love and Hatred (3 credits)

Please see the course description for FRE 309. Students taking 409 will have additional reading and projects to do. If you have taken at least three 300-level courses, you should enroll in 409.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 410 The French Novel (3 credits)

Reading, discussion and analysis of novels from a period ranging from the 17th century to the present. The period(s) of study will be selected by the professor.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 412 Short Nar in Francophone Lit (3 credits)

Reading, discussion, and analysis of short stories and folktales from a variety of French-speaking areas, including Europe, North America, Africa, and the Caribbean. We will seek to define the genres and examine how their content and form change over time and by region, which will foster an understanding of how the tales reflect the culture(s) in which they were produced.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 413 French Poetry (3 credits)

A study of the various forms of French poetry with a particular emphasis on the evolution of the genre from Romanticism to Modernism.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 414 The French Essay (3 credits)

Reading, discussion, and analysis of selected works of representative essayists from the 16th to the 21st century, including Montaigne, Pascal, Diderot, Gide, Camus, Sartre, Barthes, Foucault, and Derrida.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 421 Love & Desire Med Fr Lit & Cul (3 credits)

Please see the description for FRE 321. Students taking FRE 421 will have additional readings and projects to complete. Students who have taken at least three 300-level courses should enroll in FRE 421.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 422 Mkg Vces Hrd: FrWomWri MA & Ren (3 credits)

Please see the description for FRE 322. Students taking 422 will have additional reading and projects to do. If you have taken at least three 300-level courses, you should enroll in 422.

Prerequisites: (FRE 301 or FRE 302) and ENG 101

Attributes: CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, Gender Studies Course, GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate, GEP: Writing Intensive

FRE 431 The French Enlightenment (3 credits)

Exploring the meaning of the French label for this period, "le siècle des Lumières," reading a variety of texts by major authors (including Voltaire, Rousseau and Diderot, among others) and discussing the major ideas and intellectual projects of the time are the principal activities of the course. Students will gain knowledge of the literature and the social and intellectual culture of this particularly important period in the history of ideas in the West.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 434 French Romanticism (3 credits)

A study of the origins of French Romanticism, its philosophical background, and its various forms of expression from Chateaubriand to Gerard de Nerval. Although principal emphasis will be placed on the study of the major genres, developments in music and the visual arts during the period will also be studied.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 451 Francophone Canada (3 credits)

Please see the description for FRE 351. Students taking 451 will have additional reading and projects to do. If you have taken at least three 300-level courses, you should enroll in 451.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 452 Francophone America (3 credits)

Please see the description for FRE 352. Students taking 452 will have additional reading and projects to do. If you have taken at least three 300-level courses, you should enroll in 452.

Prerequisites: FRE 301 or FRE 302

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

FRE 461 Caribbean Francophone Liter (3 credits)

This course will teach students to read and appreciate contemporary francophone literature of Martinique, Guadeloupe and Haiti by familiarizing them with the colonial and post-colonial history of the region, its cultural richness and its literary modes. Students will read works in different genres by major authors of the French Caribbean.

Prerequisites: FRE 301 or FRE 302

Attributes: Africana Studies Course, CCC: Literature, GEP: Art/Literature, Latin American Studies Course, Undergraduate

FRE 462 Contemptry Francophone Cinema (3 credits)

An intensive study of selected recent French-language films. The principal activities of the course will be the viewing, analysis, and discussion of a variety of cinematographic works dealing with important issues in the French-speaking world. The course is designed to increase familiarity with francophone cultures, to promote understanding of the film medium, and to improve general language skills, with a particular emphasis on listening and speaking.

Prerequisites: FRE 301 or FRE 302

Attributes: GEP: Art/Literature, Undergraduate

FRE 466 The Francophone Press (3 credits)

An introduction to the press of the French-speaking world. The work of the course may include library and internet research, extensive readings in French-language newspapers and magazines, viewings of television news, round-table discussions of current events and regular writing assignments. The course aims to familiarize students with the contemporary Francophone world and its information media. It is also designed to improve students' general language skills in French.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate

FRE 470 Topics in French (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the French-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate

FRE 471 Economic and Business French (3 credits)

An introduction to business notions and to social, economic and political problems in the francophone business world. The primary focus will be on France, although other French-speaking countries in Europe and elsewhere may also be covered. The course will emphasize the acquisition and use of fundamental economic and business concepts and vocabulary as tools for understanding the francophone business environment and communicating appropriately in a business setting.

Prerequisites: FRE 301 or FRE 302

Attributes: Undergraduate

FRE 490 Internship (3 credits)

An approved internship in French.

Attributes: Undergraduate

FRE 491 Internship (3 credits)

An approved internship in French.

Attributes: Undergraduate

FRE 493 Independent Research in French (3 credits)

Students will study a topic in French with a faculty mentor.

Attributes: Undergraduate

FRE 494 Independent Research in French (3 credits)

Students will study a topic in French with a faculty mentor.

Attributes: Undergraduate

FRE 570 Special Topics in French (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the French-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Gaelic (Irish) Studies (GAE)

GAE 101 Beginning Irish (Gaelic) I (4 credits)

Groundwork in Irish (Gaelic), including oral proficiency, aural comprehension, and reading knowledge; for students with no prior knowledge of Irish. Supplementary language laboratory work and oral drills.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Irish Studies Course, Undergraduate

GAE 102 Beginning Irish (Gaelic) II (4 credits)

Groundwork in Irish (Gaelic), including oral proficiency, aural comprehension and reading knowledge; for students with one semester of Irish study completed. Supplementary language laboratory work and oral drills. Students should have completed MLA 103 or permission of the instructor.

Prerequisites: MLA 103 or GAE 101

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Irish Studies Course, Undergraduate

Genomics (GNM)

GNM 701 Introduction to Genomics (3 credits)

This course explores the history of genetics and genomics. Family history is discussed as a vital part of a genetic risk assessment and tool for the evaluation of inheritance patterns and penetrance of the disease. The course concludes with a review of the epigenetic influences on health and epidemiologic approaches to evaluate health and disease and applications in genomics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 702 Genetic Concepts Testing (3 credits)

The course will serve as the basis for the health care professional to integrate genetics and genomics into personalized healthcare. The course provides a review of sources of information available to you and clinicians in genomic health care for clinical management and therapeutic applications.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 703 Issues in Genomics & Pharma (3 credits)

This course exposes students to the ethical, legal, and social issues surrounding genetic testing and available direct-to-consumer genetic testing. This course will explore approaches for engaging individuals as partners in their healthcare, as well as the expanding applications of pharmacogenomics.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 704 Cancer Genomics & Applications (3 credits)

This course focuses on the role of genetics and genomics in cancer diagnosis, prognosis, and treatment. Future directions of genetics and genomics with comprehensive genome/exome/transcriptome sequencing in oncology, polygenic risk scores, cell-free DNA, and genome-wide and phenome-wide association studies are addressed. Genomic technologies and computational approaches that are driving advances to manage health and treat disease will be reviewed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 710 Principles of Genetics (3 credits)

This course provides you with an introduction to genetics, with a focus on transmission and molecular genetics. The course makes use of bioinformatics to explore gene function and covers pertinent applications of bioinformatics and genetics to modern biological problems. Topics include chromosome structure and replication, variations and extensions of transmission genetics, genetic linkage and mapping, regulation of gene expression, epigenetics, genetic mutations, genetics of cancer, and the principles of genetic engineering.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 715 Chromosomes & Human Disease (3 credits)

This course introduces you to the role of chromosomes in human disease and seeks to familiarize you with the field of cytogenetics, the study of chromosomes, and the relationship between chromosomal abnormalities and human disease. Topics covered include cytogenetic methodology, aneuploidy, chromosome rearrangements, chromosomes and sex determination, and chromosomes and cancer.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 720 Molec Basis Inherited Disease (3 credits)

This course seeks to familiarize you with the molecular basis of diseases of human genetics and its applications to modern research. You will undertake a comprehensive examination of the principles of human inheritance in the context of both normal human variation and human disease. The course explores mechanisms of gene regulation and introduces you to current methods in genome analysis.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 725 Clinical App Genetics & Genomics (3 credits)

The course focuses on the genetic basis of disease and cytogenetic analysis for applications to clinical care. Diagnostic molecular approaches and the clinical translation of genetic and genomic health information in a personalized healthcare environment are explored.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 730 Evolutionary Analysis (3 credits)

This course introduces you to evolutionary science and population genetics, with a focus on the importance of four factors: selection, migration, mutation, and genetic drift. You will evaluate human evolution and its impact on health.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 735 Human Population Genetics (3 credits)

The sequencing of the human genome has led to the emergence of population genomics. This course covers the basics of population genomic analysis, from SNP data to the key analyses that may be required to successfully analyze a population genetic data set. Population genetics topics will also include computational methods and machine learning techniques.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 740 Public Health Genetics (3 credits)

Public health ensures the basic conditions required for individual and population health are present. The role of genetics is evolving, as is the understanding of genetic disease. This course provides students with advances in genetic knowledge and technology that could be used to prevent disease and improve public health.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GNM 745 Genomic Statistics & Research (3 credits)

This course provides you with an introduction to the statistical approaches used in solving problems in genetic epidemiology. Methodological expositions and practical guidelines for software selection are included. Topics include molecular genetics and Mendelian description principles, genetic markers and map distances, model-based and model-free population and family-based and genome-wide association studies, and association analyses using haplotypes.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Geographical Information Systems (GIS)

GIS 101 Introduction to GIS (3 credits)

This course is designed to acquaint students with an introductory examination of geographic information systems (GIS). GIS tools are used to analyze spatial information, manage spatial data, and create maps used to present and visualize data. This course focuses on ArcGIS and how to apply GIS skills to answer research questions. GIS technology is used in a variety of disciplines including humanities, engineering, economics, environmental studies, engineering, management, urban planning, agriculture, forestry, public health, and many others.

Attributes: Undergraduate

GIS 127 Religion & Race in Philadelphia (3 credits)

"Religion and Race in Philadelphia" is a religious studies course that examines the co-constitution of religious beliefs, racial identities, and regional cultures from an historical perspective. This course will look at how the meanings of both "race" and "religion" are produced through the intersections of individuals, institutions, and ideologies in Philly. Using this religious and racial lens, this course will examine how Philadelphians have come to define their city, themselves, their communities, and their relationships to their natural and cultural environments. This course will use various geographical information systems (GIS) to visualize and analyze various aspects of Philadelphia's cultural landscape. No prior experience in GIS is required.

Attributes: GEP: Diversity Course, GEP: Globalization Course, GEP: Non-Western Studies, Undergraduate, GEP: Writing Intensive

GIS 170 Special Topics in GIS (3 credits)

This course examines selected introductory topics and techniques in GIS. Examples include map making, geospatial thinking, web-mapping, cartography and visualization, and the use of applications for specific majors or fields. Course content reflects recent trends in GIS and the job market.

Prerequisites: ECN 101 or GIS 101

Attributes: Undergraduate

GIS 172 Urban Economics (3 credits)

Urban Economics is broadly defined as the economic study of urban areas. This course will teach you how to examine issues that typically occur in urban areas, such as crime, poverty, education, inequality, public transit, and the distribution of public goods and government resources, from an economic perspective. Throughout this course, we will not only examine urban issues theoretically, but also use real-world data and geographic information systems software (GIS) to apply economic theory to examine these issues in real-time.

Prerequisites: ECN 101 or GIS 101

Attributes: GEP: Diversity Course, GEP: Globalization Course, GEP: Non-Western Studies, Undergraduate

GIS 175 Environmental Economics (3 credits)

This course examines the interactions between people and the environment by addressing the challenge of meeting the increasing demand for goods and services while simultaneously conserving natural resources for future generations. This course will also look at several current environmental issues including the effects of climate change, land tenure, globalization and trade, natural resource management, food waste, eco-labelling, and environmental justice. Since human numbers are increasing more rapidly in poor countries than anywhere else, special attention is paid to population growth and the prospects for environmentally sound agricultural development in Africa, Asia, and Latin America. There is a writing component to this course that requires students to write a technical paper on a developing country of their choice. This course will also utilize geographic information systems (GIS) software to apply economic theory to examine global environmental issues; no prior experience with GIS is required.

Prerequisites: ECN 101 or GIS 101

Attributes: CCC: Mission: Global Citizenship, GEP: Globalization Course, Undergraduate

GIS 201 Intermediate GIS (3 credits)

A continuation of GIS 101, this course will prepare students for more advanced geographical analysis and use of geographical information systems (GIS). Students will learn intermediate techniques to analyze spatial information, manage spatial data, and create map layouts to present and visualize data. This course focuses on ArcGIS and other softwares as well as how students can integrate geographic concepts and GIS skills in their major and intended field.

Prerequisites: GIS 101 or INT 170

Attributes: Undergraduate

GIS 270 Special Topics in GIS (3 credits)

This course examines selected intermediate topics and techniques in GIS. Examples include map construction, geovisualization, spatial analysis, and the use of applications for specific majors or fields. Course content reflects recent trends in GIS and the job market.

Prerequisites: GIS 101 or INT 170

Attributes: Undergraduate

GIS 370 Special Topics in GIS (3 credits)

This course examines selected topics and innovative techniques in GIS. Examples include remote sensing, location analysis, web mapping, cartographical design, GIS programming, and the use of specialized applications for specific majors or fields. Course content reflects recent trends in GIS and the job market.

Prerequisites: (GIS 101 and GIS 102) or (INT 170 and INT 270)

Attributes: Undergraduate

GIS 601 Introduction to GIS (3 credits)

This course is designed to acquaint students with an introductory examination of geographic information systems (GIS). GIS tools are used to analyze spatial information, manage spatial data, and create maps used to present and visualize data. This course focuses on ArcGIS and how to apply GIS skills to answer research questions. GIS technology is used in a variety of disciplines including humanities, engineering, economics, environmental studies, engineering, management, urban planning, agriculture, forestry, public health, and many others.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

GIS 670 Special Topics in GIS (3 credits)

This course examines selected advanced graduate topics and techniques in GIS. Examples include remote sensing, location analysis, web-mapping, cartographical design, GIS programming, and the use of applications for specific majors or fields. Course content reflects needs and interests of graduate students, as well as recent trends in GIS and the job market.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

German (GRM)

GRM 101 Beginning German I (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students who have limited experience with the German language. Fulfills the non-native language requirement.

Prerequisites: Language Placement with a score of GR101

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the German 102 Placement, German 201 Placement, German 202 Placement or German 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

GRM 102 Beginning German II (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice mid level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students who have limited experience with the German language. Fulfills the non-native language requirement.

Prerequisites: GRM 101 or Language Placement with a score of GR102

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the German 201 Placement, German 202 Placement or German 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

GRM 201 Intermediate German I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. A review of grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice high/intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages. Fulfills the non-native language requirement.

Prerequisites: GRM 102 or Language Placement with a score of GR201

Restrictions: Students with the German 202 Placement or German 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

GRM 202 Intermediate German II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. A review of grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the intermediate low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. Prerequisite: Fulfills the non-native language requirement.

Prerequisites: GRM 201 or Language Placement with a score of GR202

Restrictions: Students with the German 301 Placement attribute may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

GRM 306 Advanced German Conv & Comp (3 credits)

The purpose of this course is to improve the student's oral and written command of German by further developing the four linguistic skills on an advanced level.

Restrictions: Enrollment is limited to students with a minor in German.

Attributes: Undergraduate

GRM 309 German Civilization & Culture (3 credits)

A survey of the culture and civilization of Germany and other German-speaking countries, their history, politics, economic and social aspects, art, and folklore through the reading of literary texts. Emphasis is placed on modern trends.

Attributes: GEP: Art/Literature, Undergraduate

GRM 330 German Business I (3 credits)

It is true that the world is increasingly more globalized, particularly with respect to business and economic issues. Therefore, it is essential, even for those not directly involved in the business world, to be familiar with its workings and language. Yet it is equally true, despite globalization, that linguistic, cultural and economic differences persist and play an important role in the business world. It is the aim of this course to offer students insights into Business German from a micro point of view.

Initially, we will have a general overview of the German economy, before embarking on a more detailed exploration of German business writing (cover letter, resumes, business correspondences), as well as common German business practices. Particular emphasis will be placed on vocabulary building. Prerequisite: GRM 301 or departmental approval.

Attributes: Undergraduate

GRM 370 Topics in German Culture (3 credits)

The course will survey the most significant aspects of German culture through time. It is designed to give a broad overview of important cultural movements and personalities. We will discuss the highlights of selected areas in the culture of the German-speaking countries: in art, architecture, literature, music, history, politics and science. In particular, we will study representative figures of these areas, especially those who have had an impact on European and world culture.

Attributes: Undergraduate

GRM 493 Independent Research (3 credits)

Students will study a topic in German with a faculty mentor.

Attributes: Undergraduate

Graphic Design (GDS)

GDS 116 History of Graphic Design (3 credits)

An exploration of the relationship between graphic design and its audience, analysis of the evolution of form or visual attributes, and the study of the social and economic impact of design. The course will provide a conceptual and pictorial view of significant stages in the development of graphic design through in-depth study of stylistic periods, design movements and pioneers of graphic design. We will explore design theory, styles, and means of production from the late 1800's through the present day. This course will deliver a design history experience through readings, discussion, lectures, activities, and creative projects.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 190 Fundamentals of Graphic Design (3 credits)

This course introduces students to the main tenants, principles and vocabulary of Graphic Design. Students develop foundational design skills such as layout, composition and organizing design principles, implemented across a variety of visual communication outcomes. Attention to technical proficiency and craftsmanship will be emphasized. This course is taught through Illustrator and Indesign. Critical analysis of personal work as well as others will be introduced through class critiques.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 290 Typography I (3 credits)

This course provides an introduction to the study of the letterform as a cornerstone of graphic design. It focuses on how typography can be used as a communicative device as well as a graphic, compositional and expressive element. Areas explored include letterform anatomy, letterform analysis, typographic systems, typographic identification, and practical issues of typesetting and using type effectively. We will examine hierarchy, scale and font choices. Students will continue to focus on craftsmanship as well as innovation in typographic layouts. Critical analysis of personal work as well as others will be expected as we continue to develop our professional vocabulary.

Prerequisites: GDS 190 or ART 190 or MKT 325

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 292 Typography II (3 credits)

This is an advanced study of typography as a tool and a design element. This course will consist of special projects, which will build upon and expand the knowledge the student has acquired in previous classes. The emphasis of the course will be upon layout design as it applies to print and electronic media. Students learn through concept development, typographical refinements, and polished execution of projects focusing on type relationships. Projects will explore the ability of type to communicate a message while using the typography as the primary visual. This will be accomplished through a combination of lectures, out of class reading or research, assignments/design projects, production of digital comprehensives, discussions in and out of class, and class critiques.

Prerequisites: GDS 290 or ART 290

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 390 Commercial Design (3 credits)

A study of the essential elements of commercial design and advertising including the conceptual and graphic design issues involved in the production of a cohesive campaign—including print, environmental/ guerilla, social media and web-based applications. Principles of design, layout, copy writing and designing cross platform promotional campaigns will be practiced and executed using computer graphic software. Course topics will include anticipating how to visually engage target audiences, creative concept formulation, logo and advertisement design and layout, typography, working with art, as well as an introduction to project management, production timelines and methods. This course transitions students from taking individual approaches to team-based approaches, gearing up for real world agency experience.

Prerequisites: GDS 290 or ART 290

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 392 Editorial Design (3 credits)

This course focuses on the application of text and image to design magazine, book and digital publications. Students will develop a design concept and learn about grids, layout, choosing fonts, and typesetting. Students will explore various fields of publication design including: book design, zines/magazines, catalogs, and digital publications. Design concepts and application of design tools and technical production for printed as well as digital publishing will be explored. Instruction includes lectures, studio-based projects, field trips and in-class guests.

Prerequisites: GDS 292

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 394 User Experience Design (3 credits)

This course provides a comprehensive overview of the user experience design process for web and mobile experiences. Students learn the fundamental methods, concepts and techniques necessary to design useful, functional and visually engaging digital products. The class will cover all phases of the design thinking process as it relates to creating meaningful experiences for users and interactions between users and products.

Prerequisites: GDS 290

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 490 Visual Identity and Branding (3 credits)

This course focuses on creating individual visual identities and branding for clients, implementing systems through the use of typography, color, photography and graphics. Students will examine and develop impactful and cohesive brands through the use of image, type, color theory and best practices. We will address sustainability, social responsibility and brand value. Emphasis will be placed on developing design strategies to inform brand identity design to effectively solve design and communication problems visually. The course will guide students through the design process and creation of professional presentations. Students will create various components including logos, identity systems and identity manuals; as well as the application to various outputs and platforms. (such as stationery, signage, social media and web-based platforms) Students will learn how to apply these concepts through a semester-long, team-based project with an external client.

Prerequisites: GDS 292

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

GDS 492 Portfolio & Professional Pract (3 credits)

This course is designed to provide an understanding of what constitutes a thorough, comprehensive, portfolio appropriate to contemporary graphic design practice. It will emphasize, through assigned projects, the kind of work incorporated in a graphic designer's portfolio, as well as portfolio assembly, presentation skills, and an awareness of client expectations. During the course, students will refine a body of design work and publish their portfolio in both print and web formats. Students will design and develop a consistent visual language for their own professional materials including resume, cover letter and portfolio presentation.

Prerequisites: GDS 490 and GDS 392

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

Health Administration (HAD)

HAD 120 Fin Mgt Hlth Care Organization (3 credits)

An advanced application of the current issues and techniques affecting financial management in the health care system. Topics include cost accounting, cost benefit analysis, accountability in not-for-profit/non-profit institutions, prospective and third party payments, management information systems for operational and fiscal control, and cost containment.

Prerequisites: HAD 100 or HAD 101

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 200 Healthcare Law and Ethics (3 credits)

An overview of the legal and ethical issues central to the health care delivery system and their impact on individual institutions and professionals. The relationships among biomedical and research technology, societal changes, court rulings, and governmental legislation within the context of the health care system will be examined.

Prerequisites: HAD 100 or HAD 101

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 201 Intro to Healthcare Admin (3 credits)

An introduction to the exciting field of healthcare services leadership, focusing on current components, practices, issues and trends in healthcare delivery. Emphasis will be placed on leadership in this extraordinarily complex, social, political, economic, legal and technological system that impacts our communities and nation's health.

Attributes: Undergraduate

HAD 300 Plan & Market Health Care Orgs (3 credits)

An introduction to general strategic planning and marketing for health care systems with particular emphasis on the evolution from a provider-controlled environment to a consumer market. Review of key factors such as rising costs, increasing competition, legislation/regulation, technological advancements, and increased consumer sophistication.

Prerequisites: HAD 201

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 301 Health Info Mgmt Systems (3 credits)

A critical skill for health administrators is to be able to gather, organize, analyze and safely store important health information. This course provides an overview of healthcare information management and applications within healthcare organizations.

Attributes: Undergraduate

HAD 302 Financial Mgmt of Health Orgs (3 credits)

An advanced exploration of current issues and techniques affecting financial management and healthcare systems. Topics will include cost accounting, cost benefit, analysis, accountability, and not-for-profit/nonprofit institutions. Also covered will be prospective and third-party payments, management information, system for operational and physical control, and cost containment.

Prerequisites: HAD 201

Attributes: Undergraduate

HAD 303 Healthcare Quality Improvement (3 credits)

This course seeks to provide students with exposure to current approaches to improving quality and outcomes in a healthcare environment. Topics addressed include basic quality improvement methodologies, regulatory requirements, and the role of critical non-profit partners in addressing quality and monitoring patient outcomes. Students will gain exposure to the role of the National Committee for Quality Assurance (NCQA) HEDIS measurement, Magnet status for nursing, the Leapfrog Hospital Safety Grade, and the Joint Commission.

Prerequisites: HAD 201

Attributes: Undergraduate

HAD 304 Health Policy (3 credits)

A history of healthcare policy in the United States, and how it has evolved over decades. A comparative analysis with other countries, the positives and negatives of the American healthcare delivery system as shaped by policy and discussion about how to enter the debate.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, Justice Ethics and the Law , Undergraduate, GEP: Writing Intensive

HAD 310 Seminar in Hlth Administration (3 credits)

Taken with the Practicum, this course is the capstone for integration between theory and practice of health administration. Each student will be responsible for the preparation of a research paper on a topic in health administration. Topics of emphasis will include health services research, administration in health settings, organizational development, human resource development, and current issues relevant to student field practicums. Students must have permission before enrolling.

Prerequisites: (HAD 101 and (HAD 110 and (HAD 200 and (HAD 120 or HAD 210 or HAD 220

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 320 Healthcare Law and Ethics (3 credits)

An overview of the legal and ethical issues central to healthcare delivery and their impact on individual institutions and professionals. A review of the important cases impacting healthcare, and the relationships between biomedical research, technology, societal changes, and government legislation within the context of healthcare delivery.

Prerequisites: HAD 201

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate

HAD 330 Public Health Epidemiology (3 credits)

The introduction of basic principles and methods in the field of epidemiology. Topics include historical perspectives of epidemiology, measures of disease occur in disease occurrence and association, clinical epidemiology, disease screening, causal, inference, and study designs. Students will apply epidemiological principles to public health practice using critical thinking, and analytical skills.

Prerequisites: HAD 201

Attributes: Undergraduate

HAD 340 Research Methods in HAD (3 credits)

Health Services Research explores the history of health research, basic principles and types of research in order that health administrators will be able to critically evaluate research in healthcare. This course is a combination of lecture, discussion and experiential learning designed to instill a critical understanding of the research process for application to professional practice.

Prerequisites: HAD 201

Attributes: Undergraduate

HAD 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Prerequisites: HAD 201

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 450 Seminar in Health Admin (3 credits)

Taken with the Practicum, this course is the capstone for integration between theory and practice of health administration. Each student will be responsible for the preparation of a research paper on a topic in health administration. Topics of emphasis will include health services research, administration in health settings, organizational development, human resource development, and current issues relevant to student field practicums. Students must have permission before enrolling.

Prerequisites: HAD 201 and HAD 320 and HAD 340

Attributes: Undergraduate

HAD 470 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Prerequisites: HAD 201 and HAD 320 and HAD 340

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

HAD 491 Intro to Healthcare Internship (1-3 credits)

Students will explore the components of the healthcare internship. Focus will be placed on developing and initiating plans for an appropriate internship and refining the professional competencies needed for successful completion.

Restrictions: Enrollment limited to students with a class of Senior.

Attributes: Undergraduate

HAD 492 Healthcare Internship (1-3 credits)

This course will be a management level internship in a healthcare facility approved by the course faculty. Working with a healthcare mentor, the students will work on a project in which they are expected to integrate concepts gained through the program. The internship will be individualized according to the career interests of the student and the needs of the healthcare facility where the internship is performed.

Restrictions: Enrollment limited to students with a class of Senior.

Attributes: Undergraduate

HAD 552 Health Administration (3 credits)

An introduction to the principles of administration within health and human services organizations and the basic concepts of leadership and organizational theories relevant to effective administration of healthcare institutions. Organizations are viewed as open systems requiring constant interactions with the environment. Considerable emphasis is placed on quality improvement and organizational change.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 553 Health Care Organization (3 credits)

An overview of the organization, structure, and financing of the healthcare delivery system in the United States. The various elements comprising the system will be presented, along with an exploration of the basic concepts and measures of health, disease, needs, quality, and utilization. Issues in healthcare resourcing, institutions, and system organization will be examined.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 554 Health Care Law (3 credits)

An examination of the major legal issues encountered in the health care field by administrators and practitioners. Among the topics to be included are principles of liability, legal aspects of medical ethics, and legislative and regulatory factors in health care delivery.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 555 Acc for Health Care Organiztns (3 credits)

An introduction to basic accounting techniques used in the healthcare industry.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 556 Fin Manag of Health Care Org. (3 credits)

An introduction to the basic theories and practices of financial management as they relate to healthcare organizations. Course includes budgeting principles.

Prerequisites: HAD 555

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 557 Health Care Strat Plan & Mktg (3 credits)

An introductory course that examines the foundations, principles, and basic applications of this field. Internal and external forces that shape marketing policies and planning are explored. Topics include the development of marketing strategies and programs, as well as marketing mix variables and general healthcare planning.

Prerequisites: HAD 553

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 558 Mgt of Healthcare Org (3 credits)

In depth study of hospital operations with emphasis on not-for profit/nonprofit settings; focus on departmental operations, role of administration, the board, and medical staff. Includes legal and reform trends affecting hospitals, financial mechanisms, budgeting, labor relations and corporate restructuring.

Prerequisites: HAD 553

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 559 Health Policy (3 credits)

The formulation and analysis of health policy at federal, state, local, and corporate levels. This course presents an overview of the legislative, regulatory, and political processes and their effect on the health care system. This course will provide a conceptual and analytic framework for bioethical policy analysis regarding policy formulation, adoption, implementation, operation, evaluation, and termination. Pragmatic application of policy analysis tools is included.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 600 Ethics of Health Care (3 credits)

A critical examination of the central ethical issues in the healthcare field. Issues to be treated include euthanasia, life-prolonging medical technologies, abortion, screening for genetic defects, experimentation and informed consent, distribution of scarce medical resources, the right to healthcare, and its implications for the healthcare delivery system. Necessary background in moral philosophy will be provided.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 601 Fieldwork in Health Admin (3 credits)

Students who have a GPA of 3.5 or higher may pursue experiential learning through fieldwork or internship in an approved healthcare facility or nonprofit organization.

Prerequisites: HAD 552 and HAD 553 and HAD 554 and HAD 555 and HAD 556 and (HAD 560 or MHI 560) and HAD 600 and HSV 550 and HSV 551

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 602 Directed Resrch in Health Serv (3 credits)

The Health Services Department provides opportunities for selected students to conduct independent research under the supervision of department faculty. Students desiring to participate in Directed Research must identify and meet with a faculty mentor, submit a formal research proposal with proposed timeline for completion, and obtain approval for the project from the faculty mentor, program director, department chair and associate dean.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HAD 700 Health Administration Capstone (3 credits)

An integrative capstone course in which the student is expected to integrate and synthesize prior course work and to demonstrate competence in health administration through the analysis of complex cases in health services delivery and management and the development of a case of his/her own based on experience and observation. Integrative Capstone should be taken as the final course in the curriculum.

Prerequisites: HAD 552 and HAD 553 and HAD 554 and HAD 600 and MHI 550 and MHI 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Health Care Ethics (HCE)

HCE 400 Fieldwork: Clinical Bioethics (3 credits)

The purpose of this course is to give students practical experience in clinical bioethics from various perspectives-medical, ethical, legal, financial, etc. The students will attend Interdisciplinary Ethics Teaching Rounds with the Medical Interns/Residents at the Mercy Catholic Medical Center one day a week. During these rounds they will examine cases from the general floors, the Intensive Care Units (ICUs) and the Surgical Intensive Care Units (SICUs). They will also be given the opportunity to attend Institutional Ethics Committee Meetings, Institutional Review Board (IRB) meetings and to participate in clinical ethics consults as they arise during the course.

Attributes: CCC: Mission: Ethics Social Justice, Undergraduate

HCE 490 Internship Health Care Ethics (3 credits)

An approved internship in Health Care Ethics.

HCE 493 Health Care Ethics Research (3 credits)

This course would examine specific clinical issues in medicine in cooperation with a faculty member of the Institute of Clinical Bioethics. Normally requires three hours of work per week for each unit of credit. Students need to complete the application form for independent study and have the approval of the department chair and Associate Dean.

Attributes: Undergraduate

HCE 494 Health Care Ethics Research (3 credits)

This course would examine specific clinical issues in medicine in cooperation with a faculty member of the Institute of Clinical Bioethics. Normally requires three hours of work per week for each unit of credit. Students need to complete the application form for independent study and have the approval of the department chair and Associate Dean.

Health Education (HED)

HED 550 Hist & Phil Med & Pub Health (3 credits)

History and Philosophy of Medicine and Public Health traces the evolution of health promotion efforts from early civilizations, the Greco-Roman period, Middle Ages, and the Renaissance to current times. Course content covers infectious and chronic diseases, occupational health, maternal and child health, and the development of healthcare professions and institutions throughout history. Students will explore local treasures, such as the Philadelphia Museum of Art, the Mutter Museum, the Penn Museum, and the African American Museum in Philadelphia, as conditions allow.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 551 Map Hlth Res, Pln, Pol Dev&Mkt (3 credits)

Based on the ARCVIEW Geographic Information Systems (GIS), this course is a practical introduction to the use of computer mapping and spatial analysis. The course uses the most current GIS technology to understand the environment and how it impacts public health. There is a large computer lab component to the course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 552 Epidemiology and Com Health (3 credits)

An introductory course exploring the basic concepts of epidemiology as a public health science, including rates and ratios, risk and association, causation and investigation of outbreak.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 553 Program Planning for Wellness (3 credits)

A foundation course in the development of health education programs for hospitals, work sites, community, and schools. Discusses models for health behavior, assessment of health education needs, design and implementation of interventions, program marketing, and evaluation of efficacy.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 554 Curric Strat for Hlth Educatrs (3 credits)

Techniques combining the cognitive, affective, and psychomotor domains in individual and group learning are discussed. Leading models for curriculum development and implementation are emphasized. Mechanics for construction of goals, curriculum design, objective writing, and learning behaviors are stressed. Models for evaluation and needs analysis are examined. The role of the trainer in the organization is also explored, along with strategies for maximizing one's position in the organization. Ethical, legal, and moral questions arising in the health education arena are examined.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 555 Essentials: Population Health (3 credits)

This comprehensive course focuses on preparing health professionals with the foundational skills needed to work in teams to effectively collaborate and coordinate care in population health management. Special emphasis will be on identification and stratification of populations at risk; evidence-based care, care coordination, patient and community engagement, and data analytics and reporting of outcomes. Key themes of multidisciplinary communication, collaboration, leadership, and professionalism will be ingrained throughout content. National standards and initiatives form the foundation to the course.

HED 556 Foundations of Global Health (3 credits)

This course will introduce students to the main concepts of the public health field and the critical links between global health and social and economic development. Students will get an overview of the determinants of health and how health status is measured. Students will also review the burden of disease, risk factors, and key measures to address the burden of disease in cost-effective ways. The course will cover key concepts and frameworks but be very practical in orientation. The course will be global in coverage with a focus on low-and middle-income countries and on the health of the poor domestically and abroad.

Attributes: Graduate

HED 557 Determinants: Health-Behavior (3 credits)

The focus of the program is on the interaction of biological, behavioral, sociocultural, and environmental variables in the etiology and prevention of health problems and in the promotion of healthy human development. The program is designed to cultivate competence in basic and applied research, in the evaluation of bio-behavioral health intervention strategies, and in university teaching. Graduates are prepared for research, teaching, or policy roles in health care settings, private and public research laboratories, government agencies, and universities including medical schools.

HED 558 Mental Illness and Addictions (3 credits)

This course provides an overview of a range of theories/models of mental health/addiction treatment, with an emphasis placed on psychotherapeutic approaches. The theory of pathology, theory of change, practice of therapy and common therapeutic strategies arising from each approach will be highlighted. The benefits, limitations, efficacy outcomes and contraindications of each approach will also be explored. The course also includes a brief overview of critical assessments of common approaches to addictions/mental health treatment and an introduction to Recovery-oriented practice in mental health treatment.

HED 559 Human Aging and Dying (3 credits)

This course focuses on the field of human aging. The course of study will include a multidisciplinary examination of the way in which human aging is viewed - how we perceive the process of growing older and how society responds to the issues of aging. The course will look at aging from multiple perspectives that include the social, political and biological sciences, arts and humanities, care giving and social services. Particular emphasis will be placed on how these issues will become prominent with the advent of the Baby Boomers.

Attributes: Graduate

HED 561 Human Sexuality (3 credits)

Content provides sexual awareness and personal growth in the area of interpersonal sexuality. Through participation in a variety of class activities, students increase comfort level in communicating about sexual attitudes, feelings, and behaviors. Sexually transmitted infections, reproductive inefficiencies, and cultural issues are discussed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 564 Health Communications (3 credits)

This course focuses on the development of effective health communications. Topics include identifying the health needs and communication channels of the target audience, creating SMART communication objectives, creating messages using communication theories or models, use of current and emerging technologies, message delivery and impact or outcome evaluation. Students will apply their knowledge to a health communication message and pilot the message to one or more small groups.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 571 Employee Asst & Occup Health (3 credits)

An overview course designed to provide the knowledge and skills necessary to help organize, develop, manage, and evaluate employee assistance programs. Emphasis is placed on the positive role of health promotion as a preventive tool. Course explores the role of addictions, family, financial, and legal issues in the life of the impaired employee or student and codependent.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 573 Women and Health Care (3 credits)

Inquiry into the health needs of women and their treatment by the health care system. Study includes history, role of women as healers, epidemiology, access to and utilization of health care services, health research, and legislation affecting women's health issues.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 574 Concepts of Nutrition & Health (3 credits)

A comprehensive examination of the principles of good nutrition during the life cycle. Emphasis is placed on practical applications, including the use of food composition theory to evaluate food intakes, regional, cultural, and religious influences on food habits, fads, preventive health promotion, and health restoration through health education.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 575 Stress and Crisis Management (3 credits)

Study of health problems related to stress and exploration of methods to reduce the impact of stressors to improve bio-psychosocial health. Demonstrates how to identify, isolate, and manage a crisis and how to foresee future crises, as well as how to develop contingency plans. Physiology of stress, relaxation, biofeedback, fear control, and cognitive reacting are skills studied in relation to stress management.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 577 Health Education in HIV/AIDS (3 credits)

The retrovirus of AIDS, the people, and the society it infects are the center upon which this course is based. Current public health policy, ethics, and politics of AIDS are examined. Emphasis is placed on skill-building in health education, counseling, and referrals for persons with AIDS, their families, and those individuals who test positive. The school and corporate sectors are explored, as well as high risk groups and global AIDS.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 600 Dir Research in Hlth Ed (3 credits)

An opportunity to conduct a research project under the supervision of a faculty member. Note: students may register for a directed research study only after (a) submitting a research proposal to the program director; (b) arranging for a faculty member to serve as mentor; and (c) receiving explicit approval from the department chair.

Attributes: Graduate

HED 601 Fieldwork in Health Education (3 credits)

Individually arranged fieldwork in approved health education environment. Students need permission of the program director before registering. The program is designed to meet individual professional goals and may only be taken once during a student's completions of this degree program. All five core courses must be taken prior to enrolling in this course.

HED 700 Health Education Capstone (3 credits)

Health Education Capstone is the final course in Health Education program. Course content covers professional standards of practice, Certified Health Education Specialist Examination preparation, connection with Saint Joseph's University Career Development Center services, and completion of a health education program in the community.

Prerequisites: HED 551 and HED 552 and HED 553 and HED 557

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HED 770 Special Topics in Hlth Educatn (3 credits)

The learning objectives of this course will be geared toward a specific topic of current interest in the field of health education. The specific topics and perquisites will be announced in the course schedule.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Health Science (HSC)

HSC 110 Intro Health Prof Practice (3 credits)

This first year introductory course covers the historical foundations of medical practice, current systems of care, models and theories of health behavior and patient care, as well as introducing the many career opportunities in the health professions. Staff from the Career Center present information on career exploration and internships.

Attributes: Undergraduate

HSC 111 Health Sci Orientation II (1 credit)

Overview of interprofessional healthcare professions with specific emphasis on the disciplines of PT, OT, HS and EXP. Topics will include IPE team building, ethical issues, the healthcare team concept, current healthcare issues, professional behaviors, confidentiality, communication, and department/profession specific information.

Prerequisites: HS 110 or HSC 110

Attributes: Undergraduate

HSC 150 First Year Seminar (3 credits)

Seminar subjects vary.

Restrictions: Enrollment is limited to students with a major in Health Science or Undecided Health.

Attributes: First-Year Seminar, Undergraduate

HSC 151 Phlebotomy (3 credits)

This course advances the learner's knowledge of the role of the phlebotomist, phlebotomy techniques, safety precautions and the application of best practices. Completion of this course provides the educational basis for certification; however, students will need to achieve practice hours outside of the classroom in order to sit for certification.

Attributes: Undergraduate

HSC 152 Phlebotomy Clinical (2 credits)

This course is the supervised application of skills acquired in HSC 150. The student learns to function competently as a phlebotomist at an affiliated clinical training site.

Prerequisites: HSC 151

Attributes: Undergraduate

HSC 190 CPR & First Aid Certification (3 credits)

This course will train students to act in emergency situations, to recognize and care for life-threatening cardiac and respiratory emergencies in adults, children, and infants. Students will also learn how to protect themselves and others from disease transmission through preventative measures from blood-borne pathogens, utilize two-rescuer cardiopulmonary resuscitation, and handle oxygen delivery, bag valve mask resuscitation, asthma inhalers, and epinephrine auto-injection. This course will satisfy the requirements for American Red Cross Professional Rescuer Adult, Child, and Infant Cardiopulmonary Resuscitation/Automated External Defibrillation/First Aid Certification.

Attributes: Undergraduate

HSC 211 Health Care Systems (3 credits)

An introduction to public health and the organization and structure of the health care delivery system in the United States. This course will focus upon the various types of health care services, where these services are provided, ways to assess and keep track of diseases and public health care needs, health policies, and administration of these services. Also included will be a discussion of how legal, economic, psychological, cultural, political, ethical, and technological forces affect health care and the people who provide it. An introduction to managed care including current and evolving models, terminology, and differences among insurers and payer types will be included. Staff from the Career Development present information on resume writing, internships, and other experiential learning opportunities.

Attributes: Undergraduate

HSC 216 Alcohol, Drugs and Society (3 credits)

This course explores substance use from the neurological, biological, and social perspectives. Content covers individual and social factors related to substance abuse and evidence-based policies and programs to treat and prevent the disorder. Examples of topics discussed include opioid addiction, adolescent substance abuse, and binge drinking.

Attributes: Undergraduate

HSC 217 Ethics & Equity Mental Health (3 credits)

This course examines the connections between mental health and society. What are the major forms of mental and behavioral health and illness? How widespread are mental disorders and what predicts their occurrence? What impact do they have on society and institutions such as health care and criminal justice? How does mental illness relate to social norms? What roles do psychiatric diagnoses play in society and how do diagnoses affect individuals relative to society?

Attributes: CCC: Mission: Ethics Social Justice, Undergraduate

HSC 220 Disability & Social Participat (3 credits)

This course will provide students with an opportunity to learn about the lived experience of persons with disabilities and their participation in society. In addition, students will study the role of the social, cultural, and physical environment in providing opportunities and/or barriers to participation of all persons. Students will participate in service-learning experiences to enhance their knowledge through interactions with people with disabilities during sports and leisure activities.

Attributes: Undergraduate

HSC 240 Stress Management & Resilience (3 credits)

The goal of this course is to discuss stress and its effect on health and wellness and explore stress management and resilience-enhancing strategies from physical, cognitive, emotional, social, and spiritual perspectives. Students will define stress and explore theories of stress adaptation, understand the empirical basis of stress management interventions, experiment with physical, cognitive, emotional, social, and spiritual stress management strategies, and explore responses to failure and trauma.

Attributes: Undergraduate

HSC 244 Health Information Technology (3 credits)

Health care increasingly engages in the use of information technology to collect, maintain, and analyze clinically relevant health data. This course is designed to present students with several real life scenarios with a focus on practical and applied uses of health information technology. Students will utilize a simulated electronic health record (EHR) to enter data, recall clinically relevant information for the purpose of analyzing data, and gain an understanding of how health care is transitioning to a focus on quality and outcomes utilizing information technology. Upon completion of the course, students should understand terminology related to technology commonly used in the health care setting, analyze and evaluate health data to draw conclusions, and apply technology focused solutions to support outcomes focused patient care.

Attributes: Undergraduate

HSC 248 Health of School Aged Children (3 credits)

This course explores the specific health needs of children and opportunities for health promotion and disease prevention in schools and communities. Course content covers the health issues of infectious diseases, chronic illnesses, injuries, and adverse childhood experiences and the use of evidence-based programs and practices in improving children's health.

Attributes: Undergraduate

HSC 251 Healthcare Law and Ethics (3 credits)

This course provides an overview of legal and ethical issues central to the health care delivery system and their impact on individual institutions and professionals. The relationships among biomedical and technology, societal changes, court rulings, and governmental legislation within the context of the healthcare system will be examined. During the regular fall and spring semesters, this course fulfills the overlay requirement of an ethics intensive course.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate

HSC 252 Health Policy (3 credits)

This course will explore health care policy issues (such as Medicare, Social Security, Medicaid, Long-Term Care, AIDS/HIV programs) and lead to a general understanding of the health care policy process. Focus will be placed on examining the various factors that lead to health care policy at the state and national level, and how health care policy impacts health care professionals' ability to deliver care and consumers' ability to utilize care in an ever-changing environment. The role of the political process to address issues revolving around cost of health care, access to and quality of that care will be addressed.

Attributes: Undergraduate

HSC 253 Nutrition: Health & Disease (3 credits)

Nutrition: Health & Disease introduces the basic concepts of nutrition, the functions of carbohydrates, fats, proteins, vitamins, minerals, and water in the body, and the role of diet in health and disease. Health topics include heart disease, obesity, hypertension, diabetes, protein energy malnutrition, disordered eating and food safety. The content material of HSC 253 Nutrition: Health and Disease overlaps with the content of CHM 110 Food Chemistry I, CHM 111 Food Chemistry II and CHM 112/112L, EPH 360 and BIO 219 Basic Nutrition (USCI Legacy BS 219).

Restrictions: Students cannot enroll who have a major in Food Marketing.

Attributes: Undergraduate

HSC 256 HIV/AIDS (3 credits)

The HIV/AIDS course offers students the opportunity to explore one of the most critical public health issues facing the world today. Topics include epidemiology of HIV/AIDS, pathogenesis, the social and political history of the disease, modes of transmission, opportunistic infections, ethical issues, and global responses. This class will include site visits to local agencies in the Philadelphia area as well.

Attributes: GEP: Ethics Intensive, Undergraduate

HSC 276 Health of the Aging Adult (3 credits)

This course will focus on the demographic, political, economic and biopsychosocial issues of aging adults from community-based services to home care, hospice, hospital and nursing home settings. The course will focus on the interventions that health providers can use to maximize safety, function and social stability in the community, deferring or delaying institutionalization. Specific topics include fall prevention, medication safety, telemedicine applications, HIV prevention, cognitive function, nutrition, quality of life and the quality of care.

Attributes: Undergraduate

HSC 285 Med Terminology & Health Comm (3 credits)

Ongoing advancement in the allied health professions dictates the need for students to understand proper medical and anatomical terminology to include its source language, evolution and application in the field of medicine and allied health. The need to understand proper medical and anatomical terminology is imperative as this language provides proficient communication between members of the same profession, minimizing the potential for misinterpretation in such a highly critical field. This course will introduce and educate students to a substantial medical vocabulary comprised of prefixes (location of an organ, the number of parts, or time involved), word roots (body part) and suffixes (condition, disease process, or procedure) which are utilized by health care practitioners as a devoted language. This course will describe the human body, coupled components, conditions, processes and medical treatments; providing the proper medical vocabulary for each.

Attributes: Undergraduate

HSC 300 Fin Mgmt & Analysis in Hlthcr (3 credits)

This course provides an overview of the basic principles of financial management and data analysis in healthcare. Students will be introduced to topics such as revenue cycle management, financial reporting, internal/external audit, internal control, contract management, budget management and forecasting, financial evaluation and planning, evaluation of risk, regulatory compliance, and analysis. Students will explore the tools needed to assess and understand financial and operating performance.

Attributes: Undergraduate

HSC 310 Ethics in Sports (3 credits)

This course will provide students with the opportunity to examine personally held ethical beliefs as well as the ethical dilemmas in past and current sporting events including legal repercussions of participant actions. This course will assist students in defining and understanding legal, ethical, and professional judgment in sport. Students will study and apply the various theories and models of sportsmanship and ethics in sports.

Attributes: Undergraduate

HSC 323 Social Determinants of Health (3 credits)

This course explores the complex interplay between social, cultural, economic, and environmental factors that influence individual and population health outcomes. Students will examine key social determinants such as socioeconomic status, race, gender, education, and access to healthcare, alongside their impact on physical and mental well-being. Through case studies, multimedia resources, and critical discussions, the course delves into health disparities, systemic inequities, and the societal structures that shape health experiences. Students will develop analytical and practical skills to assess these determinants and propose interventions aimed at fostering health equity and improving public health. This course emphasizes cultural competence, intersectionality, and global perspectives, equipping students with the tools to address real-world health challenges effectively.

Attributes: CCC: Diversity, GEP: Diversity Course, Undergraduate

HSC 325 Theories of Disease Prevention (3 credits)

Health theories provide practitioners with tools to understand health-related behaviors and develop effective interventions against disease. This course introduces students to commonly used models and theories, such as the Health Belief Model, Stages of Change, Diffusion of Innovations, Social Cognitive Theory, Health Communications, and Social Marketing. The theoretical foundations apply to the leading causes of death and disability in the United States, heart disease, cancer, and injuries.

Attributes: Undergraduate

HSC 329 Clinical Leadership (3 credits)

Clinical leaders are in a position to apply principle standards of quality healthcare and configure these standards into a healthcare organization's operations and functions. This course will present an overview of the clinical leadership role. Focus will be placed on leadership competencies, decision-making and high-level management skills that drive change when providing high-quality care. Students will explore the complex skills of management and leadership practices, application of organizational policy, change management, team building, project management, strategic planning, navigating stakeholder relationships, and the principles of financial management.

Attributes: Undergraduate

HSC 331 Health Sciences Research (3 credits)

This course teaches critical thinking and writing skills by introducing students to research methods in health and medicine. The course covers human participant protections, research designs, instrumentation, quantitative and qualitative data analyses, and communication of study findings. Students are responsible for selecting a health problem of interest, gathering and critiquing current research, writing a literature review and developing a research proposal. Throughout the course, students will review research articles investigating health disparities and other social justice issues. This course fulfills the overlay requirement of a writing intensive course. Students are taught to write in the technical report format.

Prerequisites: ENG 101

Attributes: GEP: Ethics Intensive, Faith Justice Course, Undergraduate, GEP: Writing Intensive

HSC 345 DyingWell:The Hospice Movement (3 credits)

This course examines how people across cultures and throughout history have responded to the challenge of dying. It will examine cultural practices relating to treatment of the death and to care of the dying, as well as the process of confronting one's own death from a psychological perspective. After describing the limitations of the traditional medical (curative) model's approach to death, the course will study the hospice movement: its history, philosophy, and practices of caring. In addition to specific models and essential components of hospice care, administrative issues (legal, reimbursement, human resources) will be addressed. This course will include presentations by and interviews with hospice workers, as well as a survey of hospices in the metropolitan area. This course includes a weekly service-learning requirement.

Attributes: Faith Justice Course, Undergraduate

HSC 348 Foundations of Kinesiology (3 credits)

Foundations of Kinesiology introduces students to the basic physiological, psychological, sociological, and mechanical principles of human movement. Students will explore careers that involve kinesiology, which include physical education, physical therapy, nursing, athletic training, and sports nutrition.

Attributes: Undergraduate

HSC 354 Diversity Ldrship in Hlth Care (3 credits)

The impact of valuing diversity and multiculturalism is profound in the healthcare field. Research has long suggested that health outcomes and health services delivery are improved when caregivers and managers integrate genuine valuing of diversity in their operations. This course offers students the means to develop effective awareness, knowledge and sensitivity concerning diversity and multiculturalism. It provides strategies and insights allowing students to build their leadership skills in this critical area and then apply such knowledge and competencies in the field itself.

Attributes: Undergraduate

HSC 359 Health Program Planning (3 credits)

Community health education programs are a cost effective way to prevent injuries and diseases. This course takes students through the process of health promotion planning including theoretical foundations, needs assessment, program development, and evaluation. Development and implementation of a health promotion project is a core component of the course. Emphasis is placed on evidence-based programs and practices.

Attributes: Undergraduate

HSC 360 Animal Therapy (3 credits)

This course is designed to give students an understanding of animals in formal roles of support within society. Various levels of animal-assisted interventions and their legal implications, including Emotional Support Animals, Animal-Assisted Activities, Animal-Assisted Therapy, and Service Animals will be reviewed. The role of animals providing services to people with autism spectrum disorders, children with cancer, individuals with psychiatric disorders, the elderly, and individuals with physical disabilities will be discussed. The history of Animal-Assisted interventions leading up to their current status will be addressed.

Prerequisites: PSY 208 or SOC 217

Attributes: Undergraduate

HSC 362 Fin Accounting for Health Sci (3 credits)

Financial accounting is the fundamental preparation, analysis and reporting of financial statements to determine financial performance and position of organizations. This course will cover the fundamental accounting concepts to interpret and understand financial statements and healthcare organization financial performance. Students will learn concepts such as the fundamental accounting equation, the definitions of assets, liabilities, owner's equity/net assets, debits and credits, (GAAP) Generally Accepted Accounting Principles, (IFRS) International Financial Reporting Standards etc. used to improve managerial decision-making and organizational performance.

Prerequisites: HSC 300

Attributes: Undergraduate

HSC 368 Just Hlth Care Dev Nations (3 credits)

An investigation of adequate health care as a fundamental human right. The course will proceed from the premise that socially induced needs are a result of historical development of material and social conditions, coupled with a social consensus that some things are necessary for happiness, social life, or some other goal. It will consider the inability of many societies to supply adequate health care as an issue of basic personal dignity, a claim against society, and as a matter of justice. The course will examine the issue of just health care for all peoples from both public health and ethical perspectives.

Attributes: CCC: Mission: Global Citizenship, GEP: Ethics Intensive, GEP: Globalization Course, Health Care Ethics Course, Justice Ethics and the Law, Latin American Studies Course, Undergraduate

HSC 370 Special Topics Health Sciences (3 credits)

Special Topics in Health Services explores a specialized area of health care or an emerging or re-emerging health issue. The topic for a given semester will be announced prior to registration. This course may be taken more than once with permission of the Health Studies Chair.

Attributes: Undergraduate

HSC 390 Medical Terminology (1-2 credits)

This course is designed to teach medical terminology to all majors to assist students in the transition to the professional program or graduate school. This course will explore terminology and abbreviations by body systems to enable students to recognize, interpret and utilize medical terminology and abbreviations when reading medical literature, documenting in patient/client charts and working in the healthcare environment.

Restrictions: Enrollment is limited to Undergraduate Division level students.

HSC 410 Fieldwork (3 credits)

Fieldwork provides current or prospective health care students a chance to observe healthcare professionals in a workplace setting. The shadowing experience is designed to be an observation only experience lasting 45 hours. Students will contact their chosen organization(s) to shadow a professional in their chosen career field(s). Students are NOT placed in a specific location. Students responsible for contact, organization, and documentation of their shadowing hours. Students may choose to shadow one or more professionals at one or more locations.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

HSC 441 Complementary & Alt Med (3 credits)

This course introduces students to the history and practice of complementary medicine and non-traditional therapies. Included will be an overview of the debate between eastern and western societal approaches to medicine, the relationship between mind and body in health and illness, how cultural issues affect the way individuals feel about and comply with their medical treatment, some of the non-traditional therapies used in the treatment of physical and psychological illness such as art and music therapy, and the overall emphasis on wellness promotion.

Attributes: GEP: Globalization Course, GEP: Non-Western Studies, Undergraduate

HSC 458 Public Health & Epidemiology (3 credits)

This course introduces the basic principles and methods of epidemiology. Topics include historical perspectives of epidemiology, measures of disease occurrence and association, clinical epidemiology, disease screening, causal inference, and study designs. Students will apply epidemiological principles to public health practice using critical thinking and analytical skills.

Attributes: Undergraduate

HSC 490 Internship in Health Sciences (3 credits)

Internship in Interdisciplinary Health Studies permits students to focus on a particular area of interest within the Health Studies Department. Students choose from a range of interesting topics and interests to provide a deeper level of understanding. This course requires 112 hours of work at the internship site, regular journal reporting, clear learning objectives, and completion of a final project. Students benefit from both the academic side as well as the practical side by gaining hands-on experience for future employment.

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major in Health Science or Inter. Health Studies.

Attributes: Undergraduate

HSC 493 Independent Study (2-3 credits)

Students who have completed four regular semesters with an overall grade point average of 3.0 (or cumulative average of 3.4 or higher for courses in the major field) may, with the prior approval of the chairs and Dean's office concerned, register each semester for one upper division course in the major field (or a closely related field) to be taken in the Independent Study/Directed Readings or Research/Tutorial format. Such courses are offered to enrich the student's major program and not as a special arrangement to facilitate a student's fulfillment of course or credit requirements. Additional conditions are described in Guidelines for Directed Readings, Independent Study, and Similar Courses issued by the appropriate Dean's Office.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Health Science or Inter. Health Studies.

Attributes: Undergraduate

HSC 494 Independent Study (3 credits)

Students who have completed four regular semesters with an overall grade point average of 3.0 (or cumulative average of 3.4 or higher for courses in the major field) may, with the prior approval of the chairs and Dean's office concerned, register each semester for one upper division course in the major field (or a closely related field) to be taken in the Independent Study/Directed Readings or Research/Tutorial format. Such courses are offered to enrich the student's major program and not as a special arrangement to facilitate a student's fulfillment of course or credit requirements. Additional conditions are described in Guidelines for Directed Readings, Independent Study, and Similar Courses issued by the appropriate Dean's Office.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Health Science or Inter. Health Studies.

Attributes: Undergraduate

HSC 495 Seminar in Health Sciences (3 credits)

This course is offered as one of the final courses in the Health Sciences major to provide students with a solid platform in leadership, professionalism, career development, and community outreach. Course content is based upon two overarching educational goals. The first major goal is to synthesize key themes and information that constitute the Health Sciences curriculum, allowing students to review critical concepts and material. The second major goal is to help students transition from their undergraduate environment to the world of professional careers in health care; professional education in various clinical fields; or graduate education in health administration, public health, or health education. This course partners with Career Development Center staff to offer best practices in resume writing and a panel presentation of alumnae. All students are expected to develop a community-based service/research project for presentation.

Prerequisites: (IHS 110 or HSC 110) and (IHS 211 or HSC 211) and (IHS 323 or HSC 323 or SOC 323)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Health Science or Inter. Health Studies.

Attributes: Undergraduate

Health Services (HSV)

HSV 550 Health Services Research (3 credits)

Explores the history of health research, basic principles and types of research in order that health professionals will be able to critically evaluate research in their respective fields. This course is a combination of lecture, discussion and experiential learning designed to instill a critical understanding of the research process for application to clinical practice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HSV 551 Managed Health Care (3 credits)

This course is an introduction to managed care including current and evolving models, terminology, and differences among insurers and payer types. The course will focus on the use of financial incentives to restrain healthcare costs and the role of utilization review, peer review, provider.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

HSV 700 Integ Capstone Crs in Hlth Serv (3 credits)

An integrative capstone course in which the student is expected to integrate and synthesize prior course work and to demonstrate competence in health services through the analysis of complex cases in health services delivery and management and the development of a case of his/her own based on experience and observation. Integrative Capstone should be the final course in the curriculum.

Prerequisites: HAD 552 and HAD 553 and HAD 555 and HAD 556 and HAD 560 and HAD 600 and HSV 550 and HSV 551

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

History (HIS)

HIS 101 Globalization in World History (3 credits)

This course examines how interconnections between peoples have shaped and reshaped the world across a variety of eras. Potential themes include the process of cultural exchange between different societies, how connections between societies have created interdependencies and/or conflict across different regions of the globe, as well as how other forces have affected and been affected by such interactions, among others. As part of this course, students will complete an information literacy unit utilizing the library's resources.

Attributes: CCC: World History, Undergraduate

HIS 102 Movements in World History (3 credits)

This course explores interpretations of varying movements, whether physical, social, or intellectual. Potential themes include the experience of diaspora populations, cross-cultural exchange, the imposition of and resistance to imperial structures, and/or the development of diverse social and intellectual ideas, among others. As part of this course, students will complete an information literacy unit utilizing the library's resources.

Attributes: CCC: World History, Undergraduate

HIS 103 Empires in World History (3 credits)

The course focuses on the rise, maintenance, and decline of empires. It explores in a comparative fashion the interactions between imperial structures, cultures, religions, and socio-economic patterns produced by empires. Potential themes include empires as instruments of order, oppression, diversity, or unification, among others. As part of this course, students will complete an information literacy unit utilizing the library's resources.

Attributes: CCC: World History, Undergraduate

HIS 150 First Year Seminar (3 credits)

First-Year seminar course in History.

Attributes: First-Year Seminar, Undergraduate

HIS 154 Forging the Modern World (3 credits)

Students will analyze primary and secondary sources to understand the predominant structures and relationships that have transformed our world from the early modern era to the twentieth century. Topics will include the development of political and economic ideas and systems (e.g., democracy, liberalism, conservatism, nationalism, fascism, colonialism, capitalism, socialism), changing conceptions of culture and identity (e.g. race, gender, ethnicity, art), and the conflicts and opportunities born of this transformation (e.g., anti-colonial movements, social revolutions, world wars, international organizations, globalization, religious and cultural conflicts). Readings and discussions will emphasize understanding how modern systems of political, economic and social meaning and exchange, including Western dominance, emerged.

Attributes: GEP: Signature Course, Undergraduate

HIS 170 Special Topics in History (3 credits)

Topics of interest in History that are not covered in a regularly offered course. Content and structure of the course are determined by the course supervisor. The special topic(s) for a given semester will be announced prior to registration.

Attributes: Undergraduate

HIS 195 AP World History Credit (3 credits)

Students who receive an eligible score on the AP World History exam will receive credit for this course.

Attributes: Undergraduate

HIS 196 AP World History Credit (3 credits)

Students who receive an eligible score on the AP World History exam will receive credit for this course.

HIS 201 U.S. History to 1877 (3 credits)

This course will survey the history of what would become the United States from the pre-Columbian era through Reconstruction. We will examine significant developments in politics, society, economy, and culture, paying equal attention to individuals, institutions, and ideas. We will also study the practice of history, looking at the ways in which historians use primary and secondary sources to develop scholarly arguments. HIS 201 and 202 may be taken in any order.

Attributes: American Studies Course, Undergraduate

HIS 202 U.S. History since 1865 (3 credits)

This course will survey the history of the United States from Reconstruction through the present. We will examine significant developments in politics, society, economy, and culture, paying equal attention to individuals, institutions, and ideas. We will also study the practice of history, looking at the ways in which historians use primary and secondary sources to develop scholarly arguments. HIS 201 and 202 may be taken in any order.

Attributes: American Studies Course, International Relations Course, Undergraduate

HIS 203 Historical Intro to Latin Am (3 credits)

A survey of the development of Latin American society, emphasizing the era from the independence movements of the nineteenth century to the present day. The course will focus on the changing social, economic and political structures of the region.

Attributes: International Relations Course, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

HIS 204 Latin American-U.S. Migration (3 credits)

This course will provide students with a deeper understanding of the processes that led migrants from Latin America and the Caribbean to the United States, and their experiences after arrival. The course focuses on three interdisciplinary topics: community formation; the variety of individual and group experiences; and current policy questions for the hemisphere.

Attributes: GEP: Diversity Course, GEP: Ethics Intensive, Faith Justice Course, International Relations Course, Justice Ethics and the Law, Latin American Studies Course, Undergraduate

HIS 208 Historical Intro to Asian Civs (3 credits)

This course will introduce students to the culture, politics, geography, art, and religious traditions of the major countries of East and South Asia. It will also give a historical overview from earliest times to the present. The course will focus primarily on the Indian subcontinent, China and Japan, with some attention also to Korea and Southeast Asia. Throughout the course students will also learn how questions of history and culture shape identities and animate public life in contemporary Asia.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 209 AP European History Credit (3 credits)

Students who receive a 4 or 5 on the AP European History exam, or the IB equivalent, will receive credit for this course.

Attributes: International Relations Course, Undergraduate

HIS 210 History of Modern Africa (3 credits)

This course is designed to introduce key themes of the history of Modern Africa. These themes included African Imperialism, European Colonialism, Gender, Education, Development, and political and mental Decolonization. This class is intentional about its source base and includes only sources by Africans and those in African the Diaspora. It also has diverse readings that include, Poetry, Psychology, Literature, and Graphic novels. The culminating assignment is where students will be following a newspaper story in African Newspapers.

Attributes: Africana Studies Course, CCC: Diversity, GEP: Diversity Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 270 Special Topics in History (3 credits)

Content and structure of the course are determined by the course supervisor. The special topic for a given semester will be announced prior to registration.

Attributes: Undergraduate

HIS 296 Transfer History Credit (3 credits)**HIS 301 Latin America and the U.S. (3 credits)**

The complex relationship between the United States and the Latin American nations in the nineteenth and twentieth centuries.

Attributes: International Relations Course, Latin American Studies Course, Undergraduate

HIS 303 History of Modern Mexico (3 credits)

The major social, political, and economic factors that have shaped Mexico in the twentieth century.

Attributes: International Relations Course, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

HIS 306 Sports & Spectacle Greece/Rome (3 credits)

The course draws on historical sources and material culture to investigate the genesis, evolution, and social importance of athletics (track and field events, combat sports, and equestrian competitions) and public spectacles (gladiatorial combats, chariot races, and reenactments of battles) in ancient Greece and Rome, respectively. Topics explored include: the history of the ancient Olympics and other Crown Games; the importance of religion, socio-economic status, and gender in ancient sports; the relation between politics and spectacles in ancient Rome; the ethical protocols of Greek athletics; and the role of ancient sports in the history of the modern Olympic Games.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

HIS 307 Ancient Greece & Rome Cinema (3 credits)

The course examines a variety of films set in the ancient Greek and Roman world and compares them to the textual and visual sources on which they are based, in an attempt to assess their faithfulness and departures. The course aims to investigate the uses and abuses of the classical past in the medium: how (in)accurately historical figures and events are portrayed on the big screen and how modern ideologies and concerns (about politics, ethnicity, morality, religion, gender, sexuality, race, and cinema itself) are dressed into an ancient costume.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP: Writing Intensive

HIS 308 Race & Ethnicity Greece/Rome (3 credits)

The course examines how the concepts of race and ethnic diversity are presented and debated in various Greek and Roman sources (literary as well as visual) and to what extent ancient thinking remains influential nowadays. The course explores a series of important ideas, including nation formation, ethnic superiority, and the use of anatomical, linguistic, and religious characteristics as criteria for ethnic and racial differentiation in the ancient Mediterranean world. The course also investigates the nexus between ancient racism and the social institutions and processes related to it, such as enslavement, colonization, migration, imperialism, assimilation, native revolts, and genocide.

Attributes: CCC: Diversity, GEP: Diversity Course, GEP: Art/Literature, Undergraduate

HIS 315 The Glory that was Greece (3 credits)

From Homer to Alexander, the Greeks of antiquity made their mark on the world both of their own time and of the present. While many know the names of great philosophers and artists, such as Plato and Sophocles, few are acquainted with the historical circumstances that often served to inspire these founders of Western civilization. Through original historical and literary texts, this course will help students better to understand the complex context of military prowess, intellectual curiosity, and artistic inspiration that created the glory that was Greece.

Attributes: Ancient Studies Course, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

HIS 316 The Grandeur that Was Rome (3 credits)

From its beginnings as a muddy village, Rome grew to create the largest empire and greatest uniformity the Western world has ever known. This course will: trace the course of Rome's development in the areas of military, political, social and legal history; examine the effects of Christianity and endless expansion upon the empire; and critically assess various theories explaining its demise.

Prerequisites: ENG 101

Attributes: Ancient Studies Course, Undergraduate, GEP: Writing Intensive

HIS 319 Reform/Rev in Europe 1500-1650 (3 credits)

Examines the Protestant Reformation, its impact on the religious practice of regular people during the sixteenth and seventeenth centuries, and the various responses to reformed thought offered by the Catholic Church. The course pays particular attention to the interaction of faith and reason during the Reformation conflicts.

Prerequisites: ENG 101 and (THE 153 or THE 154 or THE 155)

Attributes: CCC: Mission: Faith Reason, CCC: Writing Intensive, GEP: Faith-Reason Course, Justice Ethics and the Law, Medieval, Ren & Reform Studies, Undergraduate

HIS 324 Vietnam War in Film & History (3 credits)

This course examines two different ways of constructing the past, one by historians, the other by filmmakers. We will examine the origins of American involvement in Vietnam, and the course of the conflict from the late 1950s through disengagement in 1973. At the same time, we will watch films that illustrate the evolving way that the war has been represented between 1968 and 1989.

Attributes: Undergraduate

HIS 327 Early Modern Europe 1400-1800 (3 credits)

Examines some of the key transformations in European history between the years 1400-1800. Topics include the Renaissance, the Reformation, the Dutch Revolt, the English Civil War, European encounters with the "New World," Absolutism and the rise of the nation state, the Scientific Revolution, and the French Revolution.

Attributes: Justice Ethics and the Law, Medieval, Ren & Reform Studies, Undergraduate

HIS 329 Crime & Punishment in Europe (3 credits)

Examines the development of European crime and punishment from 1200-1840. Focuses in detail on the social role of legal proceedings, judicial torture, physical punishment, and public execution in European society. As part of the course, students reenact a series of trials from the Spanish Inquisition. Concludes by studying the shift toward punishment by prison in the eighteenth and nineteenth centuries through the lens of Philadelphia's own, Eastern State Penitentiary.

Attributes: Justice Ethics and the Law, Medieval, Ren & Reform Studies, Undergraduate

HIS 337 War & Peace in Imperial Russia (3 credits)

This course is a survey of the major political, social, economic, and cultural developments of Russia from 980-1861. During this time, the lands of the Eastern Slavs grew to be one of the largest and most powerful empires on earth. This course will cover Kyivan Rus, the Mongol Empire's Golden Horde, the Rise of Moscow, the consolidation of the Romanov autocracy, the expansion of the Russian Empire, the Napoleonic Wars, and the Great Reforms that emancipated the serfs. Students will read primary and secondary sources, as well as a memoir of their choosing. They will complete a significant research paper.

Attributes: CCC: Writing Intensive, International Relations Course, Undergraduate

HIS 338 Russia & USSR, 1881-1991 (3 credits)

A survey of the major political, social, economic, and cultural events of Russia and the Soviet Union from 1881 to 1991. During this time, the lands of the Russian Empire and its successor, the Soviet Union, changed from a "backward" agricultural country to a technologically advanced superpower to fifteen new countries with diverse political and economic systems. The course will examine these developments through the decline of tsarism and the fall of the Romanov dynasty, the Russian revolutions and the foundation of the Soviet Union, Stalinism, World War II, the Cold War, and the reforms under Gorbachev that contributed to the collapse of the Soviet Union.

Attributes: CCC: Writing Intensive, International Relations Course, Undergraduate

HIS 339 The Mongol Empire (3 credits)

In the thirteenth century, the Mongols built the largest contiguous land empire that the world has ever known. This course will cover the rise, running, and fall of this enormous Eurasian empire. It will explore the society and culture of the Mongols, as well as how the Mongol Empire impacted the many peoples whom they conquered. Students will read and analyze primary sources written by those who experienced the Mongol Empire.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, Medieval, Ren & Reform Studies, GEP: Non-Western Studies, Undergraduate

HIS 340 Stalinism in the USSR (3 credits)

An examination of the Soviet Union under the leadership of Joseph Stalin from 1928 to 1953. Course readings will focus on the experiences of ordinary people to demonstrate how Stalin's rule brought both opportunity and great tragedy. Stalinism, historians argue, was more than a political ideology such as Marxism and Leninism, but a way of life and civilization distinct from anything the modern world had yet experienced.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, International Relations Course, Undergraduate

HIS 341 Genocide & Human Rights (3 credits)

Through an examination of four twentieth-century genocides (the Armenian Genocide from 1915 to 1917, the Holocaust from 1933 to 1945, the genocide in Cambodia from 1976 to 1979, and the genocide in Rwanda in 1994), the course will explore the concept of genocide and the development of national and global laws to prevent it, promote human rights, and prosecute abusers. Students will read primary and secondary sources and study genocidal violence as a particularly vicious form of state policy, as well as a human and personal experience of terror and murder.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Mission: Global Citizenship, GEP: Ethics Intensive, International Relations Course, Justice Ethics and the Law , Undergraduate

HIS 343 African Ethnicities (3 credits)

Scholars have noted that one of the worst words in any language is the word for brother because it informs one to treat their brothers one way and all others differently. This course has two major themes: learning the various ways that identities are constructed and used and, two, the multiple ways in which these identities have impacted morality. This class begins with introductions to different ethnic schools of thought and African moralities. It continues with case studies on the Akan, Yoruba, Afrikaner, Hutu, and Tutsi ethnic identities and ethics.

Prerequisites: ENG 101

Attributes: Africana Studies Course, GEP: Ethics Intensive, International Relations Course, GEP: Non-Western Studies, GEP: Writing Intensive

HIS 346 Religion & Philosophy: Africa (3 credits)

Examines the role of religious thought and cultural philosophies in conflict and peace in Africa. The class will begin as a survey of the history, cultures and religions of Africa. After which, several case studies will be presented that put specific North-African interpretations of Judaism, Islam, Christianity or traditionalist beliefs at the center of either conflict or consensus in this region. A final extended case study will examine the Somali, where one has a unity of language, culture and religion, but due to decades of civil wars, no functional state. These case studies will focus on the specific religious beliefs or practices that either endeared religious groups to each other or transcended religious denominations to provide concrete examples for the ways in which the proponents of faiths and secularity coexist or cause conflict in Africa.

Prerequisites: THE 153 or THE 154 or THE 155

Attributes: GEP: Faith-Reason Course, International Relations Course, Undergraduate

HIS 348 Witches in Early Modern Europe (3 credits)

Examines popular and educated belief in the supernatural in early modern Europe, 1400-1800. Focuses especially on the "witch-craze" that occurred across Europe and its American colonies during the sixteenth and seventeenth centuries, as well as attitudes towards supernatural entities such as ghosts and werewolves.

Attributes: Gender Studies Course, Justice Ethics and the Law , Medieval, Ren & Reform Studies, Undergraduate

HIS 350 Exchnng & Conq in Mod E. Asia (3 credits)

An analysis of East Asian history from 1500 to the present, emphasizing the reciprocal influences of East Asia and the West. The primary focus will be on China and Japan, with attention also to Korea and Vietnam. Major topics will include the Jesuits in East Asia; approaches to modernization in China and Japan; the decline of China and the rise of Japan in the nineteenth century; colonialism and anti-colonial movements; the challenges of global culture; and debates over human rights in the late twentieth century.

Attributes: Asian Studies Course, International Relations Course, Undergraduate

HIS 351 Gndr, Ideolgy & Rev in E. Asia (3 credits)

This course will examine the institutional and ideological connections between gender roles and social unrest in East Asia since 1900.

Questions central to the class will be: changing notions of the ideal man and woman, and how changes in society and politics have been reflected in gender roles for men and women. Topics may include traditional East Asian societies; foot binding; revolutionary movements including communism, nationalism and feminism; family-planning; the Japanese samurai ideal; and gender roles in film and fiction.

Attributes: Asian Studies Course, Gender Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 352 Late Imperial China (3 credits)

A survey of Chinese social, political, intellectual, and cultural history during the Ming and Qing dynasties. Major topics will include Ming voyages of discovery, Ming art and literature, the Manchu conquest, War of the Three Feudatories, Taiping Rebellion, and the advent of Western imperialism.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 353 Modern China (3 credits)

A survey of Chinese social, political, intellectual, and cultural history from 1900 to the present. Major topics will include the Opium Wars, emergence of Chinese nationalism, the Boxer Rebellion, collapse and fall of the Qing dynasty, the May Fourth Movement in literature and politics, competing strands of Chinese communism, warlords, the anti-Japanese war, the founding of the People's Republic, the Great Leap Forward, Cultural Revolution, Deng Xiaoping's Reforms, social protest of the 1980s, and the challenges of rapid economic development.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 354 Japan Since 1600 (3 credits)

A survey of Japanese history since 1600. Major topics include traditional Japanese social structure, bushido and samurai culture, Perry and the opening of Japan, the Meiji Restoration, militarism and modernization, expansion onto the Asian continent, Showa democracy, the Pacific War, the American Occupation, political and economic reconstruction, cinema and literature of post-war Japan.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 356 Modern South Asia (3 credits)

The nation-states of India, Pakistan, Bangladesh, Sri Lanka, Bhutan, Nepal and the Maldives Islands (and sometimes Afghanistan)-comprise incredible diversity of language, culture, religion, art, dress, architecture, and cuisine. This course places the region into historical, political and socioeconomic context. It offers a thematic and chronological study of modern South Asia with thorough examinations of the transition from the late Mughal to the British colonial period, the movements for independence and the social activism that grew out of them. Includes: gender, caste/casteism, minorities, territorial/sovereignty conflicts, pop culture and film, development economies, and the South Asian diaspora.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 357 History of Islam in Asia (3 credits)

The early history of Islam, and the ways it grew beyond the Arabian Peninsula and ultimately took hold in Central, South, Southeast Asia and East Asia. The course examines the expansion of Islam throughout Asia, its relationship with existing systems and geo-politics, the relationship between Islam and statecraft, and questions of gender, identity, belonging as well as the pressures of globalization, including the most current events affecting Asian Muslims.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 358 Contemporary China (3 credits)

History, politics, and China since 1976. Major topics covered will be the death of Mao and the end of the Cultural Revolution; the opening of relations with the United States; Deng Xiaoping's rise; opening and reform; China's "economic miracle"; the one-child policy; the 1989 democracy movement and its aftermath; China's rise as a global economic and political power; the environmental challenge accompanying China's economic development; and the Communist Party's strategies and tactics to maintain power.

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 359 India & Pak: Colony to Nation (3 credits)

This course will examine the emergence of anti-colonial leaders in the Indian subcontinent and the evolution and interaction of their thinking; the politics of Indian nationalism; the history of the 1947 partition and its reverberations; the challenges of state building after independence from Britain and the movement for the independence of East Pakistan, that became Bangladesh in 1971. This course includes the Reacting to the Past role-playing game "Defining a Nation: India on the Eve of Independence."

Attributes: Asian Studies Course, International Relations Course, GEP: Non-Western Studies, Undergraduate

HIS 360 Colonial America (3 credits)

A survey of the social, economic, cultural, and political developments in colonial America with special emphasis on the origins and evolution of the plantation system, slavery, religious diversity, cities, and scientific inquiry.

Attributes: American Studies Course, GEP: Diversity Course, Undergraduate

HIS 361 America in Age of Revolutions (3 credits)

A survey of American history from the era of the American Revolution through the mid-nineteenth century with special emphasis on independence, the 1800 revolution in politics, the transportation, agricultural, and industrial revolutions, and the social revolution accompanying modernization in the nineteenth century.

Attributes: American Studies Course, Undergraduate

HIS 362 The American Civil War (3 credits)

A history of the American Civil War and Reconstruction. The course will cover the causes, management, and consequences of the war in society, economics, politics, and culture.

Attributes: Africana Studies Course, American Studies Course, GEP: Ethics Intensive, Undergraduate

HIS 363 American Medicine Since 1865 (3 credits)

This course will explore the history of American medicine and medical treatment beginning with the Civil War. It will continue by exploring the introduction of new scientific approaches and technologies, the enhancement of fields like surgery and psychiatry, the influence of growing professionalization, pharmaceutical discoveries, and public health concerns, including sanitization, and the people who shaped these changes and their institutions: doctors, nurses, hospitals, and insurance companies. Throughout, we will consider as well the ways in which medicine has been affected by wars, epidemics, and other crises, as well as attitudes about race, class, and gender.

Attributes: American Studies Course, CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Justice Ethics and the Law, Undergraduate

HIS 366 Reform and Reaction in the US (3 credits)

Reform affected all levels of U.S. politics, culture, and society in the first half of the twentieth century, linking the first Roosevelt administration to the last. Progressives and New Dealers tried to save the world abroad and preserve health and "normalcy" at home, as women, immigrants, and African-Americans pressed for greater opportunities. Two world wars complicated and deepened these trends. This course will examine the nature, contradictions, and social and political consequences of these important decades of reform, reaction, and transition.

Attributes: American Studies Course, CCC: Diversity, International Relations Course, Undergraduate

HIS 370 Special Topics in History (3 credits)

Topics of interest in History that are not covered in a regularly offered course. Content and structure of the course are determined by the course supervisor. The special topic(s) for a given semester will be announced prior to registration.

Attributes: Undergraduate

HIS 379 Black History Since Civil War (3 credits)

The history of Black Americans from Reconstruction to the present day. Students will examine the unity and diversity of the Black experience, including the myriad social, cultural, political, and economic conditions that created this experience. They will also explore the ways in which African-Americans have shaped American history and culture, and their efforts, in concert with other Americans, to subvert, transcend, and otherwise reform a discriminatory landscape and reassert the founding principles of the American republic.

Prerequisites: HIS 154 and ENG 101

Attributes: Africana Studies Course, American Studies Course, CCC: Diversity, GEP: Diversity Course, Justice Ethics and the Law, Undergraduate, GEP: Writing Intensive

HIS 381 US in the World since WWI (3 credits)

Examines the role of the United States in the world from 1917 until the end of the Cold War. The course explores the nation's transformation from a hesitant embrace of international commitments to an expansive vision of global involvement.

Attributes: American Studies Course, International Relations Course, Undergraduate

HIS 382 American Foreign Policy (3 credits)

This course offers an interdisciplinary perspective on the U.S.'s role in global events emphasizing both historical understanding and theoretical approaches. Beginning with World War I, the course will develop major themes and challenges for U.S. foreign policy in the 20th century and beyond: isolationism vs. internationalism, hegemony vs. empire, citizens' rights vs. state interests, and the extent to which the pursuit of national security (national power and prosperity) should recognize ethical limits.

Attributes: American Studies Course, International Relations Course, Undergraduate

HIS 383 Food in American History (3 credits)

An examination of how food and foodways have historically shaped and reflected American culture, society, economy, and politics. Major topics include agriculture and labor; technology and industrial food processing; ethnic cuisines and traditions; restaurants and supermarkets; food, family, and gender; and the impact of government policies and regulations.

Attributes: American Studies Course, GEP. Ethics Intensive, Undergraduate

HIS 385 Women in America (3 credits)

The history of American women from the antebellum period to present. This course will focus on the evolution of women's family and work roles, as well as their involvement in social reform and political movements. It will emphasize both the unity and the diversity of women's historical experiences, based upon factors such as race, ethnicity, class, and region.

Attributes: American Studies Course, CCC: Diversity, GEP. Diversity Course, Gender Studies Course, Undergraduate

HIS 386 American Environmental History (3 credits)

A study of our historical place in the natural landscape through the methods of "environmental history," examining ecological relationships between humans and nature, political and economic influences on the environment, and cultural conceptions of the natural world. Drawing on methods from the natural sciences, the social sciences, and the humanities, the course will survey over 500 years of North American environmental history, with topics ranging from urban pollution and suburban sprawl to agricultural practices and wilderness protection.

Attributes: American Studies Course, GEP. Ethics Intensive, Undergraduate

HIS 387 Popular Culture in the US (3 credits)

A survey of the production and consumption of commercialized leisure in the United States from the early nineteenth century to the present day. Throughout the nation's history, American popular culture has both reflected and shaped society's values, often serving as an arena of conflict among classes, races, and genders. By investigating selected sites on this contested terrain—from novels, stage shows, and movies to radio, television, and popular music—students will learn to think seriously, critically, and historically about the mass-produced culture that surrounds them every day.

Attributes: American Studies Course, Undergraduate

HIS 391 American Military History (3 credits)

This course explores the development of the American military and its roles in America's wars from the period of the Spanish-American War to the present. Emphasis will be placed on growth and change in the military within a broader social, political, and economic context.

Attributes: American Studies Course, International Relations Course, Undergraduate

HIS 392 Museums, Monuments, and Media (3 credits)

"Public history" is history as it is practiced outside of the classroom for a general audience: at museums, monuments, and historic sites; in film, television, and digital media. In this course, students will examine the history, methods, and impact of public history in the United States. Through case studies, debates, site visits, and hands-on projects, students will learn how to consume, critique, and create public history, and to assess how the past is used (and abused) for present purposes.

Attributes: American Studies Course, GEP. Ethics Intensive, Undergraduate

HIS 396 Transfer History Credit (3 credits)**HIS 470 Special Topics in History (3 credits)**

Topics of interest in History that are not covered in a regularly offered course. Content and structure of the course are determined by the course supervisor. The special topic(s) for a given semester will be announced prior to registration.

Attributes: Undergraduate

HIS 471 Seminar in American History (3 credits)

Lectures, readings, and discussions focusing on an announced theme in United States history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101 and HIS 154

Attributes: American Studies Course, CCC: Writing Intensive, Undergraduate, GEP. Writing Intensive

HIS 472 Seminar in European History (3 credits)

Lectures, readings, and discussion focusing on an announced theme in European history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101

Attributes: CCC: Writing Intensive, GEP. Ethics Intensive, Undergraduate, GEP. Writing Intensive

HIS 473 Seminar in Eurasian History (3 credits)

Lectures, readings, and discussion focusing on an announced theme in Eurasian history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101 and HIS 154

Attributes: CCC: Writing Intensive, International Relations Course, Undergraduate, GEP. Writing Intensive

HIS 474 Seminar in Latin Am His (3 credits)

Lectures, readings, and discussion focusing on an announced theme in Latin American history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101

Attributes: Latin American Studies Course, Undergraduate, GEP. Writing Intensive

HIS 476 Seminar in Asian History (3 credits)

Lecture, readings, and discussion focusing on an announced theme in Asian history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101

Attributes: Asian Studies Course, Undergraduate, GEP. Writing Intensive

HIS 477 Seminar in African History (3 credits)

Lectures, readings, and discussion focusing on an announced theme in African history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101

Attributes: Africana Studies Course, GEP. Diversity Course, Undergraduate, GEP. Writing Intensive

HIS 478 Seminar Global Comparative His (3 credits)

Lectures, readings, and discussion focusing on an announced theme in global and comparative history. Each student undertakes a major research project associated with the selected theme.

Prerequisites: ENG 101

Attributes: CCC: Writing Intensive, International Relations Course, Undergraduate, GEP. Writing Intensive

HIS 480 Readings in Latin Amer Hist (3 credits)

A study of significant themes and periods in Latin American history under the direction of an instructor. Frequent consultations and written reports are required. Prior approval from the chair is required.

Prerequisites: ENG 101

Attributes: Latin American Studies Course, Undergraduate, GEP. Writing Intensive

HIS 481 Readings in Asian Hist (3 credits)

A study of significant themes and periods in Asian history under the direction of an instructor. Frequent consultations and written reports are required. Prior approval from the chair is required.

Prerequisites: ENG 101

Attributes: Asian Studies Course, Undergraduate, GEP. Writing Intensive

HIS 482 Readings in European Hist (3 credits)

A study of significant themes and periods in European history under the direction of an instructor. Frequent consultations and written reports are required. Prior approval from the chair is required.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP. Writing Intensive

HIS 483 Readings in American Hist (3 credits)

A study of significant themes and periods in American history under the direction of an instructor. Frequent consultations and written reports are required. Prior approval from the chair is required.

Prerequisites: ENG 101

Attributes: American Studies Course, Undergraduate, GEP. Writing Intensive

HIS 484 Readings in African History (3 credits)

A study of significant themes and periods in African history under the direction of an instructor. Frequent consultations and written reports are required. Prior approval from the chair is required.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP. Writing Intensive

HIS 491 Philadelphia Area Internship (3 credits)

The Philadelphia Area Internship course supports student internships in the public sector, private sector, or in a nongovernmental organization (NGO) in the Philadelphia area. Students will complete a total of 130 hours of work, write a resume and sample letter, keep a journal, and attend and write about an SJU Career Development Center event. Students who complete the requirements will receive 3 credits for one upper-division course in History, Political Science, or International Relations.

Attributes: International Relations Course, Undergraduate

HIS 493 Honors Research & Ind Study I (3 credits)

Independent research leading to the successful completion and defense of an Honors Thesis.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP. Writing Intensive

HIS 494 Honors Research & Ind Study II (3 credits)

Independent research leading to the successful completion and defense of an Honors Thesis.

Prerequisites: ENG 101

Attributes: Undergraduate, GEP. Writing Intensive

HIS 496 Transfer History Credit (3 credits)

Honors (HON)

HON 221 Rebels&Revolutionaries:Art&Lit (3 credits)

In this course we will explore the works of 20th- and 21st-century visual artists and writers who have rebelled against the status quo and revolutionized the course of visual art and literature. We will delve into their texts and images through readings, discussions, and field trips, and consider what they teach us about our own time and our role in it.

Attributes: Art History Course, CCC: F&P Arts, Design & Creative, CCC: Literature, English Area 4- British/Irish, GEP. Art/Literature, Honors Course, Irish Studies Course, Undergraduate

HON 222 Leadership: Ancient&Mod Views (3 credits)

The Greco-Roman world produced some of history's most celebrated leaders. Through its presidents and entrepreneurs, the U.S. has dominated the global political and economic scene since the early 20th century. The course examines ancient and modern examples of leadership to deepen students' understanding and prepare them for future positions. Topics include: What motivates people to become leaders? What are the qualities associated with a successful leader? What flaws and weaknesses characterize a bad leader? How do leaders inspire others to share their vision? To what extent is the ability to lead determined, or undermined, by one's gender, race, or socioeconomic status? How does one overcome such obstacles?

Attributes: GEP. Art/Literature, Honors Course, Undergraduate

HON 230 Creativity Honors (3 credits)

An interdisciplinary engagement with creative writing and philosophical questions around creation and human creativity. Questions can include: What is creativity? Does it differ from creation? How? Does human art create or only imitate the creations of God or nature? How has art, whether literary, visual, or otherwise, been practiced and understood? Can everyone be, or learn to be, creative? What stimulates, what obstructs creativity? Is creativity a human virtue? Why is it so valued in society today? Can individuals alone aspire to creativity, or can communities also be creative? More broadly, can we even explain human creativity?

Prerequisites: ENG 101 and PHL 154

Restrictions: Enrollment limited to students with the Honors Program Student or Usci Legacy Honors attributes.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Philosophy L2 Non Ethics, CCC: Writing Intensive, GEP. Art/Literature, Honors Course, GEP. Phil. Anthropology, Team Taught, Undergraduate, GEP. Writing Intensive

HON 235 Views of the Cosmos Honors (3 credits)

An introduction to the study of the universe from scientific, religious, literary, and philosophical standpoints. Surveys mankind's efforts to understand the nature of the cosmos, including its origins, evolution, and eventual demise. Viewpoints of many religious groups, cultures, writers, and scientific thinkers will be discussed and compared. Contemporary debates in cosmology will be fully explored without mathematics.

Students who register for HON 235 must also register for a HON 235 laboratory. For example, if you register for HON 235 you must, at the same time, register for a section of HON 235L.

Prerequisites: ENG 101

Restrictions: Enrollment limited to students with the Honors Program Student or Usci Legacy Honors attributes.

Attributes: CCC: Literature, CCC: Natural Science, GEP. Art/Literature, GEP. Natural Science, Honors Course, GEP. Science Course w/Lab, Team Taught, Undergraduate

HON 235L Views of the Cosmos Lab (1 credit)

Students who register for HON 235 must also register for a HON 235 laboratory. For example, if you register for HON 235 you must, at the same time, register for a section of HON 235L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

HON 270 Honors Special Topics (3 credits)

Topics will vary by instructor each semester in which the class is offered.

Attributes: Honors Course, Undergraduate

HON 300 Community Engaged Scholarship (3 credits)

In this course, students will work with a community-based organization to design and conduct research on an issue related to homelessness or affordable housing. Throughout the semester, students will learn about research methods, research ethics, and the particular urban context within which they will be working. More importantly, students will gain experience working alongside staff of a community-based organization to solve problems or assess needs and strengths. This is a service-learning course.

Attributes: GEP: Diversity Course, GEP: Social Science, Honors Course, Undergraduate

HON 304 Global Shakespeares Honors (3 credits)

Shakespeare's plays have been staged around the world, made into novels, films, ballets, musicals, and operas, set in the Wild West, medieval Japan, fascist Italy, and on fictional planets, blended with Bollywood Cinema, Chinese Opera, Zulu dance and Japanese Noh Theater. What do global artists gain from Shakespeare's works? Studying a handful of Shakespeare's plays directly, we pay particular attention to race, gender, disability, and religion – issues that are often foregrounded or altered in adaptations. We also deal with the racism, misogyny, ableism, colonialism and anti-Semitism and the real-world violence behind these representations. This lays the groundwork for our study of adaptations from around the world. Some suggest that the Western canon, with Shakespeare at its center, has been used as tools of cultural oppression; might reinventions of Shakespeare be seen as acts of liberation or rebellion?

Prerequisites: ENG 101

Restrictions: Enrollment limited to students with the Honors Program Student or Usci Legacy Honors attributes.

Attributes: CCC: Diversity, CCC: Literature, CCC: Writing Intensive, GEP: Diversity Course, GEP: Art/Literature, Honors Course, Team Taught, Undergraduate, GEP: Writing Intensive

HON 311 Paradoxes, Prob & Proofs (3 credits)

Can a sentence be both true and false at the same time? Can a theorem be true if it has no proof? Can there be different sizes of infinity? Can a single solid ball be decomposed and reassembled to create two balls each with the same volume as the original? These questions all lie at the juncture of philosophy and the foundations of mathematics. This course examines the questions that have emerged in the 20th century about the nature of mathematical truth and the status of our mathematical knowledge. This is an interdisciplinary course that considers questions from both mathematical and philosophical perspectives.

Attributes: CCC: Mathematics, CCC: Philosophy L2 Non Ethics, Honors Course, GEP: Math Beauty, Undergraduate

HON 316 Tragedy in Lit & Philosophy (3 credits)

This course, focused on classical, Shakespearean, and modern examples of tragedy, will seek to answer the following questions: Why do we enjoy seeing representations of tragic suffering? What does this tell us about human nature and our societies? Would a life without tragedy be fully human? What is the relationship between tragedy and trauma?

Attributes: CCC: Literature, CCC: Philosophy L2 Non Ethics, CCC: Writing Intensive, English Area 3 - Shakespeare, English Area 4- British/Irish, English Early Lit, GEP: Art/Literature, Honors Course, GEP: Phil. Anthropology, Team Taught, Undergraduate

HON 324 Russia as a Global Power (3 credits)

This course will examine Russia's rise and role as a global power in the 20th and 21st centuries. After suffering a devastating defeat in World War I, Russia, as the Soviet Union, remade its economic, cultural, and military power to be central to the defeat of the Axis states and then challenged the U.S. throughout the Cold War. The breakup of the Soviet Union set Russia's position back again, but since 2007, Putin has been increasingly assertive around the world. Combining the disciplines of History and Political Science, students will study the ebb and flow of Russian power using the tools of both disciplines. By examining secondary and primary sources, as well as theories of empire, war, state formation, and authoritarianism, students will achieve a strong understanding of Soviet and Russian foreign policy and the conceptual tools for better understanding post-Soviet Russia in the global arena.

Attributes: CCC: Mission: Global Citizenship, CCC: Social Science, GEP: Social Science, GEP: Globalization Course, Honors Course, International Relations Course, Team Taught

HON 328 Anthro & Philo of the Body HON (3 credits)

This multidisciplinary course examines critical questions raised by the human body and our lived experience. We ask how our natures as complex human persons with rational, biological, and spiritual elements are both formed in response to bodily experience and how, in turn, these elements impact our experience and sense of the possible. This leads us to inquire into the ethical norms and responsibilities that have been fashioned around the body, as they pertain both to oneself and others. Specific topics may include: cultural relativism; the sources of normativity; the ethics of suffering and enduring; the ethics of pleasure; duties and possibilities of kindness; ordinary and transformative lived experiences; the corporeality of inequality and injustice.

Attributes: CCC: Diversity, CCC: Philosophy L2 Non Ethics, GEP: Social Science, Honors Course, GEP: Phil. Anthropology, Undergraduate

HON 360 OxfordTutorial:TechRevolutions (3 credits)

This interdisciplinary course is devoted to the study of the cultural changes produced by changing technologies, from prehistory to the present and future. Looking at earlier technological revolutions and their impacts on human society (and, in some cases, on human biology) can tell us much about our own society and its prospects amidst the extraordinary technological and cultural upheaval to come.

Prerequisites: ENG 101 and PHL 154

Restrictions: Enrollment limited to students with the Honors Program Student or Usci Legacy Honors attributes.

Attributes: CCC: Philosophy L2 Non Ethics, CCC: Writing Intensive, GEP: Art/Literature, Honors Course, GEP: Phil. Anthropology, Team Taught, Undergraduate, GEP: Writing Intensive

HON 361 OxfordTutorial:IndiaPartitions (3 credits)

This course will query the singularity of the Indian Partition of 1947 through an examination of both historical and literary sources that reveal multiple experiences and narratives of what may be better thought of as long processes of differentiation not just between states, but between peoples and communities in the subcontinent. The main goal of this course is to introduce students to the history of Partition, and to prompt students to analyze the different modes of expression that have emerged from it, including short stories, poetry, novels, oral narratives, and films.

Prerequisites: ENG 101

Restrictions: Enrollment limited to students with the Honors Program Student or Usci Legacy Honors attributes.

Attributes: CCC: Writing Intensive, GEP: Art/Literature, Honors Course, GEP: Non-Western Studies, Team Taught, Undergraduate

HON 370 Honors Special Topics (3 credits)

Topics will vary by instructor each semester in which the class is offered.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 110H

Attributes: CCC: Diversity, CCC: Philosophy L2 Non Ethics, CCC: Writing Intensive, Honors Course, Undergraduate

HON 384 Jew/Chr. Theologies Compared (3 credits)

The course studies fundamental religious questions as understood from various Jewish and Christian perspectives. Christian and Jewish students will gain an understanding of the other religious community while also deepening their understanding of their own. Other students will encounter the two traditions through a comparative lens. Topics to be discussed include the experience of God; the Bible; how Christians and Jews understand their relationship to God and the world; worship and prayer; and the destiny of the created universe.

Attributes: CCC: Mission: Faith Reason, CCC: Religious Studies, GEP: Faith-Reason Course, Honors Course, GEP: Religious Difference, Undergraduate

HON 388 Jews&Chr. Bible Interpretation (3 credits)

Although Jews and Christians share many of the same scriptural books, their respective collections are differently organized and named. Christians refer to their collection as the "Old Testament," while Jews call their texts the "Tanakh" (an acronym for the Hebrew words for Teaching, Prophets, and Writings). Despite, or because of this commonality, Christians and Jews have often battled over these scriptures' meanings. This course explores the ways that Jews and Christians have interpreted key texts, separately and together, over two millennia of learning from and disputing with each other. It also examines why the Bible has been a source of conflict between the two groups, with a focus on certain key passages, and why that is currently changing - as evidenced in recent official Catholic instructions.

Attributes: CCC: Mission: Faith Reason, CCC: Religious Studies, GEP: Faith-Reason Course, Honors Course, GEP: Religious Difference, Undergraduate

HON 390 Descending Tower: Commty Rsrch (3 credits)

Engaged scholarship can take several forms. Broadly defined, it means connecting the rich resources of the university to our most pressing social, civic, and ethical problems. One key way of sharing these resources is through research—not "on" the community, but "with" the community. This type of research model is one in which projects are developed collaboratively by community organization staff, faculty, and students, building on the unique strengths of those involved. In this course, students will work with a community-based organizations to design and conduct research. Throughout the semester, students will learn about research methods and ethics, and the particular urban context in which they will be working. More importantly, students will gain experience working alongside staff of a community-based organization to solve problems or assess needs and strengths.

Attributes: Honors Course, Undergraduate

HON 493 Independent Research I (6 credits)

Independent research, either for an Honors Independent Study, a College Honors Thesis, or a Research Concept Form

Attributes: Honors Course, Undergraduate

HON 494 Independent Research II (6 credits)

Independent research, either for an Honors Independent Study, a College Honors Thesis, or a Research Concept Form

Attributes: Honors Course, Undergraduate

HON 495 Capstone (6 credits)

Honors capstone research

Attributes: Honors Course, Undergraduate

Interdisciplinary (INT)

INT 101 Seminar in Learning Strategies (1 credit)

Adult students face many challenges while completing their degree. This course helps students develop both critical self-management and study skills to be successful in school and balance the needs of school, work and home.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

INT 103 Methods of Patient Care (1 credit)

This course is designed to instruct students in the basics of patient care. Topics to be covered include communication, patient moving and transportation, infection control, venipuncture, vital signs, medications, support systems and emergency care.

INT 151 Inequality in American Society (1 credit)

This 1-credit course has been created to enhance the understanding of students about inequality and racism. This course is taught by faculty from departments across the university, and, as such, has an interdisciplinary lens. Students will be able to take the ideas they learn in this course and apply them critically to multiple dimensions of inequality with the intent to dismantle harmful effects of racism and inequality within our democratic society. Ignatian pedagogy encourages us to learn, reflect, and act – we hope that students will use this course as a foundation for future action. The course should be taken in a student's first four (4) semesters at SJU (including all transfer students except those coming in under block transfers) in conjunction with their Major and their schedule constraints.

Attributes: Undergraduate

INT 170 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed as an introductory level course or as a course primarily for but not limited to first-year students.

Attributes: Undergraduate

INT 191 Washington Leadership Seminar (3 credits)

Students who attend The Washington Center (TWC) take a leadership seminar through TWC. This course is an elective; it does not count for major or minor credit.

Attributes: Undergraduate

INT 192 Washington Internship (3 credits)

Students who attend The Washington Center (TWC) for a normal academic semester (fall or spring) perform a 30-35 hour a week internship. The Department grants students two upper division courses (6 credits) for the internship and also this third elective course for these internship hours. This course is an elective; it does not count for major or minor credit.

Attributes: Undergraduate

INT 193 Washington Center Elective (3 credits)

Students who attend The Washington Center (TWC) take one evening course at the Center in addition to performing their internship and participating in the leadership seminar. This course is an elective; it does not count for major or minor credit.

Attributes: Undergraduate

INT 196 Interdisciplinary Elective (3 credits)**INT 270 Special Topics (1-3 credits)**

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to sophomores.

Attributes: Undergraduate

INT 302 Introduction to Capstone (1 credit)

This course prepares the student to explore the meaning, benefits and components of service learning. Students will explore potential ideas for development of a service learning project which will be implemented prior to completion of the curriculum.

Prerequisites: (NUR 170 or NUR 301 (may be taken concurrently)) or (MGT 110 or HAD 201 (may be taken concurrently)) or (IPC 302 or IPC 401)

Attributes: Undergraduate

INT 310 Perspectives on Aging (3 credits)

This course provides the learner with an overview of the life changes associated with aging and pertinent issues and policies involved in caring for the older adult population (65+). Physiological, psychosocial and economic changes associated with aging, health related issues and outcomes, and quality of an access to healthcare for this age group are examined.

Restrictions: Enrollment limited to students with a class of Sophomore.

Attributes: Undergraduate

INT 322 Teaching and Learning (3 credits)

This course prepares the health care professional to educate patients, peers and/or others in the healthcare setting or community. Students will examine characteristics of learners, adult learning principles, teaching methodologies, strategies for implementation, and evaluation methods. Barriers to learning, including readiness to learn and literacy concerns will be discussed.

Prerequisites: NUR 170 or NUR 301 (may be taken concurrently) or MGT 110 or HAD 201 (may be taken concurrently) or HSC 300 or (IPC 302 or IPC 401)

Attributes: Undergraduate

INT 354 Psychology and Religion (3 credits)

This course enters into the ongoing dialogue between psychology and religion, focusing first upon what psychologists have to say about the phenomenon of religion as it relates to culture, society, and the individual; then also considering ways in which religious people have articulated (from "non-psychological" perspectives) viable "psychologies" as well. The course surveys psychological thinking about religion in the works of James, Freud, Maslow, Jung, Allport, and more contemporary psychologists of religion. In addition, it focuses upon specific issues and problems related to religious experience and behavior, exploring what both psychologists and "religionists" have to say about such phenomena as cults, conversion, prayer and ritual behavior, shamanism, meditation, religious intolerance, and altruism.

Prerequisites: (THE 153 or THE 154 or THE 155)

Attributes: Faith Justice Course, GEP, Faith-Reason Course, Undergraduate

INT 370 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to juniors.

Attributes: Undergraduate

INT 411 Washington Internship I (3 credits)

At The Washington Center (see Special Academic Programs and Services for more information), students are placed in an internship where they work 30-35 hours in an office making substantive contributions to its work in politics, public policy, law, advocacy, or other related fields. For these activities, students earn two courses worth of upper division credit. Please note: the other courses at the Washington Center do not count for major or minor credit.

Attributes: Undergraduate

INT 412 Washington Internship II (3 credits)

At The Washington Center (see Special Academic Programs and Services for more information), students are placed in an internship where they work 30-35 hours in an office making substantive contributions to its work in politics, public policy, law, advocacy, or other related fields. For these activities, students earn two courses worth of upper division credit. Please note: the other courses at the Washington Center do not count for major or minor credit.

Attributes: Undergraduate

INT 450 Capstone (3 credits)

This culminating course is designed to allow students to creatively analyze, synthesize and evaluate learning across the curriculum. The course integrates knowledge, skills, and experiential learning obtained through the service learning project. INT 450 should be the last course taken in your program, according to the specific progression policies of your particular bachelor's program. 30 hours of service learning must be completed prior to taking this course.

Prerequisites: (INT 302 or IPC 302) or (NUR 401 or INT 401 or IPC 401) or MGT 110 or HAD 201 or HAD 300

Attributes: Undergraduate

INT 470 Special Topics (1-3 credits)

This course will focus on a special topic of interest to an interdisciplinary audience that is not covered in a regularly offered course. The specific topic/content of this course will vary by instructor. This course is designed primarily for but not limited to seniors.

Attributes: Undergraduate

INT 490 Internship (3 credits)

This course supports student internships in a variety of interdisciplinary settings, where students will complete a total of 130 hours of site work, keep a journal, and develop career readiness competencies.

Attributes: Undergraduate

INT 494 Independent Research I (3 credits)

Faculty directed independent reading and research. May stand alone or precede INT 495.

Attributes: Undergraduate

INT 495 Independent Research II (3 credits)

Second semester of a yearlong faculty directed independent reading and research project.

Attributes: Undergraduate

INT 512 Health Policy and Finance (3 credits)**INT 570 Special Topics (1-3 credits)**

Topics will vary according to the semester in which the class is offered.

INT 601 Leadership in Healthcare (3 credits)

This course emphasizes effective leadership competencies in interprofessional healthcare teams. Theoretical leadership concepts are synthesized in relation to personal and professional values with emphasis placed on leading diverse teams for healthcare improvement.

INT 602 Quantitative Business Analysis (3 credits)

This course provides the tools necessary to analyze and interpret data in the business environment. Content focuses on the design, operations and control of business processes.

INT 603 Strategic Planning (3 credits)

This course provides an overview of skills, concepts, and methods required for a leader to think, plan, and act strategically. The course will focus on formulating, developing, and assessing the strategies that promote long-range success for organizations in today's changing environment.

INT 655 Integrating Experience #2 (1 credit)

This one day conference brings students from all graduate programs together to work collaboratively on solving problems and dealing with scenarios drawn from health care. During this seminar, students will present summaries of their Applied Practice projects, share experiences in the graduate programs, provide feedback, and network with colleagues and faculty.

International Business (IBU)

IBU 150 Cultr Divers & Interntnl Bus (3 credits)

The course develops the understanding that cultural diversity is a crucial component of sustained and productive cross-border interactions in general and international business in particular. It discusses the power of diversity whereby the whole can be made greater than the sum of the parts. Through in-class exercises and out-of-class assignments, the course leads students to accept that their framework for looking at the world around them, i.e., their worldview, may be very different from that of other cultures. The course encourages students to explore their comfort level with different views of the world through experiential exercises and through investigation of some causes for differences across cultures. It introduces and develops critical thinking regarding the role of business and its obligations to all stakeholders while developing the notion of corporate social responsibility.

Attributes: GEP: Diversity Course, First-Year Seminar, GEP: Globalization Course, Undergraduate

IBU 170 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

IBU 210 Intro International Business (3 credits)

This course is designed to introduce students to the basic concepts of international business by examining the following: 1) Country differences in political economy and culture; 2) Theories and politics of international trade, foreign direct investment and regional economic integration; 3) International operations from a functional perspective (i.e. Marketing, Operations, and Human Resources).

Attributes: CCC: Mission: Global Citizenship, GEP: Globalization Course, Undergraduate

IBU 270 International Bus Spec Topics (3 credits)

Topics will vary according to the semester in which the class is offered. CAS Students may take with permission of the Chair.

IBU 310 Essentials of Global Business (3 credits)

This course is designed to provide students with an overview of global business by examining the following: 1) Types and characteristics of multinational corporations (MNCs); 2) Theories of international trade and foreign direct investment; 3) Global strategies at entry-, operational- and exit levels. This course is primarily geared towards juniors who are interested in majoring or minoring in International Business.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Restrictions: Enrollment limited to students with a class of Junior, Sophomore or Senior.

Attributes: CCC: Mission: Global Citizenship, GEP: Globalization Course, Irish Studies Course, Undergraduate

IBU 370 Intern'l Topics & Study Tour (3 credits)

The objective of this course is to participate in a study tour or similar experience offering numerous corporate and institutional visits to allow first hand exploration of business issues. Emphasis will be placed on accounting, economic, finance, management, and marketing issues for various firms. A secondary objective is to expose students to different national cultures and cultural issues related to business. A third objective is to focus on one or more current business topics affecting at least two functional areas. Students will be expected to analyze the impact of the topic (s) on the various areas of business, particularly on the operation of multinational corporations.

Attributes: Undergraduate

IBU 470 Spec Topics in Internat Busine (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

IBU 471 Intl Business Practicum (1 credit)

This course is meant for students with opportunities working over the course of the semester/summer whose employers require a credit as condition of employment. To apply, the student submits a letter to the chair explaining why the practical training is required and includes a letter from the employer. The student submits to the department chair an 8-10 page paper at the end of the practical training describing their work responsibilities and what skills s/he acquired by participating. Does not satisfy any major, minor, general education or elective requirement. Grade is Pass/Fail. May be repeated once. Permission of Chair required.

Attributes: Undergraduate

IBU 472 International Busine Practicum (1 credit)

This course is meant for students with opportunities working over the course of the semester/summer whose employers require a credit as condition of employment. To apply, the student submits a letter to the chair explaining why the practical training is required and includes a letter from the employer. The student submits to the department chair an 8-10 page paper at the end of the practical training describing their work responsibilities and what skills s/he acquired by participating. Does not satisfy any major, minor, general education or elective requirement. Grade is Pass/Fail. May be repeated once. Permission of Chair required.

IBU 490 International Bus Internship (3 credits)

Permission of Chair required.

Attributes: Undergraduate

IBU 493 Internatnl Business Research I (3 credits)

Working under the guidance of a faculty member, students engage in a semester-long research project in the domain of International Business. Permission of Chair required.

IBU 494 Interntnl Business Research II (3 credits)

Working under the guidance of a faculty member, students engage in a semester-long research project in the domain of International Business. This is the second independent research course; it may be a continuation of a previous research project or the initiation of a new project. Permission of Chair required.

IBU 495 Global Strategic Planning (3 credits)

This course is the capstone class of the International Business program and focuses on the management of corporations operating internationally. The international environment implies greater opportunities as companies have access to a wider variety of markets and resources. However, this environment also implies greater managerial challenges. The aim of this course is to investigate how this greater complexity affects the management of companies that are international.

Prerequisites: IBU 210 and (MGT 110 or MGT 120 or MGT 121)

Restrictions: Enrollment limited to students with a class of Senior.

Attributes: GEP: Ethics Intensive, Undergraduate

IBU 600 Global Revolutions & Business (3 credits)

Global Revolutions and Business examines the global trends and forces that are shaping our world and the impact of those trends and forces on business organizations. In particular, we will focus on the global forces driving revolutionary changes such as Population, Resources, Information, Technology, Economic Integration, and Governance.

Focusing on the future, this course seeks to develop and hone your strategic thinking skills, in considering the near-term and long-term impact of the global changes on organizations.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

IBU 661 International Management (3 credits)

This course examines the international business environment, management practices outside the United States, and the interpersonal, organizational and institutional, issues facing managers conducting business in more than one cultural context.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

IBU 662 International Business Law (3 credits)

The purpose of this course is to acquaint the student with the international legal environment in which businesses operate. It will introduce the students to international business law as it has evolved over the centuries. It will also introduce students to national, regional and international organizations that regulate foreign commerce, including how international disputes are resolved. International sales, credits, and commercial transactions will be examined, as well as international and U.S. trade law.

Restrictions: Enrollment is limited to Graduate level students.

IBU 663 Manage Intl Strategic Alliance (3 credits)

This course examines formation, management, and evolution of international strategic alliances (including international joint ventures) as the most frequently used and uniquely characterized mode of entry into foreign markets.

IBU 770 International Bus Study Tour (3 credits)

A specially designed international tour to varying countries which offers students a unique opportunity to study international management-its dimensions, participants, trends, and opportunities. Students will also experience the heritage, ambience and excitement of the world's great countries and cities.

IBU 771 Topics: International Business (3 credits)

This course covers topics of current interest in the field of leadership. The specific subjects and prerequisites will be announced in the course schedule.

Attributes: Graduate

Italian (ITA)

ITA 101 Beginning Italian I (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students with no experience with the Italian language.

Prerequisites: Italian 101 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the Italian 102 Placement, Italian 201 Placement, Italian 202 Placement or Italian 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ITA 101L Beginning Italian I Lab (0 credits)

Required lab component for ITA 101.

Attributes: Undergraduate

ITA 102 Beginning Italian II (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice mid/high level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: ITA 101 or Italian 102 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the Italian 201 Placement, Italian 202 Placement or Italian 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ITA 170 Special Topics in Italian (3 credits)

Topics will vary according to the semester in which the class is offered. Check the semester listing for current topic.

Attributes: Undergraduate

ITA 201 Intermediate Italian I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice high/intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: ITA 102 or Italian 201 Placement with a score of 1

Restrictions: Students with the Italian 202 Placement or Italian 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ITA 202 Intermediate Italian II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar, pronunciation, and writing will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the intermediate low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: ITA 201 or Italian 202 Placement with a score of 1

Restrictions: Students with the Italian 301 Placement attribute may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

ITA 270 Special Topics in Italian (3 credits)

Topics will vary according to the semester in which the class is offered. Check the semester listing for current topic.

Attributes: Undergraduate

ITA 301 Italian Conversation (3 credits)

This course is designed to help students improve their oral communication skills in Italian through participation in interactive tasks. Much attention will be paid to the practice of new vocabulary. Discussion of grammar and communicative strategies will be integrated as needed in order to facilitate students' attempts at various rhetorical functions, such as describing, narrating, explaining, defining, expressing and supporting opinions, and tailoring the discourse to the audience and context.

Prerequisites: ITA 202 or Italian 301 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, GEP: Art/Literature, Undergraduate

ITA 302 Italian Composition (3 credits)

This course is designed to improve students' ability to communicate in written Italian and to develop the writing skills they will need to succeed in advanced Italian courses. Skills are developed through a process-oriented approach to writing, including steps related to vocabulary generation, organizing an outline, writing a draft, editing and revising, and writing a final version.

Prerequisites: (ITA 202 or Language Placement with a score of IT302) and ENG 101

Attributes: Undergraduate, GEP: Writing Intensive

ITA 306 The Roman Experience (3 credits)

The purpose of this course is to improve students' oral and written command of Italian through an intensive full-immersion presentation of the structures and stylistics of the language. The course is organized thematically around two main areas: issues in contemporary society and Roman literary, artistic and social landscapes. Students will read twentieth-century writers' appreciation of Rome, and newspaper articles on local cultural and social issues. While visiting sites described in the readings, interviewing the denizens on local issues, and observing the art and architecture that has left its imprint on western civilization as we know it, students will be asked to comment on their observations both in writing and in group conversation. They will acquire a very personal appreciation of the meraviglie di Roma and will formulate oral and written analyses on social, historical and artistic subjects. Conducted in Italian.

Prerequisites: ITA 301

Attributes: GEP: Diversity Course, GEP: Art/Literature, Undergraduate

ITA 315 Italy Through Art (3 credits)

In this language and culture course students refine their skills while learning about Italy through the medium of art. The approach encourages the development of a critical understanding of individual works by introducing students to the visual language of art. As a survey course, the subject content is chronologically wide ranging, extending from Magna Grecia to the Novecento, and includes a variety of media, including painting, sculpture and architecture. Among the artists covered are Cimabue, Giotto, Donatello, Masaccio, Piero della Francesca, Botticelli, Leonardo, Raffaello, Michelangelo, Cellini, Giorgione, Tiziano, Tintoretto, Caravaggio, Canaletto, Guardi, Canova, Modigliani, and De Chirico. By analyzing a variety of cultural artifacts, students will build vocabulary and use advanced grammatical structures. We will also read critical articles on art history and study the University's Art collection, which includes replicas of Michelangelo's most famous sculptures. The course is complemented visits to the Barnes Foundation and the Philadelphia Museum of Art. Conducted in Italian.

Prerequisites: ITA 202

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

ITA 330 The Ita Bus Wrld & its Lang (3 credits)

This course explores the language and culture of the Italian business world at an intermediate-high to advanced level. Besides developing writing and speaking skills-such as writing c.v., business letters and job descriptions; practicing job interviews, business meetings and presentations-the course analyzes socio-economic issues such as the position of women in the work force, the globalization of the markets of the European Union, and business etiquette through the analysis of Italian articles, the internet and visual materials (TV and movies). Conducted in Italian.

Attributes: GEP: Diversity Course, Undergraduate

ITA 340 Italian Culture & Civilization (3 credits)

A survey of the culture of Italy, its geography, history, politics, outstanding personalities, arts, literature, economic and social problems, sciences, and education. Conducted in Italian.

Prerequisites: ITA 301

Attributes: GEP: Art/Literature, Undergraduate

ITA 345 Art Fashion: la moda italiana (3 credits)

The goal of this course is to facilitate future educators in the teaching of foreign language and to allow those students, who are Education Majors and Minors, to fully comprehend how the multi-dimensional world of bilingualism plays and will continue to play a very important role in the future of this country. This course will examine the intricacies of acquiring a second language through the pedagogical years and into adulthood and will be taught in Italian. It will also examine the communication skills of Italian students learning English and of American students learning Italian. Emphasis shall be placed on the characteristics of interaction within the contexts that facilitate second language acquisition. Students will explore social, environmental and cultural differences and the roles they play in promoting or impeding L2 fluency and pronunciation. Theories and methodologies will be discussed, language classes observed and, eventually, students may have the possibility to teach specific grammar points in first year classrooms. Conducted in Italian.

Prerequisites: (ITA 301 and ITA 302) or (Language Placement with a score of IT345)

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

ITA 355 In Viaggio: Medioevo-Barocco (3 credits)

This interdisciplinary course focuses on the cultures of Medieval and Renaissance Italy and their enduring influence on contemporary Italian culture. As we examine the ways in which power and gender are reflected in cultural artifacts, we will study a variety of texts (including painting, sculpture, poetry and letters exchanged between friends and family members). These works allow us to trace the evolution of the concepts of sacred and profane love from the thirteenth to the sixteenth centuries. At the center of our inquiry are two issues central to early modern Italy: the self-fashioning of the subject and the structures and practices of power. Weekly themes—patronage and propaganda, the family, love and marriage, and women's roles in early modern society—will provide a frame for class discussion. Conducted in Italian.

Prerequisites: ITA 202

Attributes: GEP: Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ITA 356 In Viaggio: Barocco-Novecento (3 credits)

This language and culture course provides the tools to "travel" to the rich world of modern Italy and is designed to help students gain familiarity with Italian figures, art objects, cinematic texts, and literary works while developing and improving communication skills. The course focuses on interpretation and intercultural communication and showcases a sampling of culturally significant works. As we focus on the cultures of Baroque, Enlightenment, Risorgimento and Contemporary Italy, we will examine the ways in which power and gender are reflected in cultural artifacts and we will study the way in which art works and literary works have influenced Italian culture and western civilization.

Prerequisites: ITA 202

Attributes: GEP: Art/Literature, Undergraduate

ITA 360 Modern Italian Culture (3 credits)

The purpose of this course is to study some of the principal characteristics of contemporary Italian culture. The course explores such topics as regionalism, the formation of a national language, the question of national identity, terrorism, the separatist movements, gender relations, feminism, and popular culture. It studies Italian cultural trends in Italy today, outlines their history over the last one hundred years, and explores the future of Italian culture and society. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT360

Attributes: GEP: Art/Literature, Undergraduate

ITA 365 Italian Society and the Media (3 credits)

The goal of this course is to develop advanced-level oral/aural and reading/writing skills while addressing key aspects of contemporary Italian culture through the consideration of exclusively authentic materials, such as Italian newspaper and magazine articles, Italian TV broadcasting, and Italian internet sites. We shall also learn how to critique the written and visual Italian media, as well as how to navigate Italian websites. Students will choose readings and topics initially within a given list of categories and, later, among a virtually endless variety of internet sources. Among the topics we may address are: style, fashion and design; geography, art and tourism; the environment; immigration and racism; the position of young people and women in Italian society; current Italian and international events from an Italian perspective. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT365

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

ITA 370 Topics in Italian (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the Italian-speaking world. Topics will vary according to the semester in which the class is offered. Check the semester listing for current topic.

Prerequisites: ITA 301 or Language Placement with a score of IT370

Attributes: Undergraduate

ITA 380 Ita Journeys from Marco Polo (3 credits)

This interdisciplinary course investigates Italy's dual role as the home of legendary travelers and the destination for tourists over the centuries. Through a variety of texts-travel diaries, letters to kings and queens, maps, travel guides and film—we will explore the reality and metaphor of travel in the lives and works of pilgrims, poets, explorers and artists. We will consider three historical periods: the age of discovery (ca. 1300-1600), the grand tour (ca. 1600-1800) and the age of global tourism (ca. 1800- present). The course concludes with a virtual tour of various regions of contemporary Italy. As a final project, students will author their own travel guide to the Italian city (or cities) of their choice. Recommended for students who wish to further their cultural and linguistic preparation before studying abroad, this content-based language course emphasizes the vocabulary and idiomatic expressions necessary for travel in Italy. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT380

Attributes: GEP: Art/Literature, Undergraduate

ITA 402 L'italiano al Cinema (3 credits)

This course investigates major films as both aesthetic and cultural objects. It will introduce major directors, movements, and genres in Italian cinema from World War II to the present. We will study both "film d'autore" (Visconti, De Sica, Fellini, Scola, Risi, Monicelli) and "nuovi registi" (Bellocchio, Giordana, Muccino). We will analyze typically Italian historical drama, "commedia all' italiana" and postmodern pastiche and explore contemporary social issues such as regional, ethnic and gender diversity. We will read literary sources, screenplays and film criticism. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT402

Attributes: GEP: Art/Literature, Undergraduate

ITA 425 Italian Art and Artists (3 credits)

This interdisciplinary course examines the lives and works of artists including Sandro Botticelli, Leonardo Da Vinci, Michelangelo Buonarroti, Benvenuto Cellini, Caravaggio and Artemisia Gentileschi. A variety of works (poetry, prose, painting and sculpture) will be studied against the backdrop of the crisis of the Italian Renaissance. We will look closely at Counterreformation intellectual debates, religious dissent and persecution. Class meetings will be complemented by guest speakers and trips to local museums.

Prerequisites: ITA 301 or Language Placement with a score of IT425

Attributes: GEP. Art/Literature

ITA 430 Images of Rome: Papal Rome - Present (3 credits)

This course will interpret the symbolic and political importance of Rome in literary works and film. The course is organized historically: from the struggle over Rome within the Risorgimento movement to fascist and war-torn Rome; from the 50's Rome of reconstruction to the economic boom of the 1960's, to the socio-political problems of a new multicultural city in the 80's and 90's. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT430

Attributes: GEP. Art/Literature, Undergraduate

ITA 435 Rebels and Revolutionaries (3 credits)

The course aspires to provide an understanding of the culture of Baroque, Enlightenment and Risorgimento Italy and of its influence on contemporary Italian culture (especially as regards definition of concepts of gender, language and national identity). It considers a variety of genres—novels, poems, essays and plays—in the context of ideological and cultural currents. Audio-visual materials (videos, movies, cd roms) will be used and a variety of subtexts and interdisciplinary relationships will be explored, especially with history, art and philosophy. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT435

Attributes: GEP. Art/Literature, Undergraduate

ITA 440 Profane and Sacred Love (3 credits)

The course aspires to provide an understanding of the culture of Medieval and Renaissance Italy and of its influence on contemporary Italian culture. It focuses on how power and gender relationships are reflected in the literature—canzoni, sonetti, ballate, novelle. The works studied belong to the tradition of Courtly Love, Neo-Platonic love and the literature of the Renaissance courtesans and follows the evolution of concepts of sacred and profane love in Italian literature from the thirteenth to the sixteenth centuries. The course considers a variety of subtexts and interdisciplinary relationships especially with history and art history. Audio-visual materials (videos, movies, cd roms) will be used to bring home to the students the sights and sounds of this vibrant age. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT440

Attributes: GEP. Art/Literature, Undergraduate

ITA 445 The Medici Court (3 credits)

For the Medici, art and propaganda went hand in hand. This interdisciplinary course investigates the city and family that nurtured artists and humanists [including Brunelleschi, Fra Angelico, Donatello, Botticelli, Poliziano and Michelangelo]. Tracing the rise and fall of the dynasty, we will consider how the Medici fashioned an enduring image of princely power through architecture and music. We will study a variety of texts, including painting, sculpture, poetry and intimate letters exchanged between family members. This course will be complemented by visiting the Medici Collection at the Philadelphia Museum of Art. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT445

Attributes: GEP. Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

ITA 450 Italy in Age of Grand Tour (3 credits)

This course focuses on travel through Italy as an educational experience and cultural initiation and aims to improve students' reading, writing and speaking skills in Italian, while familiarizing them with culturally important sites and encouraging them to think critically about the notion of the Grand Tour. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT450

Attributes: Undergraduate

ITA 455 Women's Voices (3 credits)

We will investigate the relation between the emergence of a self-professed woman novelist and the changing ideologies concerning the moral and intellectual nature of women and their role in society. We will not only study the way prominent women intellectuals helped shape the debate on women's condition and on women's writing, but also their original contribution to the interpretation of twentieth century history (e.g. Fascism, the Resistance, the Second World War and the Holocaust). Among the literary theoretical issues we will encounter: the relationship of genre to gender, of gender to writing, and the role of gender values in historiographical representation. We shall read autobiographical and historical novels, as well as essays and non-fictional prose. The course will be complemented by a film and a lecture series. Conducted in Italian.

Prerequisites: ITA 301 or Language Placement with a score of IT455

Attributes: GEP. Art/Literature, Undergraduate

ITA 465 Birth of a Nation: Risorgimento (3 credits)

This course encourages a critical approach to the study of Italian unification in its aesthetic, cultural, and political dimensions as well as their repercussions on present-day Italian society and culture. The making of Italians, as Massimo D'Azeglio famously put it, would engage the best Italian minds for the following 150 years. The divisions between North and South, between Church and State, between the government and the people were created or compounded by the making of Italy. The course studies the debate on Italian Unification and the development of an Italian identity in a variety of historical artistic and literary sources, including diaries, letters, treatises, paintings, sculptures, poems and short stories.

Prerequisites: ITA 301

Attributes: Undergraduate

ITA 470 Topics in Italian (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the Italian-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Attributes: Undergraduate

ITA 490 Internship (3 credits)

An approved internship in Italian.

Attributes: Undergraduate

ITA 491 Internship (3 credits)

An approved internship in Italian.

Attributes: Undergraduate

ITA 493 Independent Research in ITA (3 credits)

Concentrated focus on a selected topic in Italian. Topic and content vary from semester to semester.

Attributes: Undergraduate

Italian Studies (IST)

IST 115 Italy Through Art (3 credits)

Taught in English. Conducted in Rome, this course introduces students to the visual language of art, while providing an enriching cultural experience. The eternal city is an expansive, open-air museum where ancient and modern meet. Students will learn about Rome's artistic heritage while living amidst ancient ruins, baroque basilicas and contemporary monuments. As we view art objects first-hand, we will explore the making and meaning of Italian art, by addressing methodological issues including form and function, style, materials and technique. We begin with a consideration of ancient Rome, through direct experience with monuments that have survived centuries. Next, we explore the early developments of Christianity by visiting Roman basilicas and churches. Our excursion to Tuscany focuses on Renaissance humanism and Medici patronage. Upon return to Rome we examine Baroque masterpieces adorning Roman piazzas and churches. We conclude with art and architecture of the period after 1870, when Rome became the capital of Italy. The course is complemented by guest lectures and site visits to Roman museums, churches and palaces, as well as excursions to Assisi, Florence, Pompeii and Sorrento. Counts toward the major and minor in art history, the Italian Studies major, the major and minor in Classical Studies, and the minor in Medieval, Renaissance, Reformation Studies.

Attributes: Art History Course, Classical Studies Course, GEP. Art/Literature, Medieval, Ren & Reform Studies, Undergraduate

IST 150 Ital Cinema-Neoreal to Present (3 credits)

This course investigates major Italian films as both aesthetic and cultural objects. It offers an introduction to Italian cinema from the 1940's to the Present, and also to Italian social and cultural history of that time. It introduces major directors, movements, and genres in Italian cinema, focusing on movies that not only are influential masterpieces, but also offer incisive interpretations of their cultural and social milieus, including regional, ethnic and religious diversity; gender diversity; social tensions and class issues. Visconti, De Sica, Fellini, Scola, Bellocchio, Giordana are among the directors we study.

Attributes: First-Year Seminar, GEP. Art/Literature, Undergraduate

IST 170 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

IST 270 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

IST 318 Italian Journeys (3 credits)

This interdisciplinary course investigates Italy's dual role as the home of legendary explorers and the destination for travelers over the centuries. Students will learn about the history of travel from and to Italy, the changing nature of travelers, their means of travel and their motivations. We will encounter medieval pilgrims, Renaissance mapmakers and eighteenth-century aristocrats as well as unwilling and accidental travelers. As we interpret the figure of the traveler, students will be encouraged to be voyagers themselves, reflecting critically on their own cultural assumptions, as well as issues of identity and power in the contact between cultures. Experiential learning units may include guest lectures and trips to local museums. Counts toward: Italian Studies Major; Italian major & minor; Museum Studies Minor; Medieval Renaissance Reformation Studies Minor; Global Literatures Major; Art History Major and Minor

Attributes: GEP. Diversity Course, GEP. Art/Literature, Undergraduate

IST 350 Mangia! Flavors of Italy (3 credits)

The expression "Mangia, mangia!" is commonly associated with American stereotypes of Italians. But is the perceived Italian love of food the same in the United States and in Italy? Is it an issue of quantity or quality? Of socio-economics, politics, or education? Is it global, local or both? In this interdisciplinary course, we will explore the role of food in Italian culture and in the shaping of Italian identity, in Italy and abroad. We will trace its evolution through a variety of texts: literature, works of art, music, and film, as well as family recipes. Guest lectures made by Italian chefs in Philadelphia, food tastings, and a visit to the Italian Market, will enrich the course.

IST 360 Italian Identities (3 credits)

In this course, taught in English, we will explore the complex nature of Italian Identities, focusing on race, sex and gender roles, religion, food, art and science. Does not count toward a minor in Italian. Counts towards a major in Italian Studies and it may count toward the major in Italian, with permission of the Chair of Modern and Classical Languages.

Attributes: GEP. Art/Literature, Undergraduate

IST 370 Topics in Italian Studies (3 credits)

The purpose of this course is to explore specific topics within the Italian-Speaking World. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic. Classes are taught in English.

Attributes: GEP. Art/Literature, Undergraduate

IST 375 Shadow State: Mafia in Italy (3 credits)

This course explores the nature of organized crime in Italy, its origins, its economic aspects, its connection with politics, its reality beyond stereotypes, and finally, the way it is portrayed in Italian Arts and literature. No pre-requisites required. Does not count toward a minor in Italian. May count toward the major, with permission of the Chair of Modern and Classical Languages.

Attributes: GEP. Art/Literature, Undergraduate

IST 420 Italian Cinema and the Sacred (3 credits)

Italian culture has been widely influenced by the sacred and many intellectuals have used the Bible as source of inspiration. In this course, we will analyze how Italian filmmakers have approached the dimension of the sacred and how they have depicted it in their movies. We will explore a range of directors from 1940's Neorealism to the present in order to understand how the relationship with the sacred has evolved over time. Throughout our analyses, we will engage in dialogue with selected Italian writers in order to see how they have approached the sacred. The course also considers the role of Jesuits in Italian society through the study of a film set in a Jesuit monastery in contemporary Venice.

Attributes: GEP. Art/Literature, Undergraduate

IST 460 The Art of Dante's Inferno (3 credits)

This course offers an interdisciplinary reading of Dante's *Inferno* from the perspectives of the history of art, music and cinema. Primary sources from across the arts span seven centuries of reception, and include a variety of interpretations. As we examine the interaction between Dante's poem and other forms of art, we will consider the ways in which those works shape interpretations of one of the greatest works of world culture. Throughout the course students will connect the poem's ethics to contemporary society. We will study the moral philosophy underpinning the *Inferno* and examine Dante's understanding of the 'Seven Deadly Sins' and the law of contrapasso. In considering Dante's ethics of punishment we will reflect upon the ways in which artists have depicted judgment and retribution in their interpretations and responses. Guest lectures and site visits will complement the course. Counts toward the major/minor in Art History.

Attributes: GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

Japanese (JPN)

JPN 101 Beginning Japanese I (4 credits)

Proficiency-based instruction will encourage the development of speaking and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages. This course is reserved for beginning students with no experience with the Japanese language.

Prerequisites: Japan 101 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

JPN 102 Beginning Japanese II (4 credits)

Proficiency-based instruction will encourage the development of speaking and listening comprehension, with some focus on understanding Japanese characters. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice mid level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: JPN 101 or Japan 102 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

JPN 170 Special Topics in Japanese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

JPN 201 Intermediate Japanese I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the novice high/intermediate low level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: JPN 102 or Language Placement with a score of JP201

Attributes: Asian Studies Course, Undergraduate

JPN 202 Intermediate Japanese II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is aimed at developing the intermediate low/mid-level according to ACTFL - American Council on the Teaching of Foreign Languages.

Prerequisites: JPN 201 or Language Placement with a score of JP202

Attributes: Asian Studies Course, Undergraduate

JPN 270 Special Topics in Japanese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

JPN 301 Japanese Conversation (3 credits)

This course is designed to give the student the necessary practice in spoken and written Japanese with special emphasis on the more difficult modern Japanese grammatical constructions and idioms.

Prerequisites: JPN 202 or Language Placement with a score of JP301

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

JPN 302 Japanese Conversat & Compos II (3 credits)

This course is designed to give the student the additional practice in spoken and written Japanese with increased emphasis on the more difficult modern Japanese grammatical constructions and idioms.

Prerequisites: JPN 301 or Language Placement with a score of JP302

Attributes: Asian Studies Course, Undergraduate

JPN 310 Selections in Japanese Lit I (3 credits)

Introduction to Japanese Literature and its history. Selected readings of plays, essays, novels, short stories and poetry. Taught in Japanese.

Prerequisites: JPN 301 or Language Placement with a score of JP310

Attributes: Asian Studies Course, GEP: Art/Literature, Undergraduate

JPN 370 Special Topics in Japanese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

JPN 470 Special Topics in Japanese (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

Latin (LAT)

LAT 101 Beginning Latin I (4 credits)

In an interactive environment, students will learn basic Latin vocabulary, grammar, and syntax, with special attention to English and modern language derivatives. Students will develop reading ability through carefully selected Latin prose and verse texts, and they will discuss aspects of Roman culture illuminated in these texts.

Prerequisites: Latin 101 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, Classical Studies Course, CCC: Non-native Language, Undergraduate

LAT 102 Beginning Latin II (4 credits)

In an interactive environment, students will learn basic Latin vocabulary, grammar, and syntax, with special attention to English and modern language derivatives. Students will develop reading ability through carefully selected Latin prose and verse texts, and they will discuss aspects of Roman culture illuminated in these texts.

Prerequisites: LAT 101 or Latin 102 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, Classical Studies Course, CCC: Non-native Language, Undergraduate

LAT 201 Intermediate Latin I (3 credits)

Students will engage in translation, discussion, and analysis of selected passages from the works of Cicero, Livy, Catullus, Virgil, and Ovid. Each author's particular style and intent will be evaluated by examining his grammar, diction, and use of literary and rhetorical figures. Students will discuss aspects of Roman political and social history that are illuminated in our readings.

Prerequisites: LAT 102 or Language Placement with a score of LA201

Attributes: Classical Studies Course, CCC: Non-native Language, Undergraduate

LAT 493 Independent Research in Latin (3 credits)

Students will study a topic in Latin with a faculty mentor.

Attributes: Undergraduate

LAT 494 Independent Research in Latin (3 credits)

Students will study a topic in Latin with a faculty mentor.

Attributes: Undergraduate

Linguistics (LIN)

LIN 101 Language and Communication (3 credits)

This course is an introduction to the study of human communication and to various areas of linguistic analysis. It focuses on how language works, how it is used in society, how it changes and how it is learned. We also explore some commonly-held beliefs about the nature of language and communication in real-life contexts.

Attributes: American Studies Course, Communication Studies ILC Crs, CCC: Philosophy L1 Non Ethics, CCC: Social Science, GEP: Social Science, Undergraduate

LIN 110 Language Games (3 credits)

This course focuses on the popular and entertaining genre of games generally referred to as "word games" or "language games." We will explore both online and in-person board games played both individually and with opponents including games such as Wordle, Scrabble, Anagrams, Taboo, Scattagories, Upwords, Connections and others. These games will serve as a springboard to analyze language, language characteristics, language use, language variation, language learning and other linguistic topics.

Attributes: CCC: Social Science, Undergraduate

LIN 140 Language Matters (3 credits)

Language Matters is of particular interest and benefit to students pursuing various specialties including, but not limited to, Second/Foreign Language Studies; English; Communication Studies; Speech Therapy; Autism Studies; certain specialties within Education, Sociology and Psychology; and Linguistics. This course is geared toward helping students become consciously aware of the role of language in their daily lives. Students will learn to recognize linguistic features of language(s) and will explore current research findings in language-related fields. They will also be encouraged to be "linguists" themselves in the sense that they will document and analyze language-related issues present in daily communicative interactions.

Attributes: Undergraduate

LIN 150 First Year Seminar (3 credits)

Language Matters is a first-year seminar (FYS). It is of particular interest and benefit to students pursuing various specialties including, but not limited to, Second/Foreign Language Studies; English; Communication Studies; Speech Therapy; Autism Studies; certain specialties within Education, Sociology and Psychology; and Linguistics. This course is geared toward helping students become consciously aware of the role of language in their daily lives. They will learn to recognize linguistic features of language(s) and will explore current research findings in language-related fields. They will also be encouraged to be "linguists" themselves in the sense that they will document and analyze language-related issues present in daily communicative interactions.

Attributes: First-Year Seminar, Undergraduate

LIN 160 Intro Communication Disorders (3 credits)

This course will serve as an introduction to communication disorders, providing students interested in pursuing graduate-level coursework with the foundation necessary to do so. Basic anatomy and physiology of mechanisms that pertain to these systems will be discussed, and relevant neuroanatomy will be covered. We will also examine the professional roles and responsibilities of Speech-Language Pathologists and Audiologists. This course covers prerequisite content required for students planning to pursue higher-level study in the speech and hearing sciences, including speech-language pathology and audiology. This course counts towards the Linguistics Major/Minor.

Attributes: Undergraduate

LIN 170 Topics in Linguistics (3 credits)

The purpose of this course is to explore specific topics within the field of linguistics. Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

LIN 203 English Grammar (3 credits)

To prepare current and future English language teachers, this course focuses on various aspects of English grammar, especially those are particularly challenging for ESL/EFL learners. It provides useful background knowledge for English language teachers and preparation that strengthens applications for teaching positions, fellowships, and scholarships. This course is beneficial to Linguistics and TESOL majors/minors who plan to teach English in any context and at any level as well as to students in ENG, COM, EDU, and other academic areas where a solid grasp on the linguistic structure of English would be useful. This course counts toward an English elective.

Attributes: Undergraduate

LIN 210 Speech and Hearing Sciences (3 credits)

In this course, we will investigate the physiological, acoustical, and perceptual bases of speech and basic audiological science. We will discuss these topics from both theoretical and practical perspectives. As students interested in the field of communication sciences and disorders, you will gain a solid background in speech perception and production as well as understand how speakers process certain sounds in their audiological system. This will require a comprehension of the anatomical and physiological processes we use in our speech and hearing mechanisms. We will also discuss the fields of Speech-Language Pathology (SLP) and Audiology and explore how scientific content applies to the diagnosis and treatment of people with communication disorders. This course is open to all students, assumes no prior knowledge of SLP.

Attributes: Undergraduate

LIN 211 Speech Development & Disorders (3 credits)

This course investigates speech sound development and speech sound disorders (SSDs) by addressing the biological bases of speech sound production, acoustic aspects of speech sound production, the development and progression of speech sound production, linguistic factors that influence communication, and cultural factors that influence speech sound production. Students will gain a solid background in speech development, production, and the different types of SSDs. We will implement applied transcription using IPA symbols, gain an understanding of the anatomy and physiology related to speech sound production, and demonstrate how to treat specific speech disorders. We will also explore how scientific content applies to the diagnosis and treatment of people with SSDs. This course is open to all students, assumes no prior knowledge, and has no prerequisites.

LIN 215 Anat&Phys of Speech&Hearing (3 credits)

This course will serve as an introduction to the anatomy and physiology of speech, hearing, and swallowing mechanisms, including anatomy and physiology of respiration, phonation, resonance, hearing, mastication, deglutition, neuroanatomy, and neurophysiology. This course covers prerequisite content required for students planning to pursue a higher-level degree in communication disorders, including speech-language pathology and/or audiology. Subject matter assumes no prior knowledge of anatomy and physiology. This course is of interest to students pursuing specializations in Linguistics, Autism Studies and Special Education.

Attributes: Undergraduate

LIN 220 Logic (3 credits)

A study of the logic of ordinary language; the function of language, forms of argument, fallacies, definition; analysis of propositions and deductive reasoning, analogy and scientific hypothesis testing. See PHL 220.

Attributes: CCC: Philosophy L1 Non Ethics, Justice Ethics and the Law, Undergraduate

LIN 240 Symbolic Logic (3 credits)

The study of a method for translating arguments from ordinary language into a symbolic notation which reveals logical structure, procedures for establishing the validity or invalidity of deductive arguments so symbolized, and properties of formal deductive systems-independence of axioms, expressive and deductive completeness, and consistency. See PHL 240.

Attributes: Undergraduate

LIN 250 Social Media Discourse (3 credits)

The focus of this course is on understanding and investigating linguistic aspects of electronic social media such as email, texting, Twitter, Facebook, etc. This course has two goals: (1) to analyze everyday social media discourse from a linguistic perspective and (2) to learn how to conduct linguistic research in the context of a student-designed investigation on some type of social media discourse. To that end, we will examine previous research in related areas and students will conduct an original research project based on a selected context of social media discourse. This course will be taught as a seminar in which students are expected to come to class prepared to discuss and/or lead the majority of discussions about course readings. This course is open to students from all academic majors.

Attributes: American Studies Course, Communication Stds Maj Choices, Undergraduate

LIN 260 Language and the Law (3 credits)

This course is an introduction to linguistic issues that influence interaction in a variety of legal contexts. It explores the role of language used in court cases and police investigations while paying special attention to particular discourse contexts such as courtroom talk, interpreter interactions and police interrogations/ interviews. Particular emphasis will be placed on recognizing and understanding ethical issues related to linguistic sources of disadvantage before the law for both educated and uneducated native speakers, minority speakers and non-native speakers of a given language. This course will help prepare students for careers in which a particular sensitivity to, and understanding of, the use of language is vital. By looking closely at areas studied by linguists, we will seek to uncover the role and the ethical nature of oral and written interactions that take place in the legal field. These linguistic issues affect the concept of justice as well as its application in the legal system and also influence how humans are perceived and, in turn, treated by those who apply the law (police officers, lawyers, judges, etc.). It fulfills a requirement in the Sociology and Criminal Justice majors/minors. This course is open to students from all academic majors.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Social Science, GEP: Ethics Intensive, Justice Ethics and the Law, Undergraduate

LIN 261 Psycholinguistics (3 credits)

This course is an introduction to the study of how language is represented in the human mind and what processes are involved in language use, including producing, comprehending, and storing both spoken and written language. Together, we will explore questions such as the following: How do humans store and recognize words? How do we analyze speech? What processes are involved when we speak and read? We will study spontaneously-occurring speech errors and misperceptions and carry out experimental investigations on language production and comprehension. This course is open to students from all academic majors.

Attributes: Undergraduate

LIN 262 First Language Acquisition (3 credits)

Starting before they are even born, most children acquire language with tremendous ease in a very short period of time. It is a remarkable achievement, usually taken for granted unless something goes awry. This course focuses on the acquisition of a first language in infancy and childhood by highlighting issues in various areas of linguistic analysis: sounds, word and sentence meaning, word order and language use in various communicative contexts. We will also focus on different theories that try to account for the cognitive and linguistic processes that together result in first language acquisition as well as atypical language development from which much is learned about the process of first language acquisition. Of benefit and interest to all academic majors, this course is particularly relevant to students in the areas of linguistics, education, autism studies, psychology and health-related areas including speech therapy/speech language pathology.

Attributes: CCC: Social Science, Undergraduate

LIN 270 Topics in Linguistics (3 credits)

This course is an introduction to the study of how language is represented in the human mind and what processes are involved in language use, including producing, comprehending, and storing both spoken and written language. Together, we will explore questions such as the following: How do humans store and recognize words? How do we analyze speech? What processes are involved when we speak and read? We will study spontaneously-occurring speech errors and misperceptions and carry out experimental investigations on language production and comprehension. This course is open to students from all academic majors.

Attributes: Undergraduate

LIN 280 Second Lang Acquis & Lrning (3 credits)

This course focuses on the study of existing approaches to describing second language acquisition and learning. Drawing on current research in the field of linguistics, we will explore various aspects of language (e.g., negation, questions, references to the past) as well as particular factors (e.g., age, motivation, personality, learner beliefs) that affect the acquisition and learning of specific languages. Paying particular attention to English language learning, we will devote significant course time to understanding L2 developmental sequences as they relate to theories of acquisition and learning based on social, psychological and educational frameworks. Students will also be challenged to consider the relationship between their understanding of and experiences with language acquisition and learning as well as the relationship between language learning theories and language teaching. This course will be beneficial to students who are majoring or minoring in Linguistics and/or TESOL or who plan to teach language (English, Spanish, Italian, French, German, etc.) at any level; it will also be of interest to students who are studying a second language and want to understand the adult language learning process more fully.

Attributes: Undergraduate

LIN 301 Teaching Lang at Home/Abroad (3 credits)

Teaching Language at Home and Abroad is an introduction to language teaching and is designed for students interested in teaching a second or foreign language for professional, academic or personal reasons. It will help prepare students to tutor or teach English as a second language (ESL), English as a foreign language (EFL), or other languages such as French, German, Italian, or Spanish in a variety of educational settings at home and abroad. In addition to a career in language teaching, other future opportunities might include teaching positions in community service ESL classes, the Peace Corps, or through grants/fellowships including Fulbrights, among others. In this course, we will explore topics such as language acquisition, teaching methods, materials preparation and assessment. This course is open to students from all academic majors

Attributes: Undergraduate

LIN 317 Sociolinguistics (3 credits)

This course focuses on the use of language within its social context. In this course, we will gain an appreciation for the diversity that exists in human language and for the communicative values inherent in every language variety; scrutinize assumptions about linguistic identity and difference; examine issues of subordination and privilege in our own and others' lives as related to issues of language; explore the relevance of social categories (e.g., class, age, gender, ethnicity, other social groups) as related to language variation; explore how sociolinguistic research informs policy decisions in classrooms and government legislation; and become familiar with data-collection and research methodologies used to investigate specific topics within the field of sociolinguistics. This course counts for a Sociology major/minor. See SOC 317. This course is open to students from all academic majors.

Attributes: CCC: Diversity, Communication Studies ILC Crs, CCC: Social Science, GEP: Diversity Course, GEP: Social Science, Undergraduate

LIN 320 Phonetics (3 credits)

This course explores the repertory of sounds found in human language. As a field of study, phonetics includes three areas: (a) articulatory phonetics (how humans create speech sounds); (b) acoustic phonetics (how sounds are transmitted through the air); and (c) perceptual phonetics (how humans perceive sounds based on changes in air pressure). In this class we will focus primarily on the first area, along with an introduction to the second. To this end we will examine the anatomy of the human vocal tract to understand how speech sounds are created. We will also study the International Phonetic Association (IPA) transcription alphabet, create broad and narrow transcriptions, and practice producing and classifying sounds of various world languages. Time will also be spent on prosodic characteristics of human speech, including pitch, stress, tempo, and loudness. Finally, we will discuss how the study of phonetics is applied within fields such as Speech-Language Pathology (SLP), Teaching English to Speakers of Other Languages (TESOL), or teaching languages (e.g., Mandarin, French, Japanese, etc.). This course is open to student from all academic majors. This course counts for a major elective course toward the Autism Behavior Studies major, the Autism Studies minor, and IHS Area Studies.

Attributes: Undergraduate

LIN 322 Intro to Audiology (3 credits)

This course will serve as an introduction to the modern practice of audiology, and will address the profession and practice through an overview of the anatomy (structure) and physiology (function) of the auditory system, the physical properties of sound relevant to hearing assessment, techniques for hearing assessment, common pathologies of the auditory system, and the impact of hearing loss. This course covers prerequisite content required for students planning to pursue a higher level degree in communication disorders, including speech-language pathology and/or audiology. Subject matter assumes no prior knowledge of audiology.

Attributes: Undergraduate

LIN 325 Tour of the Brain (3 credits)

Speech and language symptoms can be hallmark characteristics of many brain disorders, including stroke, traumatic brain injury, autism and other developmental disorders, and Parkinson's disease. In this course, students will learn about the neural circuits that support speech and language processing and production. Students will also learn how specific speech, language, and swallowing problems reflect underlying neurological conditions across the lifespan. This course is open to students from all majors and has no prerequisite.

Attributes: Undergraduate

LIN 326 Speech and Hearing Sciences (3 credits)

In this course, we will investigate the physiological, acoustical, and perceptual bases of speech and basic audiological science. We will discuss these topics from both theoretical and practical perspectives. As students interested in the field of communication sciences and disorders, you will gain a solid background in speech perception and production as well as understand how speakers process certain sounds in their audiological system. This will require a comprehension of the anatomical and physiological processes we use in our speech and hearing mechanisms. We will also discuss the fields of Speech-Language Pathology (SLP) and Audiology and explore how scientific content applies to the diagnosis and treatment of people with communication disorders. This course is open to all students, assumes no prior knowledge of SLP.

Attributes: Undergraduate

LIN 340 Communication in Soc Contexts (3 credits)

Communication in Social Contexts analyzes how people communicate with each another in various social contexts. We will focus on recent research topics in discourse analysis and explore particular contexts of discourse such as that which takes place in the legal field (police interrogations; naturalization interviews); family interactions (homecoming routines; ventriloquizing); childhood settings (apologies, sporting events), the workplace (medicine, business, media) and the classroom (teacher-student, student-student, teacher-teacher interactions). Special attention will be given to classroom discourse, the area of applied linguistics research that investigates empirical linguistic data from classroom interaction. This course is open to student from all academic majors. This course counts for the American Studies minor.

Attributes: American Studies Course, Communication Studies ILC Crs, GEP: Social Science, Undergraduate

LIN 370 Special Topics in Linguistics (3 credits)

The purpose of this course is to explore specific topics within the field of linguistics. Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

LIN 381 History of the Eng Language (3 credits)

A survey of the outer and inner history of the English language, from its Indo-European origins to its present American and world-wide use. The course will be based on modern linguistic methods and information. See ENG 381.

Attributes: Undergraduate

LIN 401 Bilingualism & Lang Diversity (3 credits)

This course is an exploration of bilingualism and linguistic diversity both within the U.S. and beyond its borders. Bilingualism is examined from both sociolinguistic and psycholinguistic perspectives, as we identify historical, geographical and socio-political issues that shape the identity of bilinguals in the U.S. who come from languages and cultures other than our own. In addition to examining the theoretical and methodological issues in bilingualism research, students will also engage this reality through community observations and interviews with representatives of the bilingual communities. This course is open to students from all academic majors.

Attributes: GEP: Diversity Course, Undergraduate

LIN 420 SLP/AuD Research Methods (3 credits)

In this course, we will learn about conducting clinical research and its application to evidence-based practice and demands for accountability in the fields of speech-language pathology and audiology. The course will include a general orientation to research design and statistical analysis, followed by specific discussions of various types of research methods and conclude with attention to the acquisition of research grants. This course is writing intensive and therefore will review issues such as the development of clear research questions, support of ideas, organization, style and writing conventions.

Attributes: CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

LIN 421 Clinical Methods (3 credits)

This course prepares undergraduate students for clinical practice in speech-language pathology through systematic study of clinical procedures, guidelines, and methods. Students will explore the professional context of speech-language pathology, including ethical principles, legal requirements, service delivery models, cultural competency, and clinical decision-making frameworks. Students will learn the assessment process from managing referrals through conducting evaluations. Additionally, students will study evidence-based intervention procedures, focusing on treatment plan development, goal writing, session planning, clinical communication, and therapy implementation techniques. Throughout the course, students will engage in practical applications, case studies, and guided observations to develop fundamental clinical skills.

Attributes: Undergraduate

LIN 470 Topics in Linguistics (3 credits)

The purpose of this course is to explore specific topics within the field of linguistics. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Attributes: Undergraduate

LIN 474 Language and Thought (3 credits)

Rene Descartes held a view called "mind-body dualism", according to which human persons are fundamentally thinking substances that are somehow causally linked to particular physical substances: bodies. One of his reasons for holding this view was that he believed that the human faculty of language could never, even in principle, be adequately explained by any purely physical description of things. Language, as he saw it, is evidence of mind, and indeed he believed that where language is absent, mind is also absent. Creatures without language are, in Descartes' view, mindless organic automata. Few today would defend Descartes' view in all details, but the general sense that language is an important "mark of the mental" has not gone away. Instead, it has given rise to a cluster of narrower but interesting and important questions: Are certain kinds of mental states impossible without language? Does the specific language that we speak influence our thoughts in some way? Do our innate tendencies of thought force our languages to take certain forms? We could restate these questions in a somewhat different way. Does language hold thought on a leash? Does thought hold language on a leash? See PHL 474.

Attributes: Undergraduate

LIN 475 Language and Meaning (3 credits)

This course examines the core issues in the philosophy of language, including the nature of meaning, problems of reference, and the relation between language and thought. Further issues include the status of propositions, the problem of whether linguistic competence implies innate knowledge of some sort, the nature of metaphor, the private language problem, the indeterminacy of translation and language as symbolic capital. See PHL 475.

Attributes: Undergraduate

LIN 490 TESOL Internship (3 credits)

This course is a practicum in which the student applies their knowledge of Linguistics in a professional work environment. The majority of the work for this course is that performed at the internship site. The student is responsible for securing the internship site and will meet with the professor prior to the semester in which the internship is to take place in order to discuss the course requirements and expectations. During the practicum, the student will reflect upon their experience at the internship site in written assignments and in regular meetings with the professor.

At the end of the semester, the student will submit a final paper or will deliver a final presentation based on their internship experience. This course is intended as an advanced course for Linguistics majors or TESOL minors who have completed the other course requirements.

Attributes: Undergraduate

LIN 491 Linguistics Internship (3 credits)

This course is a practicum in which the student applies his/her knowledge of Linguistics in a professional work environment. The majority of the work for this course is that performed at the internship site. The student is responsible for securing the internship site and will meet with the professor prior to the semester in which the internship is to take place in order to discuss the course requirements and expectations. During the practicum, the student will reflect upon his/her experience at the internship site in written assignments and in regular meetings with the professor. At the end of the semester, the student will submit a final paper or will deliver a final presentation based on his/her internship experience. This course is intended as an advanced course for Linguistics majors/minors who have completed the other course requirements.

Attributes: Undergraduate

LIN 492 Speech Language Pathology (3 credits)

This course is a practicum in which the student applies their knowledge of Speech Language Pathology in a professional work environment. The majority of the work for this course is performed at the internship site. The student is responsible for securing the internship site and will meet with the professor prior to the semester in which the internship is to take place in order to discuss the course requirements and expectations. During the practicum, the student will reflect upon their experience at the internship site in written assignments and in regular meetings with the professor. At the end of the semester, the student will submit a journal and a final project or paper related to the student's internship experience. This course is intended as an advanced course for Linguistics majors with a concentration in Speech Language Pathology who have completed other introductory course requirements.

Prerequisites: LIN 210 or LIN 320

Attributes: Undergraduate

LIN 493 Ind Research in Linguistics (3 credits)

This will allow the student to round out the major/minor with a supervised research project that will help expand the student's interests and development.

Attributes: Undergraduate

LIN 494 Ind Research in Linguistics (3 credits)

This will allow the student to round out the major/minor with a supervised research project that will help expand the student's interests and development.

Attributes: Undergraduate

LIN 496 Special Topics Transfer Course (3 credits)**LIN 497 Special Topics Transfer Course (3 credits)**

Literature in Translation (LTT)

LTT 150 First Year Seminar (3 credits)

First-Year seminar course in Literature in Translation.

Attributes: First-Year Seminar, Undergraduate

LTT 170 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

LTT 270 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

LTT 310 The French Story (3 credits)

A study of representative French short stories from Voltaire to Albert Camus that will emphasize how a good short story functions as a work of art, the various elements of the genre and its French cultural context.

LTT 320 Lit Culture & the Nobel Prize (3 credits)

Every year the Nobel Prize for Literature is awarded in recognition of outstanding literary accomplishment by men and women from all corners of the globe. In this course we will explore the rich, diverse cultures reflected in literature that has been translated into English by examining the work of acclaimed writers who have been awarded the Nobel Prize.

Attributes: Undergraduate

LTT 330 Society in World Literature (3 credits)

This course offers students the opportunity to read and analyze twenty and twenty-first literature from around the globe. Students will explore prose from a variety of regions and develop an understanding of diverse traditions and cultures and the political, social and historical landscape that provides context for this work. Students will examine the literary devices and theoretical frameworks utilized by writers as a form of cultural expression.

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

LTT 342 Women in World Literature (3 credits)

The goal of this course is to explore world culture through literature, focusing on female characters and writers, the treatment of women and their place in society as depicted in novels and short stories. We will explore the rich, diverse history and background that shaped these individuals, their characters and their work. No knowledge of a foreign language is necessary.

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

LTT 350 The European Scene (3 credits)

Selected plays of modern Europe with emphasis on the portrayal of women in dramatic literature. No knowledge of a European language is necessary.

Attributes: Undergraduate

LTT 360 Non-Western Lit in Translation (3 credits)

In this course we read literature from around the world, exploring different cultures and the social, political and artistic landscape that provides background and context for this writing. We will read and review literature by writers from Peru, Morocco, Egypt, the Caribbean and Japan and gain a broad and rich variety of perspectives.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: GEP: Art/Literature, Undergraduate

LTT 361 French-Carib. Lit [in English] (3 credits)

This course will teach students to read and appreciate contemporary Francophone literature of Martinique, Guadeloupe and Haiti, in translation, by familiarizing them with the colonial and post-colonial history of the region, its cultural richness and its literary modes. As background, students will learn about the colonization of Amerindian lands by Europeans, the history of slavery in the Caribbean and the development of Creole dialects and culture. The primary focus of the course will be on recent cultural and intellectual history, particularly the development of two twentieth-century literary movements that have profound social, psychological and political implications, Négritude and Créolité. Students will read entire works or substantive excerpts of works by major authors of the French Caribbean. The course is appropriate for students pursuing minors in Faith-Justice or Africana Studies.

Attributes: GEP Diversity Course, GEP Art/Literature, Undergraduate

LTT 362 Stories from the Middle East (3 credits)

This course offers students the opportunity to explore the rich, diverse culture and literature from the farthest corners of the Middle East. In doing so, students develop an understanding of the social, literary, and historical landscape that provides context for this work. We will read novels, short stories, and excerpts by writers from countries such as Egypt, Morocco, Persia and Turkey.

Attributes: GEP Art/Literature, Undergraduate

LTT 370 Special Topics (3 credits)

Rotating topics in Literature and Translation.

LTT 461 Franco-Afro-Caribbean Story (3 credits)

This course is intended to provide an English-language introduction to the history of the French-speaking Antilles and its complex mix of cultures. It will also allow students to read selected writers from Haiti, Martinique and Guadeloupe (in translation). The fundamental characteristics of the course are: 1) A primary focus on historical events, literary modes and the cultures of the francophone Antilles, including the Atlantic slave trade and its aftermath, race and racism, communal relationships, persistent social injustices and forgotten or silenced histories; 2) paying attention to marginalized voices and modalities, in literature and in historiography; 3) emphasizing the rich cultural traditions and intellectual movements arising from (or resonating in) the French Caribbean, including storytelling and orality, creoles, vaudou, opposition to Duvalierism, négritude, antillanité and créolité; 4) critically viewing the relationships between this region and the francophone world at large. Course content includes historical and theoretical readings that will focus on the exercise of power and on persistent forms of injustice and resistance. The course is appropriate for students pursuing minors in Faith-Justice or Africana Studies.

Prerequisites: ENG 101

Attributes: Africana Studies Course, GEP Diversity Course, GEP Ethics Intensive, GEP Art/Literature, Undergraduate, GEP Writing Intensive

LTT 470 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

Management (MGT)

MGT 110 Essentials of Organizational Beh (3 credits)

This course surveys the basic principles, concepts, and theories concerning organizations and groups and individuals within those organizations. The concepts and theories in this course concern individual behavior (e.g., perceptions, attitudes, and motivation), group and interpersonal processes (e.g., leadership, power, and conflict), and essential organizational theories. Students CAN take either MGT 110 or MGT 120 or MGT 121 to satisfy the HSB core Management requirement. Students who take MGT 110 cannot take MGT 120 or MGT 121 for credit.

Attributes: Undergraduate

MGT 120 Essentials of Management (3 credits)

This course surveys the basic principles, concepts, and theories concerning organizations and groups and individuals within those organizations. The concepts and theories in this course include the organizational environment, management functions (planning, organizing, leading, and controlling), and essential individual and interpersonal theories. Students CAN take either MGT 110 or MGT 120 or MGT 121 to satisfy the HSB core Management requirement. Students who take MGT 120 cannot take MGT 110 or MGT 121 for credit.

Attributes: Undergraduate

MGT 121 Organizations in Perspc Honors (3 credits)

This course explores the nature of the firm and the development of the employer-employee relationship in work organizations since the turn of the 20th century in the U.S. We will investigate and integrate the perspectives of various stakeholders (e.g., government, unions, community) as they relate to the manager-employee relationship, and demonstrate the effects of these stakeholders on individual and organizational well-being. University Honors students only. Students who take MGT 121 cannot take MGT 110 or MGT 120 for credit.

Restrictions: Enrollment limited to students with the Honors Program Student attribute.

Attributes: Honors Course, Undergraduate

MGT 140 Navigating the Road Ahead (3 credits)

This course focuses on positioning students for academic, career and personal excellence within the context of fostering an understanding of the adult student's role in the learning/teaching process at Saint Joseph's University. Its purpose is to enhance learning skills such as understanding material as it applies to oneself and others, applying concepts and ideas to real issues, thinking critically, analyzing text and ideas, and assessing progress. A key strength of this course is that it gives students the freedom to select and apply their own interests and academic pursuits to all of the assignments, thus making the course meaningful as well as interesting and valuable from both skill-building and content perspectives.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Adult Learning Seminar

MGT 200 Intro to Project Management (3 credits)

Project Management is the application of knowledge and techniques to project activities in order to meet stakeholder needs. A project is an endeavor having a definite beginning and a definite end, undertaken to create a unique product or service. Key elements of Project Management will be introduced in this course: scope, schedule, budget, quality, human resources, communications, risk, and procurement. Through lectures, exercises and case studies, we will see how these elements fit into a project management plan, as well as how the plan is executed and controlled. Guidelines presented will be consistent with The Project Management Body of Knowledge (PMBOK) and be a step towards a possible Project Management Professional (PMP) certification.

MGT 210 Business Stakeholders & Ethics (3 credits)

This course analyzes the question, "Does business have a social responsibility?" through the examination of various internal and external stakeholders of the contemporary business organization. Students will be introduced to frameworks and theoretical principles in ethics that may be used as foundations to the analysis of the question above. Students then will learn how stakeholder management relates to an organization's triple bottom line of people, planet, and profits. The course includes theoretical concepts and practical analysis, exposing students to some of the ethical dilemmas confronted by employees in the workplace, and serves to help students enhance their skills in resolving these types of dilemmas. CAS Students may take with Permission of Chair.

Prerequisites: (MGT 110 or MGT 120 or MGT 121)

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate

MGT 211 Perspectives on Leadership (3 credits)

This course aims to increase students' knowledge and skills concerning effective leadership. Through a seminar format we will employ a historical perspective to investigate different approaches, models and contexts to leadership. We will then explore the contemporary role of leadership in work organizations. Through workshops, we will develop skill competencies critical to effective leadership. Students will have an opportunity to apply their knowledge and skills to a leadership experience they design and implement themselves. CAS Students may take with permission of Chair.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Attributes: Undergraduate

MGT 212 Organizational Sustainability (3 credits)

This course is an introduction to Organizational Sustainability in its broader sense and is primarily designed for the Leadership, Ethics, and Organizational Sustainability major and minor and those students interested in this area. For the organization, sustainability means the capacity to survive (to sustain itself) while contributing to the survival (the sustenance) of the various environments in which it finds itself, be these social, biological, economic, ecological, or other. The course offers a framework for understanding sustainability and introduces the concept of the triple-bottom line whereby corporate social responsibility and environmental protection are necessary conditions for business success in addition to profitability. It is not enough to fulfill only one or two of these three necessary conditions: organizations should be structured so all three are mutually reinforcing. The main objective of the course is to provide students with a broad context enabling them to develop the capacity for critical thinking and the skills necessary to understand the importance of sustainability. CAS students may take with permission of Chair.

Prerequisites: (MGT 110 or MGT 120 or MGT 121)

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Faith Justice Course, GEP: Globalization Course, Undergraduate

MGT 220 Intro Human Resource Management (3 credits)

A survey of the functional areas of human resource management including: planning, staffing, training, compensation, performance appraisal, and labor relations. This course explores the growing importance of human resource management, emerging topics in the field, and techniques for effective management of human resources.

Attributes: Undergraduate

MGT 221 Diversity in the Workplace (3 credits)

This course will increase students' awareness of workforce diversity as both a challenge and opportunity for contemporary managers. Topics to be covered include demographic trends in the U.S., various models for understanding the importance of managing diversity, the differences between affirmative action and managing diversity, identity issues, real cultural differences vs. stereotyping, individual responses to diversity, organizational strategies for managing diversity and promoting positive organizational change, challenges inherent in managing diversity, and potential outcomes of successful diversity management.

Attributes: CCC: Diversity, GEP: Diversity Course, Faith Justice Course, Undergraduate

MGT 222 Influence, Negotiation & Conflict (3 credits)

This course focuses on developing students' interpersonal and communication skills in order to increase influence, negotiation, and conflict resolution abilities in a fair and principled fashion. Students should obtain a theoretical understanding of influence and negotiation, and improve their ability to engage in negotiations and address conflict in an effective and ethical manner in a wide range of situations. CAS students may take with permission of the Chair.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Attributes: Justice Ethics and the Law , Undergraduate

MGT 230 Intro: Entrepreneur/New Venture (3 credits)

This course explores the fundamental processes of entrepreneurship and new venture creation including: the development of innovative thinking, opportunity recognition, venture exploration which would ultimately lead to a new venture, and the skills that are necessary for successfully building a new venture team that possesses the appropriate attributes. The primary purpose of the course is to develop an innovative perspective, as well as an understanding of the integration of people in the entrepreneurial process. CAS Students may take this class with Permission of the Chair.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Attributes: Undergraduate

MGT 231 Family Business (3 credits)

This course explores the unique interpersonal and business issues associated with a family-owned and managed firm. Thus, the course is designed for those students who will be entering or establishing a family-owned business. The course will focus upon: the competitive strengths and weaknesses of a family firm; the dynamics of family interactions and the family business culture; conflict resolutions; estate planning; and planning for succession. The primary purpose of the course is to provide the tools and techniques that will provide an entrepreneur with the greatest opportunity for success within a family business framework.

Attributes: Undergraduate

MGT 260 Legal & Ethical Issues in Supply Chain (3 credits)

The primary objective of this course is to give the student an overall understanding of the legal and ethical issues in supply chain management (assessed via cases and tests). The course is designed to provide a background on the legal and ethical issues affecting the supply chain management function within businesses and government and delve deeply into those issues throughout the course (assessed via Discussion posts, cases and tests). In so doing, the course will identify key legal and ethical issues in the supply chain management profession with an emphasis on navigating those legal and ethical issues in the performance of supply chain management duties.

Attributes: Undergraduate

MGT 310 Breaking News in Bus. Ethics (3 credits)

Everyday business ethics uses real-time reporting of current events by credible media as the vehicle to help students connect the language of moral reasoning and business ethics to emerging ethical issues in the world of business, organizations, and leadership. The course will review the major theoretical basis for moral reasoning, e.g., deontological ethics, utilitarian ethics, and ethical relativism. A discussion of source credibility will also precede the second (main) portion of the course. Students will keep abreast of current events via daily reading of various media outlets. Students will be expected to (a) identify ethical issues, controversial decisions, and unethical conduct reported by journalists; (b) analyze the stakeholders and ethical issues identified in news reporting, and (c) identify potential resolutions or recommendations for action that might be taken by individuals involved in the decisions. The course will culminate in a research paper by each member of the class on a current business ethics issue of interest. CAS students may take with permission of Chair.

Prerequisites: ENG 101

Attributes: GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate, GEP: Writing Intensive

MGT 311 Leading Teams (3 credits)

This course aims to increase students' understanding and skills required for effective team leadership. Through participating in experiential exercises, simulation, and team projects the course arms the students with an opportunity to develop skills and apply course material in building productive and happy teams. As leading teams involves learning about oneself, and understanding others, we will explore both in detail. Peculiarities of managing and leading diverse and virtual teams will also be addressed. The overarching course objective is to lead the students from identifying relevant group and leadership theories to integrating them into their team work.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Attributes: Undergraduate

MGT 320 Career Management (3 credits)

This course provides students with the knowledge and skills to understand and manage careers in organizations. Students will learn to help others manage their careers while also learning how to manage their own careers. Topics will include, but will not be limited to motivation theory, professional skill-development, career ladders, career coaching, labor market/occupational trends, market research, job search techniques, resume writing, interviewing skills, negotiating, and networking. CAS students may take with permission of Chair.

Prerequisites: MGT 110 or MGT 120 or MGT 121

Attributes: Undergraduate

MGT 321 International Talent Mgt (3 credits)

The purpose of this course is to develop knowledge for managing a global workforce, and to prepare students to encounter international business from an interpersonal standpoint. While expertise in international human capital and talent management is an important pathway to competitive advantage for organizations, the goal of this course is also to develop thoughtful managers and workers who will be cognizant of the challenges of an international career, and respectful of cross-cultural differences. CAS students may take with permission of Chair.

Attributes: GEP: Globalization Course, Undergraduate

MGT 322 Decision Making w/ Analytics (3 credits)

This course introduces students to the metrics that are essential to the strategic management of human capital. Human capital leaders help drive business performance by delivering competitive advantage through people. Performance relies on measures, so future leaders need to be adept at planning and interpreting those measures. The emphasis of this course will be on logical and strategic decision making through planning which measures to use, and using the resulting analytics to facilitate effective talent acquisition and retention, maximize the productivity and effectiveness of organizational human capital, and allocate limited resources effectively.

Prerequisites: MHC 220 or MGT 220

Attributes: Undergraduate

MGT 330 Social Enterprise & Soc Change (3 credits)

This course introduces students to the concepts of social enterprising as a means to promote social change. The course begins with a look at the ethical foundations inherent in the initiation of social change, namely moral rights and the justice perspectives on moral reasoning. The course then turns to an exploration into how social enterprising can be used as a vehicle to address injustice and promote social change. Topics in this section include recognizing opportunities for social change, planning and organizing the social venture, funding and scaling the social enterprise, and measuring social impact. Students will have the opportunity to interact with management of a social venture and apply the skills learned. CAS Students may take this class with Permission of the Chair.

Prerequisites: (MGT 110 or MGT 120 or MGT 121)

Attributes: GEP: Ethics Intensive, Undergraduate

MGT 360 Legal Environment of Business (3 credits)

This course introduces students to the study of law, particularly as it affects business organizations. Comprehensive in scope, it covers the court system and the judicial process, as well as areas of substantive law including torts, contracts, constitutional, administrative, employment, agency and international law. Various forms of business organizations are examined, and the interplay between law and ethics is addressed throughout.

Attributes: Justice Ethics and the Law , Undergraduate

MGT 361 Introduction to Law Honors (3 credits)

This course is an introduction to the legal system and some of the areas of the law that have a significant impact on our lives are presented. The structure of the legal system and how it operates is described. Areas of torts, contract, criminal, constitutional, family, employment and others are examined. Current legal issues will receive particular attention. A Moot Court exercise is included. This course is highly recommended for students who plan to attend law school. Satisfies MGT 360 for Business Majors.

Restrictions: Enrollment limited to students with the Honors Program Student attribute.

Attributes: Honors Course, Justice Ethics and the Law , Undergraduate

MGT 362 Topics in Business Law (3 credits)

This course builds upon the students' knowledge of law attained in the MGT 360 Legal Environment of Business I course. Areas of study will include business organizations, employment law, intellectual property, environmental law, consumer law, and insurance coverage and liabilities. Highly recommended for students desiring to attend law school.

Prerequisites: MGT 360 or MGT 361

Attributes: Justice Ethics and the Law , Undergraduate

MGT 363 International Business Law (3 credits)

The purpose of this course is to acquaint the student with the international legal environment in which businesses operate. It will introduce the students to international business, international law and organizations, and how international disputes are resolved. International sales, credits, commercial transactions will also be covered, as well as international and U.S. trade law.

Attributes: GEP: Globalization Course, Justice Ethics and the Law , Undergraduate

MGT 364 Bus Law-Entrepreneurial Firms (3 credits)

This course surveys and analyzes the legal issues faced by new entrepreneurs and entrepreneurial firms. The course covers issues facing the entrepreneur including: leaving your current employer, structuring the ownership of the new company, and obtaining appropriate legal, accounting and insurance advice. A number of issues facing entrepreneurial firms are covered, including: liabilities and insurance, raising capital, contracts and leases, licensing, intellectual property, human resource matters, e-commerce and the sale of goods and services, outsourcing, global entrepreneurship, changing between private and public ownership, and other relevant topics.

Attributes: Justice Ethics and the Law , Undergraduate

MGT 365 Employment and Labor Law (3 credits)

The purpose of this course is to acquaint the student with the legal aspects of human resource management. It will describe the sources of employment law and how those laws govern the hiring, promotion, evaluation and termination of employees, as well as the terms and conditions of employment in 21st century America. Attention will be given to current legal and ethical issues, including the challenges of managing an increasingly diverse workforce.

Attributes: Undergraduate

MGT 370 Special Topics I (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MGT 398 Neurodiversity at Work Interns (3 credits)

The purpose of this internship is to provide the student with an opportunity to utilize the managing neurodiversity knowledge and skills acquired in previous coursework in a "real world" setting under the tutelage of the course instructor and/or workplace supervisors. The student will provide peer support and job coaching, and will play an active role in managing the performance, integration, and experience of an individual on the autism spectrum in the workplace. The student will interact with the administration and staff at the internship site to accomplish these goals and associated tasks, as assigned by the internship coordinator.

Prerequisites: ABA 100 and (MHC 220 or MGT 220)

Attributes: Undergraduate

MGT 415 Applied Ldrshp & Sustain Capst (3 credits)

This course is an integrative course in which students (either individually or in teams) undertake an action- learning project in an organization under the direction of a faculty member with the objective of applying leadership and sustainability concepts developed throughout the program. Students will work with live clients (e.g., non-profit organizations or for-profit businesses) to help them improve their triple bottom-line performance along the people, planet, and profits dimensions and test their leadership skills as they do so. Senior standing.

Prerequisites: (LEO 210 or MGT 210) and (LEO 211 or MGT 211) and (LEO 212 or MGT 212) and (MGT 110 or MGT 120 or MGT 121)

Attributes: Undergraduate

MGT 425 Managing HR: Resrch/Appl (3 credits)

This course focuses on critical thinking skills, research skills, and applied human capital issues. Students will learn and work on HR metrics (assessing, measuring, and valuing employee behaviors and attitudes). Substantive topics will be of interest to both people-oriented future managers and those who aspire to a career in human resources. This offering focuses on critical thinking, research and metrics relating to motivation (the OB side) and compensation (the HR side). There will also be a strong emphasis on the strategic importance of human capital in all organizations. Senior standing.

Prerequisites: (MHC 220 or MGT 220) and (MHC 221 or MGT 221) and (MGT 110 or MGT 120 or MGT 121)

Attributes: Undergraduate

MGT 435 Family Bus &Entrepreen Capstone (3 credits)

This is a capstone course that integrates the various concepts of the core Family Business and Entrepreneurship courses to develop a comprehensive business plan to either create a new venture or to grow an existing family business. Students are responsible for assessing opportunities, collecting and interpreting relevant data to exploit the identified opportunity, and to craft a plan that supports the market need, identifies the target market, and is financially viable.

Prerequisites: (ACC 101 and ACC 102) and (FBE 230 or MGT 230) and (FBE 231 or MGT 231) and (FBE 360 (may be taken concurrently) or MGT 364 (may be taken concurrently)) and FIN 200 and MKT 201 and (MGT 110 or MGT 120 or MGT 121)

Attributes: Undergraduate

MGT 470 Special Topics II (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MGT 471 Practicum in Management (1 credit)

This course is meant for students with opportunities working over the course of the semester/summer whose employers require a credit as condition of employment. To apply, the student submits a letter to the chair explaining why the practical training is required and includes a letter from the employer. The student submits to the department chair an 8-10 page paper at the end of the practical training describing their work responsibilities and what skills s/he acquired by participating. Does not satisfy any major, minor, general education or elective requirement. Grade is Pass/Fail. May be repeated once. Permission of Chair required.

Attributes: Undergraduate

MGT 490 Internship I (3 credits)

An approved internship in management.

Attributes: Undergraduate

MGT 491 Internship II (3 credits)

An approved internship in management.

Attributes: Undergraduate

MGT 493 Research I (3 credits)

This course is designed to accommodate those students who have an interest in a research-worthy topic that can be examined on an independent research basis. The student will work closely with a professor on a research area that will require the identification of a topic, a literature review, appropriate methodology, and analysis. Chair approval required.

Attributes: Undergraduate

MGT 494 Research II (3 credits)

This course is designed to accommodate those students who have an interest in a research-worthy topic that can be examined on an independent research basis. The student will work closely with a professor on a research area that will require the identification of a topic, a literature review, appropriate methodology, and analysis. Chair approval required.

Attributes: Undergraduate

MGT 496 Management Honors Capstone (3 credits)

This course is the second semester of the senior year Honors strategy capstone experience. The learning objectives of this course include leveraging the case method of investigation to evaluate strategic management concepts and theories, finding solutions to complex, real-world business problems, and enhancing critical thinking skills by engaging in real-time debate and by engaging in detailed case study research.

Prerequisites: BUS 495

Restrictions: Enrollment limited to students with a class of Senior.

Attributes: Honors Course, Undergraduate

MGT 499 Business Strategy Simulation (3 credits)

This course can be substituted for BUS 495. This is the capstone course for the undergraduate curriculum in the Haub Degree Completion Program. It is designed to integrate previous learning across business disciplines. The course will focus on applying knowledge in a dynamic global setting. It utilizes a strategy simulation software-based game within which teams create virtual firms and compete in a simulated industry.

Prerequisites: ACC 101 and ACC 102 and ECN 101 and FIN 200 and MKT 201 and (MGT 110 or MGT 120 or MGT 121)

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

MGT 509 Curricular Practical Training (1 credit)**MGT 550 Leadership and Ethics (3 credits)**

This course focuses on the responsibilities of effective, ethical leaders to others, their organizations, their communities, and the natural environment in which their organization operates. Focusing on leadership at the intrapersonal, interpersonal, organizational, and societal levels, this course equips students with the skills and knowledge to address contemporary management and leadership issues in a critical and sustainable manner. Topics include ethical frameworks, stakeholders, individual value systems, decision-making, power, leadership, motivation, and organizational culture. This course exposes students to types of ethical issues that arise in the workplace and serves to enhance students' skills in addressing those issues.

Prerequisites: HSB Foundation with a score of MG500

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 552 Stakeholder Theory & Soc Resp (3 credits)

This course addresses corporate social responsibility through a stakeholder theory of business. The course will center on the question, "Which interests of which stakeholders impose obligations on business?" The internal and external stakeholders addressed include investors, employees, customers, and the natural environment, among others. Some issues will be analyzed by exploring international differences in the treatment of stakeholders. The course exposes students to some of the ethical dilemmas confronted by employees in the workplace, and serves to enhance student skills in resolving these dilemmas.

Restrictions: Students cannot enroll who have a major in Executive MBA Program (1-year), Executive MBA Program, Food Marketing or Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 554 Ethical Practices in Business (3 credits)

This online course will consider the ethical responsibilities of managers and corporations. It is designed to raise ethical consciousness and sensitivity to the ethical dimensions of business decisions, on an individual, institution and systematic level. It will be highly interactive, introducing the student to factors which incentivize ethical and unethical behavior, and to dilemmas which arise in business. It will provide plausible decision procedures and frameworks for dealing with ethical matters and methods for rationally adjudicating ethical disputes. It is also designed to reveal common patterns of success and failure in managing ethical conflicts. It will attempt to engage students in a critical evaluation of managerial and corporate ethics and encourage each student to develop a justifiable perspective on the role of ethics in business and their responsibility to various stakeholders.

Prerequisites: MHC 667 or MGT 556

Restrictions: Enrollment is limited to Graduate level students.

MGT 555 Equity in Organizations (3 credits)

Ensuring equity in organizations is becoming increasingly important as the population and workforce become even more heterogeneous. More importantly, it is a moral imperative. This course is designed to help students become aware of the multiple dimensions of diversity such as race, class, gender, gender identity, physical ability, sexual orientation, age, and nationality, and how they intersect. In order to identify and understand the role of organizations in advancing equity, students will first need to deepen their understanding of how organizations have historically impeded equity. Then students will consider possible solutions to advancing diversity, equity, and inclusion in contemporary workplaces.

Restrictions: Enrollment is limited to Graduate level students.

MGT 556 Human Resource Fundamentals (3 credits)

This course will provide the student with the fundamental knowledge essential to all practicing HR professionals. Critical HR functions will be explored in depth to provide a solid understanding of the many issues confronting the HR professional. Topic areas will include (but not be limited to) Strategic Management, Workforce Planning and Employment, Human Resource Development, Total Rewards, Employee and Labor Relations, and Risk Management. In all topic areas, the legal impact of human resources decision making will be considered. This course is appropriate for early HR careerists, those interested in entering the HR field, and students interested in how HR practices further organizational performance.

Restrictions: Enrollment is limited to Graduate level students.

MGT 561 HR & People Research, Meas&Met (3 credits)

This course is designed to introduce students to the processes involved in measuring the effectiveness of human resource programs and OD interventions through the scientific method. Students will learn the fundamentals of applied research, from developing questions and deciding on a research design to measurement and analysis. The course will provide a thorough grounding in survey methodology, and will focus on evaluating HR & People ideas through a critical thinking framework. Students will be required to propose a research study during which they will act as project managers/lead researchers responsible for envisioning, executing, analyzing, interpreting, and reporting the results of the study to an external client. The overarching goal of the course is to prepare professionals to effectively evaluate research conducted by others and to plan/initiate their own research.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 562 Employment and Labor Law (3 credits)

This course will provide an overview of the major laws that govern employer/employee relations in both union and non-union workplaces. Labor topics include, inter alia, the historical development of labor law, union organizing, unfair labor practices, concerted activities by unions and dispute settlement. Employment law topics include, inter alia, employment discrimination, testing, evaluation and privacy, and laws that govern wage and salary, health and safety, income security, benefits continuation, and family and medical emergencies.

Prerequisites: MHC 667 or MGT 556

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 563 Human Resource Technology (3 credits)

The course examines how technology has enabled and transformed the modern human resource function within large enterprises. A variety of HR applications will be covered including Employee and Manager Self Service, Talent Acquisition, Performance Management, e-Learning, Compensation Planning and HR Analytics. The processes required to justify, select, deliver and support HR technology solutions will be analyzed. Finally, special topics such as HR data privacy, HR Shared Service Centers, HR Outsourcing and the evolution and future of HR Technology will be covered.

Prerequisites: MHC 667 or MGT 556

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 564 Fin & Acc for Managers (3 credits)

This course develops students' practical skills in the interpretation and use of financial and accounting information for managerial decision-making. Students will learn how to (1) understand and analyze financial statements, (2) evaluate relevant costs for decision-making, (3) perform present value analyses, and (4) make sound capital budget decisions.

Prerequisites: MHC 667 or MGT 556

Restrictions: Enrollment limited to students in the MSHRM program. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 565 Leading Change in Organ (3 credits)

This course focuses on the knowledge and skills necessary for leading, planning, and implementing organizational change. Students will examine their own leadership skills and abilities, and will have the opportunity to develop skills critical to achieving effective change, including communication, leadership, and team development.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 575 Teams & INC (2 credits)

This course explores and challenges the use of influence, effective negotiation, conflict resolution, and decision-making in organizational settings. Focus is on basic principles, concepts, and theories. The course goal is for students to obtain a theoretical understanding of influence, negotiation, and improve their ability to engage a wide range of situations. Moreover, the course is highly interactive, involves a series of negotiation, and conflict resolution exercises. These exercises are framed, and analyzed in terms of readings, and in-class discussions.

Restrictions: Enrollment is limited to students with a major in Executive MBA Program (1-year) or Executive MBA Program. Enrollment limited to students in the MBAEX program. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 585 Support Neurodiv Workplace (3 credits)

Over the next decade and beyond, hundreds of thousands of neurodivergent individuals on the autism spectrum will be entering the workplace. Is the workplace and are managers ready for them? While experts in Education have made great advances in creating inclusive education spaces and supportive learning environments for neurodiverse individuals, 21st century managers have only recently acknowledged the presence and value of this community in our workplaces. This course will explore ways that neurotypical workplaces and leaders can create inclusive environments to support members of neurominorities, not only for individuals on the autism spectrum, but also for individuals with ADHD, Dyslexia, and other forms of neurodiversity.

Restrictions: Enrollment is limited to Graduate level students.

MGT 595 Managing Well-Being (3 credits)

This course focuses on leadership and management issues within the area of scholar athlete well-being, and will provide students in the course with skills to manage complicated well-being issues. Students will learn about interacting with stakeholders from various professions such as athletic training, strength and conditioning, sports nutrition, sport psychology, and team physicians. Students will also learn about the NCAA Sports Science Institute and its impact on sport teams, sport coaches, athletes, staff, and athletic departments. Course outcomes include learning how to best support athletes on and off the field; manage conversations with multiple stakeholders; handle sensitive health information; utilize sport technology in an ethical manner; and build a culture of empathy, sympathy, and perspective when various well-being scenarios arise within a sports team. Each student will partake in independent research and review of governing body policies, procedures, and best practices outside of weekly sessions.

Restrictions: Enrollment is limited to Graduate level students.

MGT 600 Adult Learning (3 credits)

Course introduces students to adult education theory that focuses on how adults learn, application of adult education theory, skills required in the delivery of adult learning programs and an introduction to group process. Students have an opportunity to develop a professional learning theory and model. Students also discover their learning style and how style impacts their ability to use their theory and model. Use of feedback as a tool for learning allows students to realize how to improve their facilitation approach.

Restrictions: Enrollment is limited to Graduate level students.

MGT 602 Organizational Culture (3 credits)

Understanding an organization's culture is essential to successful change efforts. Students will learn to understand organizational culture, systems thinking, and the impact of culture on change. Students will also learn about initiatives intended to change an organization's culture.

Restrictions: Enrollment is limited to Graduate level students.

MGT 605 Consulting Skills (3 credits)

This course focuses on the development of consulting skills and proficiency in the range of skills necessary to be an effective consultant and agent of positive change. The consulting process provides a framework to guide engagements by both internal and external consultants. Topics covered include contracting, data collection, diagnosis, feedback, resistance, action planning, and managing commitment and accountability.

Restrictions: Enrollment is limited to Graduate level students.

MGT 610 Social Identity Theories (3 credits)

This course will introduce models and theories of social identity and the experience of belonging on the individual, organizational and group level of systems. Students will focus on the importance of identity theory in DEI work, assess the complexity of difference and belonging in workplace and experiment with the competency of self as change agent.

Restrictions: Enrollment is limited to Graduate level students.

MGT 615 Learning Design (3 credits)

Major steps in creating and designing adult education learning programs are discussed. Students develop a program that demonstrates their understanding of the key components of instructional design. Specific topics include collaborative relationships with customers/management, needs assessment, analyzing data, writing learning objectives, cost effectiveness of programs, selecting and sequencing content, developing learning materials and constructing evaluative instruments.

Restrictions: Enrollment is limited to Graduate level students.

MGT 620 Psychological Assessments (3 credits)

The psychological theories and practices underlying a wide variety of instruments used in assessing individual and group behavior in organizations will be examined. Issues and topics will include employee selection, performance, ability, attitude and development. Participants learn how to critically evaluate measures to answer organizational issues.

Restrictions: Enrollment is limited to Graduate level students.

MGT 625 Executive Coaching (3 credits)

Executive Coaching has become a staple within many organizations. Executive Coaching is essentially a purposeful, relational intervention based in psychosocial concepts that leads to new and more complex level of functioning in one party. This course primarily assists the student in further development of their coaching skills and models while also examining coaching models, underlying constructs, skills and relevant coaching research.

Restrictions: Enrollment is limited to Graduate level students.

MGT 630 Leadership & Team Development (3 credits)

This course focuses on theories and practices required in leading and developing teams. Issues of leadership behavior, interpersonal relations, group roles and stages of development are examined in an experiential laboratory.

Restrictions: Enrollment is limited to Graduate level students.

MGT 635 Positive Psychology (3 credits)

This course will provide you with a grounding in the theories and applications of positive organizational psychology. The core premise of this course is that leadership and personal scholarship excellence are fundamentally tied to creating/enabling organizational contexts that build human strengths as well as unlock the positive and generative dynamics of vibrant human communities. This course will help you to create, foster, and develop organizations where people learn to thrive and perform at their best.

Restrictions: Enrollment is limited to Graduate level students.

MGT 645 Mindful & Ignatian Leadership (3 credits)

Mindful and Ignatian Leadership explores the complex multidimensional nature of leadership effectiveness through the lens of mindfulness at work strategies and Ignatian discernment principles. Using premier assessment instruments, this course will awaken your potential as an aware, thoughtful and effective leader. Students will deepen their understanding of mindful and Ignatian leadership theories and practices and develop skills to increase leadership effectiveness. Students will learn through integrating their own experiences with readings, lectures, small group interactions, and guided mindfulness practices.

Restrictions: Enrollment is limited to Graduate level students.

MGT 646 Career Dev Theory & Practice (3 credits)

This course provides students with an experiential understanding of the process of career development. Through a primarily experiential approach, where students craft their own career vision, students have an opportunity to engage key concepts in the field of career development. In addition, topics such as assessment, gender, choice, interventions and career management are experienced and discussed.

Restrictions: Enrollment is limited to Graduate level students.

MGT 647 Appreciative Inquiry (3 credits)

This course focuses on Appreciative Inquiry (AI), a method and theory for rethinking organizational change. Instead of deficit-based and problem-oriented approaches to change, AI focuses on positive organizational change, starting with what works best within an organization as the basis of initiating stakeholders' desired future for the organization. This course will cover the theory and practice of positive organization change through Appreciative Inquiry.

Restrictions: Enrollment is limited to Graduate level students.

MGT 648 Conflict & Negotiation (3 credits)

Whether conflict is healthy or unhealthy for an organization is a function of an individual's ability to surface, work with, and resolve differences that inevitably arise in organization life between individuals and within and between groups and departments. This course examines the psychological and social dynamics which are connected to conflict, including power, leadership, personal needs, roles, communication. It also provides practical tools and skills development for dealing with conflict in a range of organizational settings.

Restrictions: Enrollment is limited to Graduate level students.

MGT 650 Organizational Leadership (3 credits)

This course provides a foundation for leadership competencies and characteristics necessary for guiding organizations. Students will use self-awareness tools and will deepen their understanding of leadership research, theories and practices. Students will also explore the organizational contexts where work, management, and leadership happen. Furthermore, students will examine the responsibility that comes with leadership through readings, lectures, small group interactions, and a self-development process.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 651 Leading for Career Success (3 credits)

This course examines the basics of career development and how it fits into the organizational structure. It includes theory and practice of career/adult development, its delivery systems, and its target populations.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 653 Lead in Modern Organization (3 credits)

This course will explore what it means to provide leadership to others in modern organizations. Topics will include enhancing one's leadership capability, crisis periods of leadership, conflicts between the organization's leadership and one's personal leadership, and strategies for success in leadership positions. Additional themes of power, authority, and control will be examined in terms of the organization and the individual.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 654 Leading Global & Virtual Teams (3 credits)

This course surveys the basic principles, concepts, and theories concerning group dynamics and team leadership. Leading modern teams involves not only managing different personalities, but also different cultures, and, frequently, doing so from a distance. In the course, the student will enhance learning in how to be an effective team member and a leader of global and virtual teams. Through participating in experiential exercises, simulations, and team projects the course provides the student with an opportunity to develop skills in managing highly diverse groups and building effective and efficient teams in a global and virtual world.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 655 Org Culture Beyond Diversity (3 credits)

While the concept of diversity and inclusion has been idealized as the way to achieve equity in organizations, the reality is that public and private corporations have fallen woefully short of achieving that goal. Whereas changing "hearts and minds" may have been how we previously framed how we thought to achieve equality, today's efforts require a committed approach to assessing organizational structure, policies, and practices that drive concrete and sustainable actions. Students will have the opportunity to consider individual implicit bias and unconscious prejudice, and then move their assessment from personal ideology to organizational policies and practices that serve to reinforce structural oppression and disparate treatment of non-white, cis-gendered employees. Students will reflect on the current state of diversity, equity, and belonging in public and private organizational settings. Through self-reflection, dialogue, and an organizational assessment project, students will develop a critical analysis of their own leadership practices and roles in their workplace.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 656 Nonprofit Leadership (3 credits)

This course focuses on the best practices of creating and leading effective nonprofit organizations. Topics include board governance and accountability, motivation, resource management, decision making, communication, and executive leadership in the nonprofit context. Through discussions, lectures, case studies, experiential activities, and personal reflection, students will acquire a set of tools and strategies that will allow them to enhance stakeholder engagement, individual and organizational performance, and collective impact. Using local and global examples, and their own projects, they will explore how nonprofit leaders collaborate with key stakeholders to understand the environment, identify opportunities, and co-develop new ideas. Students will learn how to define and achieve intended impact and find sustainable solutions to social problems.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 657 Leading Projects (3 credits)

The Leading Projects course explores what it means to bear prime leadership responsibility in the role of project manager. Project Management is the application of knowledge and techniques to project activities in order to meet stakeholder needs by creating a unique product or service. This course should not only help you learn valuable conceptual material, but it should also enhance your effectiveness across many organizations in which projects are planned and executed. Skills acquired by the student are critically important in a business or non-profit environment. Through lectures, exercises and case studies, the student will see how a project management plan is developed, executed and controlled. Application to a real project will follow. Guidelines presented will be consistent with The Project Management Body of Knowledge (PMBOK) and be a step towards a possible Project Management Professional (PMP) certification.

Restrictions: Enrollment is limited to Graduate level students.

MGT 660 Strategic Leadership (3 credits)

Consulting, advising, educating and coaching leaders necessitates a knowledge and understanding of the learning process and how that translates into strategy for changing any human social environment. In Strategic Leadership you will get a chance to broaden your knowledge and expand your leadership development toolkit as a leader and an educator of leaders. Specific strategies are considered and students begin to explore new ways of looking at leadership and their own behaviors in order to successfully implement strategies. Students have will have the opportunity to engage with a group of other students in an action research project and participate in a skill weekend where they reflect on the assumptions underlying their leadership actions.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 662 Total Rewards (3 credits)

The focus of this course is on strategic compensation systems needed in a dynamic business environment. Both basic and advanced concepts are reviewed, including job evaluation, wage and salary structures, gain-sharing, and other pay-for-performance systems.

Prerequisites: (MHC 667 or MGT 556)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 663 Talent-Selection & Retention (3 credits)

An examination of traditional staffing functions (recruitment, selection, orientation) is undertaken so that the process by which organizations and individuals are matched may be better understood. Always mindful of the legal issues that permeate these processes, this unique course will examine the staffing function at an advanced level. Issues such as labor supply and demand, HR strategy and planning, the regulatory environment, validity and reliability, job analysis, realistic job previews, assessment centers, honesty and ability testing, and state of the art recruitment and selection techniques will be explored in depth.

Prerequisites: (MHC 667 or MGT 556)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 664 Create New&Enhance Exist Firms (3 credits)

In an ever changing world, entrepreneurs and managers need to be able to quickly adapt and capitalize on emerging opportunities. This course focuses on creating an entrepreneurial mindset that is based on idea generation, creativity, and opportunity recognition. Utilizing an iterative process of build, measure, and learn, this mindset is then applied to creating new firms and to aiding existing firms to act more entrepreneurially.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 665 Facilitating Groups & Teams (3 credits)

Effective workgroups are essential to successful organizations. This course focuses on theories and research on group functioning, group development, and decision-making processes. The course approaches groups from the perspective of facilitation skills, whether the individual is a member of the team or an external facilitator.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 668 Leading for Sustainability (3 credits)

The Leading for Sustainability course positions your role as business leader as one that connects with sustainability at multiple levels - self, others, the organization and society. The course analyzes the definitions and development of Corporate Sustainability and its relationship with environmental management, the Triple Bottom Line and Corporate Social Responsibility (CSR). The course then focuses on leadership of self. Leadership is about "making a difference" and hence it is important to consider deeply the nature and type of difference that you intend to make in this world. In particular, this course aims to increase awareness of your values, ethics, beliefs, attitudes, etc. and how these might relate to issues of sustainability. The course then looks at organizational values and sustainability. Lastly, the course integrates the material through a value/sustainability gap analysis.

Restrictions: Enrollment is limited to Graduate level students.

MGT 670 Special Topics I (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 671 Strategic Leader Ethics&Values (3 credits)

Thinking strategically about your own development and the development of others is critical to your personal development and your ability to develop others. Leading at the next level requires knowledge and understanding of organizational vision, mission, values, ethics and communication. You will explore the impact of ethics and values on decision-making and organizational effectiveness. Students have the opportunity to focus on a particular area of organizational life and explore the impact of communications, perceptions, behaviors, culture, and current events on the outcomes of projects and initiatives.

Prerequisites: (ODL 650 or MGT 650)

Restrictions: Enrollment is limited to Graduate level students.

MGT 675 Implementing Change (3 credits)

This course focuses on the implementation of change with emphases on designing change initiatives and facilitation of change. Students will draw upon the research literature to plan and design change initiatives and develop their skills partnering with formal leaders of change efforts.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 680 Coaching Leader (3 credits)

This interactive course provides students with the opportunity to learn coaching skills. Specific topic areas include giving and receiving feedback, identifying and understanding communication style preferences, learning how to listen for the "real issues." This course is aligned with the competencies of the International Coach Federation (ICF) and can be applied to professional coaching portfolio hours.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 685 Global Organizations Seminar (3 credits)

Learning to work across the boundaries of culture, opinions, language, ideas and time zones takes practice, experience, empathy and a sense of adventure. This seminar is offered in that spirit to provide graduate students exposure to multinational organizations such as the United Nations, NGOs, schools, corporations, and health systems. Students will study and gain first-hand exposure to what it takes to manage, facilitate, and develop positive human development strategies from a multinational perspective. We will look at global learning and leadership at the individual, organizational, national, regional, and global levels.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 686 Global Leadership (3 credits)

There is no better way to learn about cultural diversity and working in a multinational society than to actually travel to another country. This study tour course includes approximately 9 days in another country, pre-work to prepare for the trip, and post-tour projects. This is a deeply experiential program with a focus on cultural diversity in a variety of education, business and social justice settings. The students will get a chance to network with and learn from professionals in other countries.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 688 Social Media & Learning (3 credits)

The course will examine the relationship between learning and social media. Current trends and use of social media in training, education, marketing, product development, data collection, customer service, and networking are some of the topics that will be covered. Students will discuss and evaluate uses of social media in informal social networking and formal knowledge management learning settings. Students will critique their own organization's culture and values around learning and social media and the challenges and opportunities they pose.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 690 Creative Problem Solving (3 credits)

Creative problem solving is an essential skill for people working in complex organizations. Creative thinkers reflect on the assumptions underlying actions and consider new ways of looking at and living in the world. They use methods to identify new alternatives. This course is a comprehensive guide for making worthwhile, influential and creative contributions at work. Students have an opportunity to identify and overcome personal and organizational barriers to develop breakthrough thinking.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 695 Applying Gestalt Theory in OD (3 credits)

This course will focus on the use of Gestalt theory in organizational change consulting. Students will learn a powerful new perspective that recognizes behavior and interactions of systems, rather than individuals, creating new and dynamic possibilities for intervention. A theoretical and practical framework will be taught for high-impact consulting in organizations, exploring critical dilemmas and offering opportunities to practice new skills. This course will benefit students who wish to understand and develop process consultation skills while learning a new framework for managing change. Approved by International Coaching Federation (ICF) for coach accreditation hours.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 696 Transfer Management Credit (1-9 credits)**MGT 700 Organization Development (3 credits)**

This course covers the theoretical and historical foundations of organizational development (OD). The course will explore practical OD skills and approaches, change techniques, and managing relationships with sponsors. In addition, the course discusses OD values, ethics, and the role of the organizational development practitioner.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 705 Facilitation Skills (3 credits)

This course includes an overview of how skilled facilitation helps individuals and groups learn and change within organizations. Students have an opportunity to practice facilitation skills and learn new methods in helping individuals and groups learn to change. Participants learn to effectively use their own behaviors to influence others in creating work environments that foster collaborative, open problem solving, dealing with differences and participative decision making.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 710 Intervention Skills (3 credits)

Students have an opportunity to complete a project demonstrating action research methodology. Course centers on understanding how to use interventions and the impact that interventions can have within an organizational setting. Students have an opportunity to design and facilitate interventions both in class and in their organization to assure the successful implementation of change and/or that individual learning takes place within their project.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 760 Inclusive Convers: DEI (3 credits)

We live and work in an increasingly diverse and complex world. Leaders are challenged to address declining levels of productivity, employee engagement, and psychological safety and the issue is not falling strictly to HR professionals; it is as much the responsibility of individual managers as well as members of any team. This course addresses diversity, equity, and inclusion in today's climate. It will provide participants with a forum to learn about the psychology of unconscious bias and discrimination, and we will utilize tools to facilitate productive conversations and explore our personal, professional and social responsibilities in co creating safe inclusive teams, learning environments, and communities in the workplace. Students will participate in experiential learning sessions, a small group project, as well as real-life case scenario discussions. Online work will complement and enhance the classroom experience. This course is of value to managers, leaders, practitioners, and those who have a vested interest in expanding their everyday understanding of diversity and inclusion.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 770 Management Study Tour (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 771 Special Topics II (3 credits)

Topics will vary according to the semester in which the class is offered.

Prerequisites: MGT 5015 or MGT 560

Restrictions: Students cannot enroll who have a major in Executive MBA Program (1-year), Executive MBA Program, Food Marketing or Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 775 Strategic HR & Talent Mgt (3 credits)

This course examines the integration of human resource management strategy within the broader context of an organization's business strategy. Students will gain an understanding of major approaches to business strategy, and the corresponding implications for human resource management in varied strategic circumstances. Implications of a firm's strategy for functional areas within human resource management will also be examined. The course will introduce emerging trends in theory, research, and the practice of human resource management.

Prerequisites: MHC 667 or MGT 556

Restrictions: Enrollment is limited to Graduate level students.

MGT 780 Research Design & Evaluation (3 credits)

The course helps students design and evaluate research in their respective organization or field of study. Methods are presented for application to work situations. Topics include: the similarities and differences between theoretical and applied research, use of data-gathering techniques, writing of research reports and evaluation methods for change, learning, and research projects.

Prerequisites: (ODL 650 or MGT 650) and (ODL 700 or MGT 700) and (MHC 561 or MGT 561)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 781 Applied ODL Project (Capstone) (3 credits)

As the capstone course in the Master's in Organization Development and Leadership, this course provides an opportunity for students to apply lessons learned in the program to address real-world challenges. Through this full-semester course, students will identify an organizational problem, craft a theory-informed intervention, engage in the intervention, and then capture and share lessons learned through the process. This course should be taken in one of the final two semesters in the MODL program.

Prerequisites: (ODL 650 or MGT 650) and (ODL 700 or MGT 700) and (MHC 561 or MGT 561)

Restrictions: Enrollment limited to students in the MSODLBU program. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 785 Advanced Seminar (3 credits)

A capstone course and the last course taken in the Organization Development and Leadership Graduate Program. Course provides students the opportunity to complete a professional paper on a topic/issue of their choice utilizing research methods and statistics. Students also complete an independent/group project leading to the design and facilitation of a learning or change project.

Prerequisites: (ODL 780 or MGT 780)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 789 Business Strategy & Purpose (3 credits)

This course deals with the strategic management of firms that operate in a global environment with multiple stakeholders who possess competing objectives. It is the capstone class of the professional MBA and allows you to integrate your previous learning across business disciplines, and perhaps to learn about yourself. The course will focus on applying knowledge in a dynamic global setting while considering how to manage a firm from a "triple bottom line" perspective – creating value for people, profit, and the planet. It utilizes a strategy simulation software-based game within which teams create virtual firms and compete in a simulated industry.

Prerequisites: ACC 550 and DSS 610 and FIN 550 and MGT 550 and MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 795 Global Business Strategy (3 credits)

The capstone course is designed to provide the student with knowledge of the strategic management and organizational policy processes. This course provides the opportunity to apply this knowledge by practicing strategic decision-making and by formulating policy through the use of cases with a focus on globalized firms. This course is usually taken in the last semester of study. Permission of the Program Director.

Prerequisites: ACC 550 and DSS 610 and FIN 550 and MGT 550 and MKT 550

Restrictions: Students cannot enroll who have a major in Executive MBA Program (1-year), Executive MBA Program, Food Marketing or Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 796 Strat Man of Hlth Care Organ (3 credits)

This course is the capstone experience for students selecting the health and medical administration specialization. This course provides the healthcare students with knowledge regarding the formulation and implementation of organizational strategy and business policy processes focused on the healthcare system/industry. Students will be required to apply strategic management principles through the analysis of cases and the health care industry environment. This course is usually taken in the last semester of study.

Prerequisites: PMK 600

Restrictions: Students cannot enroll who have a major in Executive MBA Program (1-year), Executive MBA Program, Food Marketing or Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

MGT 798 Capstone (3 credits)

This course is the capstone class of the executive MBA program. Through a computer simulation, students will experience the complexities of managing a global firm operating across different countries and the pressures of competition. The simulation involves 8 to 12 rounds of decision-making equivalent to two to three years in compressed time when students experience the managerial challenges of operating internationally.

Restrictions: Enrollment is limited to students with a major in Executive MBA Program (1-year) or Executive MBA Program. Enrollment is limited to Graduate level students.

Attributes: Graduate

Marketing (MKT)

MKT 150 First Year Seminar (3 credits)

First-Year Seminar, rotating topics.

Attributes: First-Year Seminar, Undergraduate

MKT 201 Principles of Marketing (3 credits)

Brands, sports teams, charities, politicians and entertainers all depend on Marketing to stand out from the crowd. An introduction to the theory and practice of Marketing-the process of building strong relationships with customers by meeting or exceeding their needs. In this course, you will review the core Marketing concepts from "STP" (Segmenting, Targeting & Positioning) to the "4 Ps" (Product, Promotion, Price & Place). The broad social, cultural, political and economic issues that impact Marketing are also examined.

Attributes: Undergraduate

MKT 202 Marketing Research (3 credits)

In today's Marketing environment, information is power. An in-depth study of the various steps of the market research process from problem definition to data analysis. Focus on the use of market research techniques and technology as applied to marketing planning, product development, performance monitoring and marketing communications.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 211 Honors Principles of Marketing (3 credits)

Brands, sports teams, charities, politicians and entertainers all depend on Marketing to stand out from the crowd. An introduction to the theory and practice of Marketing-the process of building strong relationships with customers by meeting or exceeding their needs. In this course, you will review the core Marketing concepts from "STP" (Segmenting, Targeting & Positioning) to the "4 Ps" (Product, Promotion, Price & Place). The broad social, cultural, political and economic issues that impact Marketing are also examined.

Restrictions: Students with a class of First Year may **not** enroll.

Attributes: Undergraduate

MKT 301 Integrated Mktg Communications (3 credits)

Breaking through the "clutter" to gain the customer's attention is a never-ending challenge. An inclusive review of the various elements of Integrated Marketing Communications and how they are used to successfully engage the target audience. Topics such as advertising, digital/alternative media, social media, public relations and sales promotion are addressed from creative development to media selection to execution with the goal of communicating to constituents with one clear voice.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 302 Consumer & Buyer Behavior (3 credits)

Understanding what makes customers "tick" is the foundation of successful Marketing. A study of how consumer and business needs and wants are converted into satisfactions, with primary emphasis on the core processes that underlie customer decision making. The course highlights major consumer behavior models, current research on consumer behavior, and the socio-cultural issues that influence consumers.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 303 MKT Communications (3 credits)

Topics such as advertising, digital/alternative media, social media, public relations and sales promotion are addressed from creative development to media selection to execution with the goal of communicating to constituents with one clear voice. This course is for Communications Studies students who will not take Principles of Marketing (MKT 201).

Restrictions: Students cannot enroll who have a major, minor, or concentration in Marketing.

Attributes: Undergraduate

MKT 304 Principles of Selling (3 credits)

This course offers students an overview of sales careers and the selling process. Students will learn about the art and science of selling including current sales theories, effective selling techniques and practices, as well as the legal regulations and business ethical issues which affect salespeople.

Prerequisites: MKT 201

Restrictions: Enrollment limited to students in the Haub School of Business college.

Attributes: Undergraduate

MKT 308 Marketing Analytics (3 credits)

This course is designed to provide students with a comprehensive, applied approach to understanding consumer behavior and evaluating the effectiveness of marketing activities. Students will learn to analyze and interpret customer and market data to drive decision-making via best practices. This course may use interactive or digital software, including Tableau, Microsoft Excel, qualitative and quantitative analysis platforms, presentations, and infographic design tools.

Prerequisites: MKT 201 and DSS 220

Attributes: Undergraduate

MKT 312 Selling and Sales Management (3 credits)

Behavioral and systems approaches to selling will be covered, along with the role of selling in the Marketing mix and the importance of selling in customer service. Discussion of sales force management including the tools and techniques of effective sales presentations, the role of technology, sales training and motivation.

Prerequisites: (MKT 201 and MKT 304)

Attributes: Undergraduate

MKT 313 Ethics in Marketing (3 credits)

Discussion and analysis of the behavior and interaction of companies, consumers and customers across various topics such as personal privacy, sales responsibility, intellectual property, pricing, image and issue presentation, and Marketing channels. Students will develop multiple methods for evaluating ethical issues in terms of actions and consequences from the perspective of shareholders, employees, consumers, society-at-large and the environment.

Prerequisites: MKT 201

Attributes: GEP: Ethics Intensive, Undergraduate

MKT 314 Social Media Marketing (3 credits)

Social media has changed the way we learn, communicate, forge relationships, and shop. In this course, we explore how customers use social media to express their identity, maintain, personal relationships, collaborate with others, and as a creative outlet. We also examine how companies can use popular social media platforms to further their business goals.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 315 Mkt in a Multicultural World (3 credits)

The American demographic landscape is shifting dramatically and Marketing must strive to keep up. Discussion of the challenges and opportunities for marketers wishing to target various diverse groups in the United States. Topics include how to develop Marketing strategies and refine the Marketing mix to best serve and research these different and changing groups.

Prerequisites: MKT 201

Attributes: GEP: Diversity Course, Undergraduate

MKT 316 Digital Marketing (3 credits)

In this course, students will learn how to use various online tools to develop successful campaigns. Topics covered include search engine marketing (SEM), search engine optimization (SEO), internet and mobile advertising, social media and web analytics.

Prerequisites: MKT 201 and (MKT 301 or MKT 303 or FMK 303 or PMK 351)

Attributes: Undergraduate

MKT 317 Fashion Marketing (3 credits)

How fashion has evolved in today's world of social media, influencers, and the changing retail landscape.

Prerequisites: MKT 302

Attributes: Undergraduate

MKT 321 Advertising (3 credits)

Advertising has come a long way from the days of "Mad Men", yet it is still the most prominent and glamorous component of the communications mix. An effective ad should inspire us to buy, click, donate or even vote. This course will examine the elements of successful Advertising from strategy and development to execution and evaluation.

Prerequisites: MKT 201 and (MKT 301 or PMK 351 or FMK 303 or MKT 303)

Attributes: Undergraduate

MKT 324 Public Relations and Publicity (3 credits)

Is all PR really good PR? The concepts, history, theory, social responsibility and management of Public Relations and its role in the communications mix. This course will survey PR problems and practices in corporations, government agencies, associations and not-for-profit organizations.

Prerequisites: MKT 201 and (MKT 301 or MKT 303 or PMK 351 or FMK 303)

Attributes: Undergraduate

MKT 325 Fundamentals of Graphic Design (3 credits)

A "hands on" course where you will learn graphic skills that are the technical foundation for transforming concepts into effective visual communications. Extensive use of current online graphics programs.

Prerequisites: MKT 201

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MKT 327 Global Mktg Communications (3 credits)

This course uses writing to help students understand the various problems and opportunities of globalization as applied to marketing communications. The fundamental principle is that knowledge of cultural specifics or value paradoxes is the basis of effective global marketing communications strategies.

Prerequisites: MKT 201 and (MKT 301 or MKT 303 or PMK 351 or FMK 303)

Attributes: GEP: Diversity Course, Undergraduate, GEP: Writing Intensive

MKT 331 International Marketing (3 credits)

Multi-faceted study of the concepts, methods and challenges of conducting business in international markets. The economic, political, cultural and geographical factors affecting multinational marketers are addressed from the perspective of various stakeholders including customers, exporters and local businesses.

Prerequisites: MKT 201

Attributes: GEP: Globalization Course, Undergraduate

MKT 341 Music Marketing (3 credits)

A course for individuals considering a career in Music Marketing or the Music Industry minor. Examines the use of music in marketing often called audio branding. Using popular press and case studies, this course looks at the integration of music in advertising, television, sports, film and other media.

Restrictions: Students with a class of First Year may **not** enroll.

Attributes: Music Industry Course, Undergraduate

MKT 342 Music and Entertainment Law (3 credits)

A discussion of the legal issues in the entertainment industry from the perspective of various stakeholders including artists, writers, agents, producers and distributors. Using a legal framework, students will examine a variety of entertainment scenarios including concerts, shows, radio and TV.

Prerequisites: MKT 201 and (MKT 341 or MKT 343)

Attributes: Music Industry Course, Undergraduate

MKT 343 Entertainment Marketing (3 credits)

Entertainment can be viewed as both a 'product' and as a promotional tool. Learn about entertainment industry Marketing practices as well as the organizations and people who conceive of, create and distribute entertainment properties including television, film, music, gaming and theater.

Prerequisites: MKT 201

Attributes: GEP: Diversity Course, Undergraduate

MKT 344 Business of Music and Entertai (3 credits)

This course provides an overview of the music and entertainment industry, focusing on the business strategies that drive success in this dynamic field. Students will explore key topics, such as industry structure, function, the role of various participants, primary business models, marketing and promotion, and the impact of new technologies on the industry landscape.

Restrictions: Students with a class of First Year may **not** enroll.

Attributes: Music Industry Course, Undergraduate

MKT 350 Event Marketing (3 credits)

The use of Event Marketing as a strategy to reach consumers beyond traditional, cluttered advertising mediums. You will learn how to plan and execute events, and use events to effectively engage prospective consumers, build brand awareness, and market a company's products and services.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 351 Business of Sports (3 credits)

A look at professional and college sports as big business including league structure; ownership and franchise values; sources of revenue; sports media; labor issues; competitive balance; and the economic and financial aspects of college athletic departments. This course will also examine the impact that diversity and social issues have on leading sport organizations in the 21st century.

Prerequisites: MKT 201

Attributes: CCC: Diversity, GEP: Diversity Course, Undergraduate

MKT 352 Sports Law (3 credits)

Many of today's sports headlines have little to do with wins and losses. A discussion of the legal issues related to sports, from managing sports-related businesses to working as a sports agent or a university athletic director. Students will delve into existing sports business lawsuits and collective bargaining agreements to stimulate discussion and formulate answers to practical sports business problems.

Restrictions: Enrollment limited to students with a class of Junior or Senior.

Attributes: Justice Ethics and the Law , Undergraduate

MKT 353 Sports Marketing (3 credits)

Sports Marketing has become increasingly sophisticated over the last decade as teams compete for the entertainment dollar. A study of marketing, promotion, sales and sponsorship strategies utilized in the sports industry by both sports properties and brand partners.

Prerequisites: MKT 201 and MKT 351

Attributes: Undergraduate

MKT 354 The Business of Baseball (3 credits)

An examination of how MLB and its franchises operate as business entities, starting with baseball's antitrust exemption and reserve clause. The course covers league operations, labor relations, financial issues, marketing, baseball and the media, and ballparks. Must be Sophomore or above.

Restrictions: Students with a class of First Year may **not** enroll.

Attributes: Undergraduate

MKT 355 Sports, Selling, & Sales (3 credits)

Learn how to develop the skills essential to effectively building sales and revenue within a sports business and leverage the various revenue producing opportunities within a sports franchise or organization. The course will explore critical factors in successfully renewing and growing sales with both consumers and corporate partners.

Prerequisites: MKT 201 and MKT 351 and MKT 353 (may be taken concurrently)

Attributes: Undergraduate

MKT 362 Digital Media in Sports (3 credits)

This course will review the sports digital landscape including current issues, best practices, branding, mobile sports, ticketing, fantasy sports and e-commerce.

Prerequisites: MKT 351 and MKT 201 and MKT 353 (may be taken concurrently)

Attributes: Undergraduate

MKT 363 Sports Analytics (3 credits)

The use of data and quantitative methods to measure performance and make decisions in the competitive sports arena. The analytical skills learned in this course can be applied to various industries beyond sports.

Prerequisites: MKT 201 and (MKT 351 or MKT 202)

Attributes: Undergraduate

MKT 364 Sports Marketing Communication (3 credits)

A review of the various elements of Sports Marketing Communications and how they are used to successfully engage the target audience. Highlighting current issues and best practices, topics such as traditional advertising, digital/social media, direct marketing, public relations and sales promotions are addressed.

Prerequisites: MKT 201 and MKT 351 and MKT 353 (may be taken concurrently)

Attributes: Undergraduate

MKT 365 eSports (3 credits)

This course will provide an overview of the Esports industry including history, current status and future. Course will focus on sales and marketing as well as event management.

Prerequisites: MKT 201

Restrictions: Students with a class of First Year may **not** enroll.

Attributes: Undergraduate

MKT 370 Spec Topics:Sports Marketing (3 credits)

This course will be offered periodically on a topic of interest in the field of Marketing as chosen by the instructor.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 401 Marketing Strategy (3 credits)

In this capstone course, students apply the Marketing knowledge acquired from previous courses to the development of a comprehensive strategy that addresses all aspects of the Marketing mix. Students will conduct in-depth analysis of consumer, industrial and not-for-profit Marketing issues. Cases dealing with product innovation and development, demand, pricing, distribution, and promotion will also be explored, giving students an opportunity to address real-world business problems.

Prerequisites: MKT 201 and MKT 202 and MKT 302 and (MKT 301 or MKT 303)

Restrictions: Enrollment limited to students with a class of Senior.

Attributes: Undergraduate

MKT 450 Marketing Study Tour (3 credits)

A specially designed international tour to varying countries which offers students a unique opportunity to study international business and develop a better understanding of the global marketing environment-its dimensions, participants, trends and opportunities. Students will also experience the heritage, ambiance, and excitement of the world's great countries and cities.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 470 Special Topics in Marketing (3 credits)

This course will be offered periodically on a topic of interest in the field of Marketing as chosen by the instructor.

Attributes: Undergraduate

MKT 490 Internship in Marketing I (3 credits)

An on-the-job experience whereby students spend a minimum of fifteen hours a week applying Marketing principles for an approved employer. Course requires approval of Marketing Department Internship Coordinator prior to registration.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 491 Internship in Marketing II (1,3 credits)

This course is meant for students with an internship opportunity, for which the prospective employer requires university credits, and who have already completed a three-credit internship. The course is limited to General and Sports Marketing majors who have completed a three-credit internship. Course requires approval of Marketing Department Internship Coordinator prior to registration. This practicum does not satisfy any major or minor requirements. Grade will be Pass/Fail.

Prerequisites: MKT 201

Attributes: Undergraduate

MKT 493 Indep Study in Marketing (3 credits)

Students will study a topic in marketing with a faculty mentor.

Attributes: Undergraduate

MKT 497 Sports Marketing Internship (3 credits)

An approved internship in sport marketing.

Prerequisites: MKT 201 and MKT 351

MKT 499 Research Practicum (3 credits)

Take your research skills to the next level while developing the insights needed to make effective marketing decisions.

Prerequisites: MKT 201 and MKT 202

Attributes: Undergraduate

MKT 509 Curricular Practical Training (1 credit)**MKT 521 Marketing Concepts (2 credits)**

This course provides an overview of the philosophy and organization of marketing, the concepts of marketing planning and strategy, the impact of the macro and task environments on the marketing function, the process of managing marketing information flows, and the major elements of marketing programs. The concepts of positioning, segmentation and targeting will be highlighted, along with discussion of product planning and development, and the elements of the marketing mix.

MKT 530 Marketing Foundation (2 credits)

An introduction to customer-driven marketing strategy by taking students through the marketing fundamentals beginning with strategy, target marketing and opportunity analysis, then developing the product, price, distribution and promotion marketing mix.

MKT 531 Integrated Mktg Communications (1 credit)

This course is designed to introduce the important elements of effective and integrated Marketing Communications (IMC) including advertising, sales promotion, personal selling, publicity, public relations, interactive marketing, and direct marketing. The roles of traditional, digital and social channels are reviewed.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Executive MBA Program (1-year) or Executive MBA Program. Enrollment is limited to Graduate level students.

MKT 545 Graduate Marketing Gateway (3 credits)

The issue of environmental sustainability is no longer a "fringe" issue. Instead, the issue of environmental sustainability requires a paradigm shift in the way managers think about their own role within the broader scope of the global community. Businesses that are more sustainable are more competitive, more innovative, have lower costs, and attract better talent.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate, Gateway Course (Grad HSB)

MKT 550 Marketing Management (3 credits)

This course will prepare students to guide the management, development, application, and assessment of ethical business strategy from a customer-focused, market-sensing, and competitor-driven perspective. Learn how the fundamental of strategic thought—such as the resource-based view and market orientation—can inform decisions to enter new markets, be market-driven, drive markets, position brands, and create and measure customer value.

Prerequisites: HSB Foundation with a score of MK500

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 602 Promotional Strategy (3 credits)

Breaking through the "clutter" to gain the customer's attention is a never-ending challenge. An inclusive review of the various elements of Integrated Marketing Communications and how they are used to successfully engage the target audience. Special emphasis is placed on media selection, the creative process, promotional planning and the allocation of resources as promotional tools.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 604 International Marketing (3 credits)

A multi-faceted study of the concepts, methods and challenges of conducting business in international markets. The economic, political, cultural and geographical factors affecting multinational marketers are addressed from the perspective of various stakeholders including customers, exporters and local businesses.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 605 Research in Marketing (3 credits)

A multi-faceted study of the concepts, methods and challenges of conducting business in international markets. The economic, political, cultural and geographical factors affecting multinational marketers are addressed from the perspective of various stakeholders including customers, exporters and local businesses.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 606 Consumer Behavior (3 credits)

Marketing begins and ends with the customer, from determining customers' needs and wants to providing customer satisfaction and maintaining customer relationships. This course highlights major consumer behavior models, current research on consumer behavior, and the socio-cultural issues that influence consumers and how they can be used to improve marketing decision-making.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 608 Marketing and Social Media (3 credits)

Technology has changed the way we learn, communicate, forge relationships and shop. In this class, you will learn how to build a great brand using digital tools such as social networking, blogging, virtual worlds, podcasting and mobile applications.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 609 Marketing Analytics (3 credits)

This application-oriented course introduces quantitative analytic concepts that can inform marketing decisions, assess marketing performance, and detail return on marketing investment using spreadsheets, data mining and computer-based models, students will learn how to determine market size and share, identify segments and positioning characteristics, interpret surveys, understand cost and pricing, and optimize distribution.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 610 Digital Mkt & Web Analytics (3 credits)

In this course students will learn how to use various online tools to develop successful digital campaigns. Topics covered include search engine marketing (SEM), search engine optimization (SEO), internet and mobile advertising, social media and web analytics.

Prerequisites: MKT 550 and (MKT 605 or MKT 614)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 612 Global Cultures and Consumers (3 credits)

This course examines the basic concepts and principles of consumer behavior with the goal of understanding how they can be used in successful marketing decision making. It approaches these phenomena within a global framework that emphasizes the importance of the cultural dynamics that influence the meaning of consumption and of consumer behavior around the world.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 613 International Channel Mgmt (3 credits)

An introduction to cycle of goods (the Channels) from the starting point of sourcing through to payment by the end-user, with a strong focus on the international aspects of moving goods. These core processes encompass information management; inventory flow scheduling and control; logistics-production coordination; international transportation systems operation and infrastructure; and customer service, order fulfillment, and distribution facilities management.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 614 International Mktg Research (3 credits)

This course exposes the student to research methodology, and qualitative and quantitative data analytic methods that can be applied to marketing decisions. It addresses general and contemporary issues in consumer behavior, product development, pricing, promotion and channels in the international marketing context.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 616 Global Mktg Communications (3 credits)

An inclusive review of the various elements of Integrated Marketing Communications and how they are used to successfully engage customers including advertising, public relations, sales promotion, direct marketing, e-commerce, event planning, and sponsorships. Students will also explore the role of cultural differences, social-political issues, and global communications institutions in helping multinational organizations communicate with target audiences.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 618 Int'l Prod Develop & Brand Mgt (3 credits)

Students will be exposed to a variety of planning concepts and tools that are available to managers to assist with the creation and management of products and services for the international market. In addition, this course examines brand equity and brand management from a global perspective.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 621 Qualitative Marketing Research (3 credits)

This course helps develop knowledge and skills in the application and use of qualitative research techniques to develop customer insights. A survey of qualitative research methods are paired with relevant examples in various marketing domains. Students will learn best practices for data collection and analysis as well as presentation and application of findings.

Prerequisites: MKT 550 and (MKT 605 or MKT 614)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 622 Advertising & Consumer Insight (3 credits)

This course introduces students to advertising theory and techniques related to the strategic engagement of consumers via print, electronic, and other media. Students will be exposed to a variety of advertising metrics, key performance indicators, data sources, and analytical tools utilized in the advertising field.

Prerequisites: MKT 550 and (MKT 605 or MKT 614)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 623 Predictive Analytics for Mkt (3 credits)

This course covers predictive analytics with an emphasis on applications for business, marketing and consumer behavior. The course focuses on the choice of a predictive method, the procedure of predictive analysis, the validation of a predictive analysis, the important issues involved in evaluating the quality of a predictive data analysis and interpretation of the results.

Prerequisites: MKT 550 and (MKT 605 or MKT 614)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 650 Marketing Study Tour (3 credits)

A specially designed international tour to varying countries which offers students a unique opportunity to study international business and develop a better understanding of the global marketing environment—its dimensions, participants, trends and opportunities. Students will also experience the heritage, ambiance, and excitement of the world's great countries and cities.

Prerequisites: MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 770 Marketing Special Topics (3 credits)

The topics course covers subjects of current interest in the field of Marketing. Specific topics will be announced in the course schedule. The prerequisites and topics selected are at the discretion of the instructor.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MKT 772 ST: Advanced Research & Stats (3 credits)

This course covers basic multivariate data analysis with an emphasis on applications for business, marketing research and consumer behavior. Emphasis on applications of multivariate analysis from a conceptual viewpoint as well as research design.

Prerequisites: MKT 550 or MKT 560 and (MKT 614 or MKT 605)

Attributes: Graduate

MKT 790 Marketing Strategy (3 credits)

This capstone course helps prepare students to execute the development, application and assessment of Marketing strategy from a customer-focused, market-sensing and competitor-driven perspective. Supported by Market Research and Analytics, students will create a strategic Marketing plan that includes branding, product and market development, promotion, channels of distribution, ethics and other contemporary issues. Completion of all core MKT courses and four or more 600 and above level elective courses required.

Prerequisites: (MKT 606 and MKT 550 and MKT 605 and MKT 609)

Attributes: Graduate

MKT 792 Marketing Internship (1,3 credits)

An approved internship in marketing.

Attributes: Graduate

MKT 795 Seminar in International Mktg (3 credits)

This capstone course builds upon the lessons and skills acquired in previous international marketing courses to prepare students to actively lead and/or support decision-making processes for international marketing operations. Bringing together marketing strategy and policy, the course reviews topics such as branding, product and market development, channels of distribution, intellectual property, ethics, and other contemporary issues.

Prerequisites: MKT 550 or HSB Foundation with a score of MK550

Restrictions: Enrollment limited to students in the MSMKT program.

Enrollment is limited to Graduate level students.

Attributes: Graduate

Marketing Pharmaceutical Ex (MPE)

MPE 530 Marketing Foundation (2 credits)

The course sets the stage for future study by taking students through the marketing fundamentals beginning with strategy, target marketing and opportunity analysis, then developing product, price, distribution and promotion, and an introduction to customer driven marketing strategy, all in a managed care context.

Restrictions: Enrollment is limited to students with a major in Food Marketing or Pharm. Healthcare Business. Enrollment is limited to Graduate level students. Enrollment limited to students in a Master of Bus Administration degree.

Attributes: Graduate

MPE 610 Drug, Device Regulations (2 credits)

With the plethora of new communications vehicles, including direct-to-consumer advertising and the Internet, the goal of achieving marketing objectives and remaining in adherence with FDA regulations/guidelines has become increasingly difficult. This course will provide a working knowledge of the federal regulation of prescription drug promotion and associated marketing practices and will provide insight into drug promotion issues currently of interest to FDA and the pharmaceutical industry. The course will also consider the impact of products liability and anti-kickback concerns on developing marketing programs for prescription drugs.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

MPE 795 Capstone (2 credits)

This course is a simulation experience that drives home the four P's of marketing. The simulation is played from the point of view of a marketing manager in the pharmaceutical market. Over the course of the simulated years, the participant will have the opportunity to reformulate leading products, introduce line extensions, and enter new market segments.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Pharm. Healthcare Business. Enrollment is limited to Graduate level students.

Attributes: Graduate

Mathematics (MAT)

MAT 101 Mathematical Explorations I (3 credits)

For humanities majors, the course covers set theory and a number of its applications, topics from logic including propositions, truth tables, number systems, and elementary geometry. Other topics may be covered at instructor's discretion.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

MAT 102 Mathematical Explorations II (3 credits)

This is a second course for humanities majors. The course covers elementary probability, including independent and dependent events, conditional probability, binomial probability, and certain applications in a wide variety of situations. MAT 101 is not required for MAT 102.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

MAT 103 Quantitative Appl in Business (3 credits)

Topics in finite mathematics: matrices, solving linear systems, optimization using linear programming, simplex algorithm. Pre-calculus topics: linear, quadratic, exponential, and logarithmic functions and their graphs, mathematical models, and certain applications.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

MAT 107 Contemporary Topics in Math (3 credits)

This course is designed to enable the student to recognize, understand and apply various mathematical concepts and principles that are the foundation for many things that we take for granted in our everyday lives, such as Voting, Traveling, Finances, Government and the wonders of Nature.

Attributes: Undergraduate

MAT 109 Quantitative Reasoning & Skill (3 credits)

This course focuses on the application of mathematics and statistics to interpret and analyze quantitative information. An emphasis is placed on critical thinking and applying conceptually-grounded skills to solve problems in context.

MAT 110 Fundamental Math for Educators (3 credits)

This course is designed to ensure that pre-service educators have a deep understanding of the essential mathematical core standards and competencies required to enter the teaching profession. Students will develop basic mathematical skills, will be able to employ problem solving strategies, will be able to communicate mathematical concepts, and will be able to construct and evaluate mathematical arguments.

Attributes: Undergraduate

MAT 111 The Mathematics of Patterns (3 credits)

This course focuses on mathematics as the science of identifying, understanding and describing patterns. Patterns that occur in nature and empirical studies can be identified and modeled using fundamental ideas such as functions (mathematical rules), probability (long term behavior), exploratory data analysis (statistics) and geometry. Through a series of guided investigations students will master the reasoning used to identify the patterns, the mathematical model used to describe the pattern and the computational techniques necessary to further explore and apply the pattern in new situations. This course is designed specifically for students intending to become elementary or middle school teachers.

Attributes: Undergraduate

MAT 112 College Algebra (3 credits)

This course involves the study of algebra including its applications and graphs. Course topics include algebraic expressions, linear equations and inequalities, polynomial and rational functions, quadratic equations and inequalities, exponential and logarithmic functions, systems of equations, relations and functions, and radical and root functions.

Attributes: Undergraduate

MAT 115 Clinical Mathematics (3 credits)

This course is the study of mathematics in the health sciences including medication dosages and applications of algebra and statistics. Students will utilize proportional reasoning and problem-solving strategies to address problems in context.

MAT 118 Introduction to Statistics (3 credits)

Introduction to statistics and probability: design of a study, measures of central tendency and variability, probability, random variables, discrete probability distributions, Normal distributions, central limit theorem, confidence intervals, hypothesis testing. The problems covered in MAT 118 often (but not exclusively) focus on applications in business and social sciences.

Attributes: CCC: Mathematics, Undergraduate

MAT 120 Precalculus (3 credits)

This course focuses on functions, graphs, and algebraic techniques. Topics include an introduction to functions and graphs, linear, exponential, logarithmic, and trigonometric functions. Functions are used for solving multidisciplinary application problems.

Attributes: CCC: Mathematics, Undergraduate

MAT 121 Math Modeling for MS Teachers (3 credits)

Designed for students who will become middle school teachers, this course will explore mathematical topics in the context of building of building models to solve problems. The emphasis will be on using multiple representations to develop mathematical models that describe some phenomena and learning the mathematical techniques necessary for working with the model in order to effectively answer questions about the situation being modeled. Students will interpret results given the context of the model and develop their communication skills for explaining mathematics.

MAT 122 Trigonometry (3 credits)

Topics include Angle Measurements; Triangles; Trigonometric and Inverse Trigonometric Functions and Graphs; Solving Trigonometric Equations; Essential Trigonometric Identities; Laws of Sine, Cosine, and Tangent; Vectors; Parametric Equations; Polar Coordinates. This course will emphasize application and modeling problems related to the topics.

MAT 123 Differential Calculus (3 credits)

Review of mathematical models using polynomial, rational, exponential and logarithmic functions with business applications. Introduction to differential calculus including limits, rates of change and the derivative, optimization using the derivative. Students may NOT receive credit for both this course and for any of the following courses: MAT 155 or MAT 161.

Attributes: CCC: Mathematics, Undergraduate

MAT 128 Applied Statistics (3 credits)

Introduction to statistics and probability: design of a study, measures of central tendency and variability, probability, random variables, discrete probability distributions, Normal distributions, central limit theorem, confidence intervals, hypothesis testing for one and two populations, correlation. MAT 128 covers roughly the same topics as MAT 118 except that the topics related to testing hypotheses are covered in more detail in MAT 128 than in MAT 118. These topics include examples focusing on biomedical and pharmaceutical sciences.

Attributes: CCC: Mathematics, Undergraduate

MAT 130 Whole Truth about Whole Number (3 credits)

This course involves studying properties of natural numbers and integers. Topics include divisibility, prime numbers, the Euclidean Algorithm and cryptography for putting messages into code.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 131 Linear Methods (3 credits)

This course studies basic properties and applications of matrices and vectors. Then, matrices and vectors will be used in a variety of applications, including vector geometry, elementary graph theory, solving word problems involving systems of linear equations, least-squares functions, and geometric transformations. The course also covers some topics in basic logic, including logical operators, the conditional, truth tables, quantifiers, and syllogisms. Students in this course will be required to have a graphing calculator that can perform standard matrix operations.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 132 Math of Games & Politics (3 credits)

This course will focus on both computational and theoretical aspects of probability theory, game theory and social choice theory. Topics include expected value, counting methods and conditional probability, dominant strategies, combinatorial games, Nash equilibria, social dilemmas and, for zero sum games, saddle points and the Minimax theorem. Social choice theory topics include voting methods, weighted voting, fairness criteria and impossibility theorems.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 134 Math of Uncertainty: Rules/Prob (3 credits)

This course provides students with an in-depth introduction to probability and its many real-life applications. Students will study counting techniques including permutations, combinations, binomial coefficients, occupancy problems and runs within random orderings and will prove combinatorial identities. Students will study topics in probability including sample spaces, DeMorgan's Laws, conditional probability, independent events, Bayes Theorem, random variables and expected value. Students will examine many of the classical problems in probability theory including Prisoner's Dilemma, Gambler's Ruin and the Birthday Problem as well as lotteries, card games and random walks.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 135 Sounding Number: Music & Math (3 credits)

Music has many connections to mathematics. The ancient Greeks discovered that chords with pleasing sounds are related to simple ratios of integers. Other connections include equations describing the sounds of musical instruments, the mathematics of digital recording, the use of symmetry in composition, and the systematic exploration of patterns by African and Indian drummers. This course introduces basic concepts in trigonometry, set and group theory, and combinatorics and investigates their applications in the analysis, recording, and composition of music. Along the way, we consider the role of creativity in mathematics and the ways in which mathematics has inspired musicians. The course will involve hands-on laboratory work in audio engineering and music composition.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 138 Symmetry (3 credits)

"Symmetry" is a ubiquitous concept in modern mathematics and science. Certain shapes and images seem more symmetric than others, yet is not immediately obvious how to best measure and understand an object's symmetry. In fact, the quest to more precisely quantify the concept of symmetry has been a driving force in science and mathematics, and will form the central theme of this course.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 145 Precalculus: Intro to Calculus (4 credits)

Precalculus topics include an introduction to functions and graphs, linear, exponential and logarithmic functions, and their applications. Calculus topics include an introduction to derivatives and integrals of polynomial and basic rational functions and derivative and integration applications.

Attributes: CCC: Mathematics, Undergraduate

MAT 148 Applied Statistics Plus (4 credits)

Introduction to statistics and probability; design of a study, measures of central tendency and variability, probability, random variables, discrete probability distributions, Normal distributions, central limit theorem, confidence intervals and hypothesis testing for one and two populations correlation (using Z, T, ANOVA, Fisher's, Chi-squared, and Wilcoxon tests), simple linear regression models. The course covers all topics of MAT 118 and MAT 128 as well as some additional topics on hypothesis testing. For students interested in getting additional expertise in handling data and testing hypotheses, this course is recommended over MAT 118 and MAT 128.

Attributes: CCC: Mathematics, Undergraduate

MAT 150 First Year Seminar (3 credits)

This course investigates several beautiful topics within mathematics. Depending on the instructor, these topics might include: prime numbers, the different sizes of infinity, the Platonic solids, the fourth dimension, fractals, chaos, probability, and the math of voting.

Attributes: First-Year Seminar, Undergraduate

MAT 155 Fundamentals of Calculus (3 credits)

This course covers differential calculus and the beginning of integral calculus. Topics include limits, continuity, differentiation, applications of derivatives, indefinite and definite integrals, and the fundamental theorem of calculus.

Prerequisites: MAT 120 or Math Placement with a score of MA162 or Math Placement with a score of MA161 or Math Placement with a score of MA155 or MA 107

Restrictions: Students cannot enroll who have a major in Actuarial Science, Chemistry, Mathematics or Physics.

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 161 Calculus I (4 credits)

Limits; slopes, rates of change and the derivative; techniques of differentiation; implicit differentiation; derivatives of transcendental functions; related rates; linear approximation; L'Hospital's Rule; the Mean Value Theorem; applications of differentiation (including curve sketching and optimization); introduction to integration; the Fundamental Theorem of Calculus. Students may NOT receive credit for both this course and for any of the following courses: MAT 123 or MAT 155.

Prerequisites: MAT 120 or Math Placement with a score of MA162 or Math Placement with a score of MA161

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 162 Calculus II (4 credits)

Areas between curves, volumes, average value of a function, integration by parts, improper integrals, approximate integration, arc length, area of a surface of revolution, differential equations and applications, parametric curves, polar coordinates, and Taylor polynomials.

Prerequisites: MAT 161 or MAT 155 or Math Placement with a score of MA162 or MA 110 or MA 122

Attributes: CCC: Mathematics, GEP: Math Beauty, Undergraduate

MAT 170 Special Topics in Mathematics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MAT 210 Theory of Numbers (3 credits)

Division Algorithm; Mathematical induction; Euclidean algorithm; fundamental theorem of arithmetic; linear Diophantine equations; modular arithmetic; number theoretic functions; prime numbers; Fermat's last theorem; quadratic residues, primitive roots, Chinese Remainder theorem.

Attributes: GEP: Math Beauty, Undergraduate

MAT 213 Calculus III (4 credits)

Study of vectors, curves, functions of several variables, partial derivatives, tangent planes, maximum and minimum values, Lagrange multipliers, double integrals, triple integrals, spherical and cylindrical coordinates, vector fields, line integrals, sequences, series, convergence tests, power series, and Taylor series.

Prerequisites: MAT 162 or MA 221

Attributes: GEP: Math Beauty, Undergraduate

MAT 226 Introduction to Linear Algebra (3 credits)

Linear systems, matrices, linear transformations, determinants, vector spaces, dimension, orthogonality, eigenvalues, eigenvectors, and diagonalization.

Prerequisites: MAT 155 or MAT 161

Attributes: GEP: Math Beauty, Undergraduate

MAT 232 Chaos, Fractals & Dynamic Syst (3 credits)

Introduction to dynamical systems: one dimensional dynamics; attracting, repelling, periodic and chaotic orbits; bifurcation; dynamics in the complex plane, Julia sets, the Mandelbrot set; two dimensional dynamics. Introduction to fractals: self-similarity, iterated function systems, fractal dimension.

Prerequisites: MAT 162

Attributes: GEP: Math Beauty, Undergraduate

MAT 233 History of Mathematics (3 credits)

Development of mathematical ideas over 2500 years, beginning with Greek geometry and including Euclid, Archimedes, Newton, Euler, Gauss, and Poincare.

Prerequisites: MAT 161 or MAT 155

Attributes: GEP: Math Beauty, Undergraduate

MAT 238 Differential Equations (3 credits)

Solution of ordinary differential equations using analytic, numerical, and qualitative techniques. Modeling via differential equations, systems of differential equations. Laplace transforms; discrete dynamical systems. Use of a computer software package is required.

Prerequisites: MAT 162 or MA 221

Attributes: GEP: Math Beauty, Undergraduate

MAT 250 Fundamentals of Mathematics (3 credits)

The course consists of the following elements. Fundamentals of Logic: propositional logic, predicate logic, rules of inference and proofs; Fundamentals of Algebra: sets, functions, and relations; Fundamentals of Counting and Set Theory: natural numbers, mathematical induction, cardinality of sets, infinity; Fundamentals of Analysis: building number systems, basics of epsilon-delta calculus, continuity, convergence, and uniform convergence.

Prerequisites: MAT 161 or MAT 155

Attributes: GEP: Math Beauty, Undergraduate

MAT 270 Special Topics in Mathematics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MAT 290 Career Prep Seminar (1 credit)

What will YOU do with your degree in Mathematics, Computer Science, Information Technology, or Actuarial Science? Learn how to explore the variety of professional options open to you based on your major and on your unique personality and individual traits. This professional development seminar will help you build practical skills through a series of hands on assignments, a detailed self-assessment, goal-planning for a successful future, and multiple points of engagement with alumni. This one-credit course meets once a week to provide instruction and support in topics including internship search and application, resume/cover letter prep, post-grad options, professional communication and networking/ interviewing . Is an internship right for you? Do you know the best way to search for one? Why do I need to network - how will that help me? Register now to get the answers to these and many other questions and invest in your future! Student may repeat this course twice for credit.

Attributes: Undergraduate

MAT 304 Statistics for Research (3 credits)

After completing this course, the students will be able to analyze scientific data obtained as outcomes of research studies and be familiar with the statistical tools necessary to evaluate data analyses in scientific publications. The course topics include statistical inference on one sample and two samples (confidence intervals and testing hypothesis with t-test), regression models (simple and multiple), design of experiments (One-way ANOVA and Two-way ANOVA), survival models (Kaplan-Meier curve and Nelson-Aalen estimator), categorical data analysis, and logistic regression models.

Prerequisites: MAT 118 or MAT 128 or MAT 134 or MAT 148 or DSC 223 or DSS 201

Attributes: Undergraduate

MAT 311 Numerical Analysis (3 credits)

An introduction to numerical methods for solving a variety of problems. Included will be root finding, numerical integration and differentiation, polynomial approximation, ordinary differential equations, discussion of convergence issues, error analysis and machine arithmetic, introduction to Python programming.

Prerequisites: MAT 162

Attributes: GEP. Math Beauty, Undergraduate

MAT 313 Mathematical Optimization (3 credits)

The course covers basic ideas in optimization beginning with linear programming, the simplex method and duality and finishes with non-linear optimization and algorithms and conditions leading to a solution of non-linear problems.

Prerequisites: MAT 226

Attributes: GEP. Math Beauty, Undergraduate

MAT 316 Operations Research (3 credits)

The course will cover some of the basic models and techniques used in operations research. Topics include: linear programming, the simplex method, duality, network problems, transportation problems, and time permitting, game theory.

Prerequisites: MAT 226

Attributes: GEP. Math Beauty, Undergraduate

MAT 321 Probability (3 credits)

The first part of a two-semester sequence, this course includes discrete probability and counting methods, conditional probability and independence, Bayes' Theorem, discrete and continuous random variables, expectation, variance, special probability distributions, joint distributions of discrete random variables, marginal and conditional distributions, independent random variables, covariance and correlation, and distributions of functions of random variables.

Prerequisites: MAT 162

Attributes: GEP. Math Beauty, Undergraduate

MAT 322 Mathematical Statistics (3 credits)

Random samples, sample size, statistics and sampling distributions, the Central Limit Theorem, methods of point estimation including moment matching, percentile matching, maximum likelihood estimation, main properties of point estimators, asymptotic properties of MLE, evaluation of goodness of a point estimator, Rao-Blackwell theorem, UMVUE, interval estimation, hypothesis testing, power of tests, the Neyman-Pearson lemma, regression analysis, analysis of variance, categorical data analysis (Chi-square test). Data analysis projects will be assigned.

Prerequisites: MAT 213 and MAT 321

Attributes: Undergraduate

MAT 328 Design of Experiments (3 credits)

In this course we discuss proper design and analysis of experiments, including the role of randomization, selecting sample sizes, and allocating treatments to experimental units. Designs covered include completely randomized designs, designs with factorial treatment structure, random and mixed effects designs, complete and incomplete blocked designs, Latin squares, confounding, split plots, fractional factorials, and response surfaces. Examples and exercises are taken from a broad range of subject areas. Appropriate computer programs are used for analysis of real data sets.

Prerequisites: MAT 118 or MAT 128 or MAT 213 or DSS 210

Attributes: Undergraduate

MAT 332 Geometry (3 credits)

An axiomatic treatment of the foundations of geometry. Axioms of incidence, order, congruence, Bolyai- Lobachevsky parallel axiom, angle of parallelism. A rigorous development of selected topics in non-Euclidean geometry.

Prerequisites: MAT 155 or MAT 161

Attributes: GEP. Math Beauty, Undergraduate

MAT 334 Combinatorics & Graph Theory (3 credits)

Introduction to combinatorics and graph theory and to methods by which each theory is applied to the other. Topics include basic counting formulas; generating functions; the principle of inclusion-exclusion; counting labeled trees (Cayley's Theorem, Kirchhoff's Theorem, Prüfer's Theorem); directed Euler circuits; Pólya-deBruijn theory; Möbius inversion.

Prerequisites: MAT 162

Attributes: GEP. Math Beauty, Undergraduate

MAT 336 Logic & Foundations (3 credits)

Cantorian set theory and the crisis in foundations (Cantor's paradox, Russell's paradox); the intuitionist challenge and the formalist response; formal logic and meta mathematics (Propositional Calculus, Predicate Calculus, formal number theory); Goedel's incompleteness theorems of 1931.

Prerequisites: MAT 162

Attributes: GEP. Math Beauty, Undergraduate

MAT 340 Math Methods Phys Sci (3 credits)

The course condenses the material of several full-semester mathematics courses, such as complex analysis, Fourier analysis, and group theory, with the focus on mathematical methods used in the physical and related sciences.

Prerequisites: MAT 213

Attributes: GEP: Math Beauty, Undergraduate

MAT 370 Special Topics in Mathematics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MAT 403 Abstract Algebra (3 credits)

Group theory, including finite groups, subgroups, cyclic groups, permutation groups, group isomorphisms, and cosets; introduction to rings and fields, including integral domains, polynomial rings, unique factorization domains and Euclidean domains.

Prerequisites: MAT 250

Attributes: Undergraduate

MAT 404 Abstract Algebra II (3 credits)

A more in-depth treatment of rings and fields including integral domains, fields, field extensions, homomorphisms, and the insolubility of the quintic by radicals. Galois theory.

Prerequisites: MAT 403

Attributes: GEP: Math Beauty, Undergraduate

MAT 409 Real Analysis (3 credits)

Elementary topology of Euclidean spaces, including open, closed and compact sets; convergence of sequences and series; least upper bound axiom and its equivalents; sequences of functions, pointwise and uniform convergence, continuity, differentiation and integration of sequences.

Prerequisites: MAT 250

Attributes: GEP: Math Beauty, Undergraduate

MAT 410 Complex Analysis (3 credits)

Analytic functions; complex integration; singularities.

Prerequisites: MAT 213

Attributes: GEP: Math Beauty, Undergraduate

MAT 415 Differential Geometry (3 credits)

The local and global theory of curves and surfaces in Euclidean space. Topics include Frenet frames, orientation, geodesics, the second fundamental form, and Gauss curvature.

Prerequisites: MAT 213 and MAT 226

Attributes: GEP: Math Beauty, Undergraduate

MAT 418 Topology of Point Sets (3 credits)

Open and closed sets, closure and interior, continuity, metric spaces, connectivity, compactness; the Heine-Borel and Bolzano-Weierstrass Theorems. The Classification of Surfaces may also be covered.

Prerequisites: MAT 409

Attributes: Undergraduate

MAT 420 Convex Analysis & Optimization (3 credits)

This course covers affine and convex sets, cones, affine and convex functions, quasi-convex and pseudo-convex functions, convex optimization, linear and quadratic optimization, convex optimization algorithms and software, duality, applications to function approximation and interpolation, applications to statistical estimation and machine learning, Caratheodory's Theorem, extreme points and faces of convex sets, polyhedral convex sets and functions, and related topics.

Prerequisites: MAT 162 and MAT 226

Attributes: GEP: Math Beauty, Undergraduate

MAT 423 Applied Statistical Methods (3 credits)

Statistical models, design and analysis of experiments, regression, Monte Carlo methods, and other advanced topics in statistics.

Prerequisites: MAT 162

Attributes: GEP: Math Beauty, Undergraduate

MAT 470 Topics in Mathematics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

MAT 471 Independent Study (3 credits)

Students will study a topic in mathematics with a faculty mentor.

Attributes: Undergraduate

MAT 472 Independent Study (3 credits)

Students will study a topic in mathematics with a faculty mentor.

Attributes: Undergraduate

MAT 481 Data Science Capstone (1-3 credits)

The capstone course provides students with a comprehensive learning experience that integrates ideas and experiences gained from the three core disciplines of mathematics, statistics and computer science, and applies them to their chosen application domain. Working with a family advisor, students will engage in the process of solving a real-world data science problem.

MAT 491 Mathematics Internship I (1-3 credits)

The course goals are: to gain first-hand experience of the daily activities of professionals in mathematics and related fields, to verify an interest in a particular area of mathematics, to develop and hone skills required for mathematical professions, to establish contacts outside the academic community who will facilitate a career in mathematics. An internship journal and an academic paper are also required.

MAT 492 Mathematics Internship II (1-3 credits)

The course goals are: to gain first-hand experience of the daily activities of professionals in mathematics and related fields, to verify an interest in a particular area of mathematics, to develop and hone skills required for mathematical professions, to establish contacts outside the academic community who will facilitate a career in mathematics. An internship journal and an academic paper are also required.

MAT 493 Independent Research (3 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair and Associate Dean in order to register. Honors Research (6 credits) must be elected in junior year to allow adequate research time. Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair, Associate Dean and the Honors Program Director in order to register. Honors Students must complete this sequence.

Attributes: GEP: Math Beauty, Undergraduate

MAT 494 Independent Research (3 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair and Associate Dean in order to register. Honors Research (6 credits) must be elected in junior year to allow adequate research time. Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair, Associate Dean and the Honors Program Director in order to register. Honors Students must complete this sequence.

Attributes: GEP: Math Beauty, Undergraduate

MAT 704 Statistics for Research (3 credits)

This class covers statistical inference on two samples, design of experiments, repeated measures, analysis of covariance, multiple regression, categorical data analysis, and factor analysis.

Attributes: Doctoral, Graduate

Medical Health Informatics (MHI)

MHI 205 Digital Health (3 credits)

This course provides an overview of the evolving role of technology in the delivery of healthcare services at both the organizational and individual levels. Topics examined include the adoption of telehealth, increased virtualization of care settings, and role of the federal government in advancing technology use. Students gain exposure to common terms and build a vocabulary around computing services, privacy regulations, and the importance of information services in a healthcare setting.

Attributes: Undergraduate

MHI 301 Health Info Management Systems (3 credits)

A critical skill for health professionals is to be able to gather, organize, analyze and safely store important health information. This course provides an overview of healthcare information management and applications and technologies within healthcare organizations like the electronic health record (EHR).

Attributes: Undergraduate

MHI 550 Research Methods (3 credits)

Explores the history of health research, basic principles and types of research in order that health professionals will be able to critically evaluate research in their respective fields. This course is a combination of lecture, discussion and experiential learning designed to instill a critical understanding of the research process for application to clinical practice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 560 Health Informatics (3 credits)

A survey of the current use of information technology in the clinical and management practice for the healthcare delivery enterprise. Students will become familiar with the basic terminology, strategies, and utilization of IT as a key component in the delivery of patient care in a simulated environment.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 561 Digital and Connected Health (3 credits)

A review of how patient centric technologies play a role in health and wellness. Students will become familiar with emerging trends in remote patient monitoring, telehealth, mobile applications (apps) and other novel technologies.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 562 Database for Health Care (3 credits)

This course provides hands on use of database management tools and structured query language (SQL). Specific applications will be explored with an emphasis placed on the practice of organizing, identifying, and uniting disparate sources of health care data.

Prerequisites: MHI 560 or HAD 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 563 Data Analysis for Health Care (3 credits)

Health care systems increasingly create and capture data necessitating a focus on data analysis for quality improvement. This course builds on data organization skills with an emphasis on analyzing process, outcomes, and relations captured in the health record and across other health related data elements. Students will use data visualization tools paired with quantitative data driven techniques which aid in addressing challenges associated with the Triple Aim in healthcare.

Prerequisites: (MHI 560 or HAD 560) and (MHI 562 (may be taken concurrently) or HAD 562 or DSS 625 (may be taken concurrently) or DSS 630 (may be taken concurrently))

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 564 Privacy&Security: Health Care (3 credits)

Regulatory and ethical condensations require healthcare practitioners to protect patient information. This course presents both the regulatory framework, technical requirements, and administrative responsibilities to adhere to established laws governing the collection and use of protected health information (PHI).

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 565 Health Data Standards (3 credits)

Health information requires an understanding of various data standards to allow for the structure and exchange of health data. This course explores the approach and need for standards in the areas of eXtensible Markup Language (XML), laboratory information systems, radiology information systems, and electronic health records. There is a strong focus on the development and implementation of widely recognized clinical documentation formats using HL7 and FHIR based standards.

Prerequisites: MHI 560 or HAD 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 670 Special Topics in MHI (3 credits)

Content varies for ongoing developments in the field of health informatics. The instructor will provide the course description.

Prerequisites: MHI 560 or DSS 610

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

MHI 700 Health Informatics Capstone (3 credits)

The capstone course is the final class for students with an interest in the field of health informatics. Students will utilize skills and competencies gained across the curriculum to design strategies and approaches which help to leverage technology to deliver healthcare. Students will evaluate systems and work in coordinated groups based on the persona of senior healthcare executives

Prerequisites: (MHI 560 or HAD 560) and (MHI 561 or HAD 561) and (MHI 550 or HSV 550) and (MHI 562 or DSS 625 or DSS 630 or CSC 621 or MHI 564 or HAD 564)

Attributes: Graduate

Medical Lab Science (MLS)

MLS 102 MLS Orientation II (1 credit)

An orientation of the field of Clinical Laboratory Science. Professional organizations for the MLS professional, laboratory departments, and employment expectations will be discussed. Medical terminology will be assessed. An independent tour of one of the program's affiliate hospitals and report is necessary to complete this course.

Attributes: Undergraduate

MLS 201 Med Lab Science Seminar (1 credit)

Emphasis is on reading and discussion of current journal articles in medical laboratory science and student preparation of a research paper. Review of application for clinical rotation positions, including resume preparation and interviewing skills.

Prerequisites: (MLS 102 or MT 102)

Attributes: Undergraduate

MLS 401 Fund Oper of Clinical Lab (2 credits)

The learner will be introduced to clinical laboratory techniques including the requisites of medical terminology, ethical behavior, personal safety, specimen integrity and quality assurance.

MLS 402 Clin Parasitology and Mycology (2 credits)

The learner will study medically significant parasites and fungi including specimen collection and safe handling, isolation and growth requirements and methods of identification for diagnosis, disease causation and treatment.

Prerequisites: MLS 401

MLS 411 Clinical Microbiology I (4 credits)

The learner is provided with a comprehensive study of aerobic bacteria involved in human disease encompassing specimen collection, handling, culture requirements, current identification methods and antimicrobial testing used in the clinical laboratory.

MLS 412 Clinical Microbiology II (4 credits)

The learner will continue the study of clinically important microorganisms including fastidious bacteria and viruses, addressing identification by molecular diagnostic procedures and incorporating a body system approach.

Prerequisites: MLS 411

MLS 421 Clinical Hematology I (4 credits)

Hematology is the study of the formed elements of the blood. This course introduces leukocytes, erythrocytes, thrombocytes and hemostasis. Diseases and disorders of erythrocytes will be analyzed as causes of anemia.

MLS 422 Clinical Hematology II (4 credits)

This course builds upon Clinical Laboratory Hematology I and includes the study of hematology instrumentation, special tests, leukocyte disorders and abnormalities in hemostasis. Analysis of body fluid production and function is included.

Prerequisites: MLS 421

MLS 431 Medical Lab Chemistry I (4 credits)

The course presents general principles of the chemical analysis of blood and body fluids, including instrumentation and quality control. Principles of testing assays and the physiologic/biochemical changes occurring in disease states are covered as they relate to the specific analytes discussed.

MLS 432 Medical Lab Chemistry II (3 credits)

Building on MLS 431, this course focuses on analyses used to assess major organ system function. The principles of testing methods and the physiologic and biochemical changes that occur in disease states are covered. Other applications of testing in the chemistry lab are also covered.

Prerequisites: MLS 431

MLS 441 Med Lab Immunology/Serology (2 credits)

The course examines aspects of the immune response and the principles of serologic procedures, with attention to disorders of the immune response and the serological diagnosis of infectious diseases.

MLS 442 Med Lab Immunohematology (3 credits)

Immunohematology applies the concepts of blood group antigens and antibodies to transfusion protocols and certain clinical disease states. Emphasis is placed on integrating theory of testing procedures with their clinical significance. The transfusion process is covered from donor suitability and blood collection/component preparation through pretransfusion and compatibility testing.

Prerequisites: MLS 441

MLS 451 Clinical Lab Practicum I (3 credits)

The MLS student will be introduced to the clinical laboratory and assigned to the first of four departments. Students will apply classroom theory to practice under direct supervision of a preceptor.

MLS 452 Clinical Lab Practicum II (3 credits)

MLS students will continue to develop critical thinking skills, in technique and instrumentation, required to accurately assess patient results while under the direct supervision and guidance of a preceptor.

Prerequisites: MLS 451

MLS 453 Clinical Lab Practicum III (3 credits)

MLS students will relate classroom concepts to laboratory analysis of patient specimens and recognize anomalies. Students will become more autonomous while developing troubleshooting skills and techniques from preceptors.

Prerequisites: MLS 452

MLS 454 Clinical Lab Practicum IV (3 credits)

By the end of this last clinical rotation the MLS student will display the characteristics of an entry level laboratory professional incorporating integrity and reliability, performing work under minimal supervision.

Prerequisites: MLS 453

MLS 461 Lab Leadership Mgmt Skills (4 credits)

This interactive course is designed to foster the skills and knowledge required to become managers and leaders, with an emphasis on the clinical laboratory environment. Topics of current focus and relevance in the MLS field will be presented.

MLS 471 Medical Lab Leadership Skills (2 credits)

This interactive course is designed to foster the skills and knowledge required to become managers and leaders, with an emphasis on the clinical laboratory environment. Topics of current focus and relevance in the MLS field will be presented.

Modern and Classical Cultures (MCC)

MCC 150 First Year Seminar (3 credits)

The focus of this first year seminar varies by section. Please refer to the course text to determine the focus of a particular section.

Attributes: First-Year Seminar, Latin American Studies Course, Undergraduate

MCC 360 Space & Place in Col Latin Am (3 credits)

The overarching goal of this course is that students deepen their understanding of Spanish American cultures - and cultures in general - by relating physical space, places and their representations to the diverse human values, experiences and worldviews that shaped them during the colonial period. Examples include sacred and mythical places, places of labor such as silver mines and sugar mills, urban design and plazas, Jesuit reductions (missions), as well as the representation of place through toponyms and maps. We consider multiple perspectives (i.e. Amerindian, Spanish and Afro-American) on the same space or place, and we engage in reflective discussion about the diverse value systems, beliefs, social dynamics and physical conditions that shaped such places over time. These analyses lead to discussions about how colonial legacies and colonial places have been experienced in recent decades through visual art, film and especially tourism. In these discussions we contemplate how we, personally, want to see the colonial past and what this helps us to understand about ourselves. This course is taught in English and all required materials are available in English or with English sub-titles. This course counts toward the minor in Latin American Studies. No pre-requisite though 'Forging the Modern World' and ENG 102 are recommended.

Restrictions: Enrollment limited to students with the Honors Program Student attribute.

Attributes: GEP: Art/Literature, Honors Course, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

MCC 370 Special Topics (3 credits)

The focus of this course varies by section. Please refer to the course text to determine the focus of a particular section.

Attributes: Undergraduate

Music, Theatre & Film (MTF)

MTF 141 Guitar Class for Beginners (1 credit)

This class is intended as an introduction to acoustic and classical guitar techniques employed in contemporary guitar styles. The focus of this course will involve learning basic open chords, learning to read and play music on the guitar, bar chords, and basic fingerstyle technique. The course will also cover the fundamental music theory necessary for playing songs and basic fret board knowledge. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 142 History of Rock and Pop (3 credits)

This course examines the history of popular music in the English-speaking world from the mid twentieth century to the present day. Genres examined include swing, doo-wop, rock and roll, soul, funk, disco, heavy metal, and punk. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Music Industry Course, Undergraduate

MTF 143 Music in Film (3 credits)

This course focuses on the ways music functions in narrative film. In the first weeks, students will develop analytical skills to describe the ways music can enhance, comment on, undermine, and direct a viewer's interpretation. The remainder of the semester will follow a generally chronological structure, focusing on influential composers and directors, theoretical writings, and the wide variety of twentieth-century and twenty-first musical styles used in soundtracks. Class discussions and writing assignments will guide students in the study of the interlocking histories of music, film, politics, and culture. This course is designed for all students. Previous musical training is not required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 144 Introduction to Music Therapy (3 credits)

This course is an introduction to the field of music therapy. Students will study the history, theory, practice, and applications of music therapy for a variety of clinical populations. They will learn about ongoing research in the field, acquiring a broad understanding of the current state of practice and research. The course is open to all students who are interested in learning more about the field of music therapy. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 150 First Year Seminar (3 credits)

The First-Year Seminar is designed to introduce students to learning in a college context. First-Year Seminars focus in depth on a question or topic of disciplinary or interdisciplinary interest. By means of its specific focus, the seminar will explore the thinking, research, and writing practices in a particular field. Topics vary according to individual instructors.

Attributes: First-Year Seminar, Undergraduate

MTF 151 Music Fundamentals (3 credits)

A study of elements of music including notation, rhythm, scales, intervals, melody, harmony, and form. To facilitate reading skills, class exercises in ear training are included. Previous musical training unnecessary. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Music Industry Course, Undergraduate

MTF 152 Music Appreciation (3 credits)

This course is a survey of music from the Middle Ages to the Twentieth Century. Emphasis is placed on the elements of music, styles of major historical periods, and the lives and works of representative composers. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Undergraduate

MTF 153 Vocal Performance (1 credit)

In this course you will learn to professionally train your singing voice through breath management, phrasing, diction, performance practice, and accurate musicianship. Students will receive one individual sixty minute lesson each week. This course may be repeated for credit. Students should be able to read music. An audition and permission of the instructor is required. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 154 Piano Performance (1 credit)

Students will receive one individual piano lesson each week, between 30 and 60 minutes in length. This course may be repeated for credit. Students must be able to read music. An audition and permission of the instructor are required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Undergraduate

MTF 155 Instrumental Performance (1 credit)

Students will receive one individual instrumental lesson each week, between 30 and 60 minutes in length. This course may be repeated for credit. Students must be able to read music. An audition and permission of the instructor are required. Registration by permission of the instructor only. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Undergraduate

MTF 156 Intro to World Music (3 credits)

This course introduces students to the traditional music of cultures around the world, including music of India, Indonesia, Latin America, Africa, and the Middle East. Students will learn to listen critically and to articulate their observations about the music of numerous regions and societies. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Diversity Course, GEP: Art/Literature, Irish Studies Course, Undergraduate

MTF 157 Western Music Hist: MidAge-1750 (3 credits)

This course considers the history of Western music from the Middle Ages to the end of the Baroque Period, focusing on the relationship between historical, social, and cultural currents and the development of music. Students will acquire a framework for thinking critically about music and articulating their observations, and they will learn to recognize the musical characteristics of important styles, genres, and historical periods. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Music Industry Course, Undergraduate, GEP: Writing Intensive

MTF 158 Western Music Hist: 1750-Pres (3 credits)

This course considers the history of Western Music from the second half of the eighteenth century to the present day, focusing on the relationship between historical, social, and cultural currents and the development of music. Students will acquire a framework for thinking critically about music and articulating their observations and learn to recognize the musical characteristics of important styles, genres, and historical periods. This course welcomes students who have not taken MTF 157, Western Music History: The Middle Ages to 1750. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Music Industry Course, Undergraduate

MTF 159 Contemporary Music (3 credits)

An investigation of the chief developments in the concept and style of music which have occurred in the Twentieth century. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 161 Introduction to Theatre (3 credits)

This course examines major traditional and modern plays with emphasis upon the styles and conventions which govern the relationship between drama and its audience; relevance of these styles to the work of actors, directors, and designers. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 162 History of Broadway Musical (3 credits)

This course provides a basic overview of the historical developments of musical theatre as an uniquely American art form, and the study of the structures and genres from early Twentieth Century influences through the "Golden Age" of musicals to contemporary musical theatre. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 163 Stagecraft (3 credits)

An introduction to technical theater, this course will provide the student with a background in the tools, materials, techniques, and processes used in the execution of theatrical designs. Scenery, lighting, props, sound, rigging, and scenic construction and painting will be covered. This course includes a production/crew component as a means of applying the course material in a production setting. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 170 Special Topics & Indep Study (3 credits)

Student majors may pursue investigation of topics beyond those listed in the catalog. Prior approval by the chair and faculty mentor is required. Course number dependent on relevant level of coursework. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 181 Filmmaking Methods (3 credits)

An introduction and overview to the complete production cycle. Each class session is dedicated to a different department - writing, producing, directing, design, cinematography, grip and electrical, location sound, editing, digital post, audio post, marketing and distribution - designed to both introduce and involve students in the breadth of the production experience. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature

MTF 186 Acting for the Camera (3 credits)

This course provides on-camera experience for students in order to develop their technique for on-camera acting for film, television and commercials. Special emphasis on audition techniques for on-camera auditions and creating an individual reel for audition purposes. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 191 Introduction to Film (3 credits)

This course is an introduction to the study of cinematic form and style, taking cinema to be located at the confluence of art, industry and technology. This course examines the cultural meanings of cinema as well as its aesthetic construction, including such elements as narrative structure, cinematography, design, editing and sound. Selections from historical and contemporary films will be viewed and analyzed. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 192 History of Narrative Film (3 credits)

Providing an overview of significant works that exemplify film as visual media, this course is a survey of movements and makers that helped shape the evolution of screen narrative. Storytelling techniques and trends will be explored from early, spectacle-driven serial films through the postmodern, CGI-driven productions of today. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 193 History of Television (3 credits)

This course is designed to give students a comprehensive understanding of television in the United States. It will provide deep examinations of its origins, development, design, purpose of programming, and the variety of genres and their role in the formation of our ideas about history, nation, and cultures. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 194 Black American Cinema (3 credits)

This course will provide an analytical and critical examination of the films created by and starring influential Black American entertainers in film's 100+ year history. Possible areas of study include the films of selected directors and performers, Black American filmmaker movements, Black horror, Black American women, 1970s Black American social realism films, Blaxploitation, 1980s Black star power comedies, 1990s urban dramas, and Black folklore drama. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Diversity, GEP: Diversity Course, GEP: Art/Literature, Undergraduate

MTF 195 Genre Film Studies (3 credits)

A critical and analytical examination of the work of selected film genres that have shaped cinema and cinematic culture from the silent era to the present day. Example course topics include horror, sci-fi, thriller, teen films, Westerns, documentary, and melodrama. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 241 Basic Conducting (3 credits)

This course will focus on the basic technical aspects of conducting a musical ensemble. Emphasis will be placed on learning how to communicate musical ideas to an ensemble using traditional conducting gestures. Included in the course will be the study of patterns, phrasing, and rehearsal techniques. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 251

MTF 251 Music Theory I (3 credits)

This course introduces the student to the practice of tonal harmony. Students will learn the principles of chord construction and voice leading, examine the ways in which chords function in tonal music, and be able to compose effective progressions in four-part vocal style. Students must demonstrate to the instructor a familiarity with treble and bass clef notation and basic rhythmic notation. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 151

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Music Industry Course, Undergraduate

MTF 252 Music Composition I (3 credits)

In this course students will complete structured projects in instrumental composition. Contemporary and traditional approaches to melody, harmony, rhythm, form and timbre will be explored. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 351

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 253 Choral Music (3 credits)

A study and performance of choral music with emphasis on vocal development and performing technique. Prior choral experience unnecessary. Participation in concerts and a term paper required. Prerequisite: Participation for one semester in University Singers prior to enrollment. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 254 Jazz in Performance (3 credits)

A study and performance of the repertoire of the contemporary jazz ensemble with emphasis on the history of contemporary "BIG BAND" jazz and the mastery of its performance technique and stylistic interpretation. Participation in the fall and spring concert series and several short papers required. Participation in three semesters of the one credit MTF 255 Jazz Band course, including the fall semester prior to enrollment, along with approval from the instructor and department chair are required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 255 Ensemble Performance (1 credit)

Students are placed in ensembles with other instrumentalists (making duos, trios, etc). Their ensemble learns at least one substantial musical work, practicing independently and as a group, and receives weekly in-depth coachings from the professor. The ensemble performs in a recital at the end of the semester. Registration by permission of the Instructor only. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Undergraduate

MTF 256 Intro to Music Technology (3 credits)

An introductory course leading to an understanding and creative application of the elements of music technology, including MIDI, digital audio recording and editing, notation software, and sound design. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 251

Attributes: Undergraduate

MTF 257 American Music (3 credits)

This course examines music produced in the United States from the early Colonial period to the present day. Students will consider a variety of styles, with an emphasis on folk, art, and African-American music. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: American Studies Course, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Music Industry Course, Undergraduate

MTF 258 Major Composers (3 credits)

Major composers courses are semester-long studies of a single composer and their contributions to music history. Students read a biography of the composer and study several of their pieces in detail. Examples of courses in the Major Composers series include Ludwig van Beethoven and Johann Sebastian Bach. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate

MTF 261 Theatre Performance Practicum (3 credits)

Rehearsal and performance of a campus theatre production (produced by SJU Theatre Company and directed by a faculty director) with the student in the role of actor or stage manager. Comprehensive study of both the rehearsal and performance processes. In order to register for the course, the production must be the third campus production in which the student has served as cast member or stage manager. Departmental approval is required in order for the student to register for the course. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 262 Theatre Production Practicum (3 credits)

A practical application of theatre production studies where the student works as a stage manager or run crew chief on a production produced by the Department of Music, Theatre & Film under the guidance of a faculty Director. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Undergraduate

MTF 263 Acting I (3 credits)

Study of the fundamentals of the acting process based upon Stanislavsky's system of acting. Course culminates in scene study preparation and performance of contemporary scenes. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 264 Acting II (3 credits)

Exploration of various methods and styles of acting; further development of techniques of voice, movement, characterization, script analysis, emotion memory, comic timing, and monologues. Extensive laboratory work in scene performance. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 263

Attributes: GEP: Art/Literature

MTF 265 Directing for the Stage (3 credits)

Study of the basic techniques of play direction, including composition, picturization, play selection, auditions and casting, blocking and staging, including historic perspectives on notable directors. This course culminates in student-directed scenes from modern and contemporary plays. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 266 Theatre History (3 credits)

This course examines the history of theatre from the Ancient Greek period through contemporary theatrical forms of the 21st century, focusing on major periods of theatre development including the Italian Renaissance, the Elizabethan age, Restoration Drama as well as the modern European and American theatre movements. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 267 Prod Design: Theatre & Film (3 credits)

Students study the basic elements of theatrical/ film production in scenery and lighting. An intensive hands-on lab is required as part of completion of the course. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 268 Musical Theatre Performance (3 credits)

Practice in performance techniques used in musical theatre auditions as well as practice in scene study from the musical theatre repertoire. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 269 Musical Theatre Dance Styles (3 credits)

A performance/studio course in dance in which a variety of basic technique in musical theatre dance styles are examined including basic jazz as well as stylistic interpretations of select prominent music theatre choreographers (Jerome Robbins, Bob Fosse, Michael Bennett, etc.). Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature

MTF 270 Special Topics & Indep Study (3 credits)

Student majors may pursue investigation of topics beyond those listed in the catalog. Major GPA of 3.0 required, as is prior approval by the chair and faculty mentor. Course number dependent on relevant level of coursework. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 281 Producing & Business of Film (3 credits)

This hands-on course addresses the inner workings of creative producing: business structures, project origination, building a team, acquiring production resources, budgeting and scheduling, managing day-to-day production and incorporating marketing tools. Additionally, the course will address how different business models may affect films' content, style, themes and inclusiveness. Music, Theatre, & Film fee of \$150.00 applies to this course.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: GEP: Art/Literature

MTF 282 Screenwriting (3 credits)

An intensive workshop in writing for the screen, focusing primarily on the short form. Through the study of character and conflict, structure and setting, and rudimentary rehearsal and performance of draft scene-work, students will develop their own short pieces, culminating in a revised script and a visualized shooting plan ready to move into production. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: ENG 101

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

MTF 283 Series Screenwriting (3 credits)

Each student will first develop their own series concept, show bible, and pilot. Students will then work in groups to script episodes for selected shows. Top work will be selected for production in MTF 381 Episodic TV/ Web Series Production. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate, GEP: Writing Intensive

MTF 284 Digital Filmmaking (3 credits)

An introductory creative film production workshop that focuses upon visual storytelling, camera operation, digital editing and sound. Students will develop their personal creativity as they complete film projects in narrative and documentary modes, incorporating elements and techniques from music and theatre. Students will also view relevant selections from historical and contemporary films. Music, Theatre, & Film fee of \$150.00 applies to this course.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 285 Short Film Production (3 credits)

Building on the skills developed in Digital Filmmaking (MTF 284), this course is an intermediate-level collaborative workshop in producing the short film. There is a particular emphasis upon theoretical and technical lighting and camera operation, shot structure, and production design. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284

Attributes: GEP: Art/Literature, Undergraduate

MTF 286 Documentary Film (3 credits)

A hybrid course in the study and making of documentary film, students will explore the ethical issues of representation, identity, truth, argument, and advocacy through the examination of historically significant work, consideration of contemporary practice, and the execution of their own documentary project. No prerequisite, however, MTF 284 Digital Filmmaking is recommended. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, GEP: Art/Literature, Undergraduate

MTF 287 Commercial Production (3 credits)

This course is a workshop focusing on the production of commercial and industrial projects. Working in small groups, students will create advertisements, PSAs and other client-based media. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 288 Genre Film Workshop (3 credits)

This course focuses upon the conventions, styles, makers, themes, and social commentary within such popular film genres as sci-fi, fantasy, thriller, horror, samurai, film noir, and Westerns. After conducting analytical studies, students will apply their knowledge to completing creative projects. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 291 American Film (3 credits)

This course is a selected study of the intersection of American culture and the cinema. No prerequisites, MTF 191 Introduction to Film recommended. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: American Studies Course, GEP: Art/Literature, Undergraduate

MTF 292 European Cinemas (3 credits)

A selected study of cinematic movements and filmmakers from European nations, specifically in how they both reflect and exemplify the culture in which they are produced. Possible areas of study include German Expressionism, Russian Formalism, the French New Wave, Italian Neo-Realism, New German Cinema and British Social Realism. No prerequisites, MTF 191 Introduction to Film recommended. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 293 Five Films (3 credits)

From films ignored at their inception to widely-regarded masterpieces to movies of unique personal and cultural influence, this course examines cinema through the unique lens of five films, providing a deep dive into the historical context, development & production, popular & critical reception, and influence & legacy of movies that have had a lasting impact. No Prerequisites, MTF 191 Introduction to Film and/or MTF 192 History of Narrative Film recommended, may be repeated for credit. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature, Undergraduate

MTF 294 Non-Western World Cinemas (3 credits)

A selected study of emerging cinematic movements and filmmakers from around the globe, that have pushed beyond the boundaries of established cinematic norms and innovated what film can be in its relation to culture and society. Possible areas of study include the cinemas of the Middle East, Africa, Asia, and Latin America. No prerequisites, MTF 191 Introduction to Film recommended. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: CCC: F&P Arts, Design & Creative, CCC: Mission: Global Citizenship, GEP: Diversity Course, GEP: Art/Literature, GEP: Non-Western Studies, Undergraduate

MTF 295 Major Figures in Film (3 credits)

A critical and analytical examination of the work of selected directors and producers who have had a profound impact on the evolution of contemporary cinema. No prerequisites, MTF 191 Introduction to Film recommended. May be repeated for credit under rotating iterations. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: Gender Studies Course, GEP: Art/Literature

MTF 351 Music Theory II (3 credits)

This course serves as a continuation of MTF 251 Music Theory I. Topics include diatonic harmony, formal design, and an introduction to chromatic harmony. Students will further develop their skills in both written theory and ear-training. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 251

Attributes: CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

MTF 352 Music Composition II (3 credits)

In this course students will complete structured projects in both vocal and instrumental composition. Students will engage in analysis of selected works as well as the study of instrumental resources. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 252 and MTF 351

Attributes: GEP: Art/Literature, Undergraduate

MTF 353 Advanced Vocal Performance (3 credits)

In this course, advanced vocalists take weekly lessons with a member of the studio faculty, learning four-six solo works from three different historical periods, including the twentieth or twenty-first century. They also participate in University Singers. In addition to their lessons, individual practice, and choir, students are required to give an outreach performance in a community venue, such as a nursing home or hospital. MTF 359 is open only to advanced singers who have already completed three semesters of studio lessons at SJU and who have the permission of the instructor to enroll. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature

MTF 354 Advanced Piano Performance (3 credits)

In this course, which is open to advanced pianists who have already completed three semesters of lessons in a piano studio at SJU, students dedicate themselves to concentrated piano study. They study works from at least three historical periods, which they present formally at their end-of-semester jury, and take one or more private lessons each week, practicing an average of fourteen hours per week. Students perform in the studio recital at the end of the semester and give one off-campus, outreach performance in a hospital, nursing home, local school, or similar community venue. Prerequisites: Enrollment in MTF 154 Piano Performance for 3 semesters and permission of the instructor are required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP: Art/Literature

MTF 355 Adv Ensemble Performance (3 credits)

In this course, advanced instrumentalists or vocalists participate in three chamber groups, coached by member(s) of the music faculty. They learn three different musical works, including at least one from the twentieth or twenty-first century, and participate in the studio recital. In addition, students are required to give an outreach performance in a community venue, such as a nursing home or hospital. Prerequisites: Advanced performers who have already completed 3 semesters of Ensemble Performance at SJU and who have the permission of the instructor to enroll. Registration by permission of the Instructor only. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP. Art/Literature, Undergraduate

MTF 357 Music Theory III (3 credits)

This course serves as a continuation of MTF 351 Music Theory II. Topics include borrowed chords, modulation to distant keys, enharmonic relationships, and chromatic harmony. Emphasis on part-writing, composition, and analysis. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 351

Attributes: CCC: F&P Arts, Design & Creative, GEP. Art/Literature, Undergraduate

MTF 359 Adv Instrumental Performance (3 credits)

In this course, advanced instrumentalists take weekly lessons with a member of the studio faculty, learning three solo works from three different historical periods, including the twentieth or twenty-first century. They also participate in a collaborative ensemble with another student musician. In addition to their lessons and individual practice, students are required to give an outreach performance in a community venue, such as a nursing home or hospital. Prerequisites: Advanced instrumentalists who have already completed 3 semesters of studio lessons at SJU and who have the permission of the instructor to enroll. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 363 Styles of Acting (3 credits)

An advanced acting course that explores scene study performance of complex scenes including classic works (Shakespeare, Moliere) and plays from the modern period (August Strindberg, Tennessee Williams and Sam Shepard). Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: (MTF 263 or MTF 264)

Attributes: GEP. Art/Literature, Undergraduate

MTF 370 Special Topics (3 credits)

Special Topics courses are upper-level classes on a variety of subjects in Music History. These courses synthesize score analysis, close reading of musicological literature, critical listening, and discussion in a stimulating seminar environment. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 251 and MTF 351 and MTF 157 and MTF 158

Attributes: GEP. Art/Literature, GEP. Writing Intensive

MTF 381 Episodic Series Production (3 credits)

Building on the skills developed in MTF 284 Digital Filmmaking and working from a show developed in MTF 283 Series Screenwriting, this course is a collaborative workshop in producing an episodic series. Students will rotate crew positions on each episode of the show, producing installments suitable for campus and public broadcast. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284

Attributes: GEP. Art/Literature, Undergraduate

MTF 382 Advanced Screenwriting (3 credits)

Building on the work of MTF 282 Screenwriting and/or MTF 283 Series Screenwriting, students will develop and write either a feature film script or a long-form series bible, pilot, and tv spec script. May be repeated for credit. May be taken as an Independent Study. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 282 or MTF 283 or ENG 344

Attributes: GEP. Art/Literature

MTF 383 Directing for Film/TV (3 credits)

An advanced workshop in the practices and techniques of screen directing. Students will explore script breakdown, visualization and storyboarding, casting and working with actors, blocking and set-direction through the analysis, direction and production of class projects. Course may be taken as an Independent Study. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 282 and MTF 284

Attributes: CCC: F&P Arts, Design & Creative, GEP. Art/Literature, Undergraduate

MTF 384 Advanced Light, Camera, Design (3 credits)

An advanced workshop in shaping the aesthetics of the image. Considering the image as a confluence of both production design and cinematography, students will explore how what is in front of the camera creates meaning as much as how it is lit and captured. Alongside the theoretical and technical skill of lighting and camera operation, students will perform script analysis for aesthetic direction and design, as well as working beyond illumination toward the art of cinematography. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284 or ART 173

Attributes: GEP. Art/Literature

MTF 385 Sound Design (3 credits)

An advanced workshop in the skills of film sound recording, editing and mixing. This course examines the fundamentals of sound gear and technology, location and soundstage recording techniques, and the creation of film soundtracks, including dialogue editing, sound effects, automated dialogue replacement (ADR), music editing and mixing to picture. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284

Attributes: GEP. Art/Literature, Undergraduate

MTF 386 Editing & Post-Production (3 credits)

An advanced workshop in the necessary skills of post-production and the required workflow of moving a project toward delivery. Topics include advanced techniques in non-linear editing, the demands of various video formats, digital video effects, compositing, color correction and delivery across multiple platforms. Course may be taken as an Independent Study. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284

Attributes: GEP. Art/Literature

MTF 388 Documentary Workshop (3 credits)

An advanced workshop in the planning and production of documentary film. Students will conceive and execute a project of their own design while exploring such issues as collaborative design and production, cross-cultural investigation, documentary ethics and empowerment, and community and individual representation. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 284

Attributes: GEP. Art/Literature

MTF 389 Professional Production Studio (3 credits)

A participatory workshop in the production of a professional media project. Projects will be selected by merit or university need, produced and directed by the instructor, and funded through the department and university. Students will have the opportunity to work on a live set and participate according to their ambition, ability and experience. May be taken as an Independent Study. Music, Theatre, & Film fee of \$150.00 applies to this course.

Prerequisites: MTF 181 or MTF 282 or MTF 284

Attributes: GEP. Art/Literature, Undergraduate

MTF 391 Film Theory & Criticism (3 credits)

An advanced course in the study of the critical trends and theoretical positions that have influenced, enlightened and framed the creation and critique of cinema throughout its first century.

Prerequisites: MTF 191

MTF 392 Special Topics in Film (3 credits)

A study of film/tv in either production or studies beyond those listed in the catalog.

Attributes: GEP. Art/Literature, Undergraduate

MTF 470 Special Topics & Indept Study (3 credits)

Student majors may pursue investigation of topics beyond those listed in the catalog. Major GPA of 3.0 required, as is prior approval by the chair and faculty mentor. Course number dependent on relevant level of coursework. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 491 Internship (3 credits)

Junior and Senior MTF majors may broaden their perspective by completing an approved internship in Music, Theatre, or Film/TV. Students are expected to spend six to eight hours per week on site, and to maintain a weekly journal of their experiences and to secure a report by their immediate supervisor at mid semester and upon completion of the work. Prior approval by the chair is required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP. Art/Literature, Music Industry Course, Undergraduate

MTF 492 Internship: Music/Theatre/Film (3 credits)

Junior and Senior MTF majors may broaden their perspective by completing an approved internship in Music, Theatre, or Film/TV. Students are expected to spend six to eight hours per week on site, and to maintain a weekly journal of their experiences and to secure a report by their immediate supervisor at mid semester and upon completion of the work. Prior approval by the chair is required. Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 493 Indep Prj: Mus, Theat, Film I (3 credits)

Students pursuing advanced independent projects, especially those in connection with departmental or university honors, may register for these courses under the direct mentorship of department faculty. Prior approval of both faculty mentor and chair required. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP. Art/Literature, Music Industry Course, Undergraduate

MTF 494 Indep Prj: Mus, Theat, Film II (3 credits)

Music, Theatre, & Film fee of \$150.00 applies to this course.

MTF 495 Senior Project Development (3 credits)

A student majoring in either Music or Theatre & Film must execute a supervised senior project with acts as a capstone experience on their work in the department. Working closely with their faculty mentor, the student will prepare a major piece of creative or critical work (composition, performance, film, screenplay, or thesis) inclusive of a public presentation in an appropriate venue. Depending on the scope and nature of the project, students will complete the work in either one or two semesters decided in consultation with the faculty mentor and with permission of the chair. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP. Art/Literature, Undergraduate

MTF 496 Senior Project (3 credits)

A student majoring in either Music or Theatre & Film, must execute a supervised senior project which acts as a capstone experience on their work in the department. Working closely with their faculty mentor, the student will prepare a major piece of creative or critical work (composition, performance, film, screenplay, or thesis) inclusive of a public presentation in an appropriate venue. Depending on the scope and nature of the project, students will complete the work in either one or two semesters decided in consultation with the faculty mentor and with permission of the chair. Music, Theatre, & Film fee of \$150.00 applies to this course.

Attributes: GEP. Art/Literature, Undergraduate

Neuroscience (NSC)

NSC 170 Special Topics in Neuroscience (3 credits)

Concentrated focus on a selected topic in Neuroscience. Topic and content vary from semester to semester.

Attributes: Undergraduate

NSC 190 Neuroscience Orientation (1 credit)

Introduction to the neuroscience program, including current developments and future prospects. Designed to prepare students for current studies and future careers. Required for all first-year neuroscience students; open to all interested students.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

NSC 205 Introduction to Neuroscience (3 credits)

Introduction to neuron structure and function, synaptic transmission, organization of the nervous system, brain-behavior relationships, and current neuroscience methods.

Prerequisites: BIO 102 or BIO 119 or BIO 133 or PSY 201

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

NSC 206 Intro. to Neuroscience II (3 credits)

This course focuses on the biological foundations of behavior and cognition. Fundamental methods and processes of the behavioral neuroscience will be emphasized including motivation, emotion, language, attention, memory, and mental illness.

Prerequisites: (NSC 205 or BS 260 or PS 260 or NS 260) and (PSY 100 (may be taken concurrently) or PSY 101 (may be taken concurrently) or PS 101 or PS 111)

Attributes: Undergraduate

NSC 270 Special Topics in Neuroscience (3 credits)

Concentrated focus on a selected topic in Neuroscience. Topic and content vary from semester to semester.

Attributes: Undergraduate

NSC 340 Intro: Neuropsychopharmacology (3 credits)

This course will provide a working knowledge of the neurobiological and neurochemical basis of behavior and the mechanism by which drugs influence synaptic neurotransmission to alter behavior and function in neurologic and psychiatric disorders.

Prerequisites: NSC 205 or PSY 205 or PSY 201 or BIO 205 or BS 260 or BS 206 or BS 311 or NS 260 or PC 303

Attributes: Undergraduate

NSC 370 Special Topics in Neuroscience (3 credits)

Concentrated focus on a selected topic in Neuroscience. Topic and content vary from semester to semester.

Attributes: Undergraduate

NSC 394 Independent Study I (1-3 credits)

The chief purpose of the Independent Study Project is for the student to acquire knowledge or skills in a particular area of neuroscience, typically in the form of a literary research project, and to produce a summary report/poster/presentation of some kind. The content, format, and final product of the Independent Study is negotiated between student and faculty mentor. Permission of faculty instructor and the Neuroscience Program Director are required.

Prerequisites: NSC 205 or NSC 206

Attributes: Undergraduate

NSC 395 Independent Study II (1-3 credits)

The chief purpose of the Independent Study Project is for the student to acquire knowledge or skills in a particular area of neuroscience, typically in the form of a literary research project, and to produce a summary report/poster/presentation of some kind. The content, format, and final product of the Independent Study is negotiated between student and faculty mentor. Permission of faculty instructor and the Neuroscience Program Director are required.

Prerequisites: NSC 394

Attributes: Undergraduate

NSC 425 Biophysics of the Brain (3 credits)

This course introduces biophysical models of the brain and the nervous system functioning. In particular the physics of the neocortex is presented through the analysis of EEG studies. Simulations with software packages are employed to illustrate with various examples the models and their results. Linear electrical analogs and some basics of neural network theory are part of the course content. Elements of Biophysics of consciousness are also presented and a set of case studies is analyzed and discussed.

Prerequisites: PY 202 or PY 212

Attributes: Undergraduate

NSC 470 Special Topics in Neuroscience (3 credits)

Topics will vary according to the semester in which the class is offered.

NSC 490 Seminar in Neuroscience (1 credit)

This course focuses on current research and techniques in the field of Neuroscience through primary literature review, discussion, and analysis. Topics will be chosen based on current discoveries and advancements in the field.

Prerequisites: BS 260 or NS 260 or PS 260 or NSC 205

Attributes: Undergraduate

NSC 491 Neuroscience Capstone (1 credit)

This course is the culmination of student directed research or independent study. Students will present and discuss research with the class. Students will justify research predictions and design, explain primary findings, and defend conclusions in the field of neuroscience.

Prerequisites: NS 495 or NSC 490

Restrictions: Enrollment is limited to students with a major in Neuroscience.

Attributes: Undergraduate

NSC 492 Neuroscience Internship (3 credits)

Internships enable the student to gain first-hand experience working in some field of neuroscience. Interns should work a minimum of 10 hours weekly for 12 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship.

Prerequisites: (NS 260 and NS 261) or (NSC 205 and NSC 206)

Attributes: Undergraduate

NSC 493 Neuroscience Internship II (3 credits)

Internships enable the student to gain first-hand experience working in some field of neuroscience. Interns should work a minimum of 10 hours weekly for 12 weeks to earn credit for a single course. Permission to take an internship for course credit must be obtained prior to beginning the internship. Permission of the Neuroscience program is required.

Prerequisites: NSC 492

Attributes: Undergraduate

NSC 494 Undergraduate Research (1-6 credits)

Laboratory or field work in neuroscience on a specific problem in cooperation with a faculty member of the department. Normally requires three hours of work per week for each unit of credit. This course may be taken for credit multiple semesters but only one semester counts as a neuroscience elective. In subsequent semesters this course will count as a general elective. Students need to complete the application form for independent study and have the approval of the program and Associate Dean.

Prerequisites: (NS 260 and NS 261) or (NSC 205 and NSC 206)

Attributes: Undergraduate

NSC 495 Undergraduate Research II (1-6 credits)

Laboratory or field work in neuroscience on a specific problem in cooperation with a faculty member of the department. Normally requires three hours of work per week for each unit of credit. This course may be taken for credit multiple semesters but only one semester counts as a neuroscience elective. In subsequent semesters this course will count as a general elective. Students need to complete the application form for independent study and have the approval of the program and Associate Dean.

Prerequisites: NSC 494

Attributes: Undergraduate

Nuclear Medicine Technology (NMT)

NMT 195 Cross-Sectional Anatomy (1 credit)

In this course the student studies gross anatomical structures viewed in sagittal, axial and coronal planes utilizing CT scan, MRI and line drawing images. The basic structures and functions of major organ systems are described along with common pathologies of each organ system.

Attributes: Undergraduate

NMT 201 Nuclear Medicine Theory I (4 credits)

This is an introductory course in the fundamental concepts of nuclear medicine. This course is a study of the basic sciences that apply to nuclear medicine. Topics include nuclear physics, mathematics, instrumentation, radiation biology and procedures.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Nuclear Medicine Technology.

NMT 202 Nuclear Med Theory II (6 credits)

This course is designed to build on the knowledge gained in NMT 201. Topics in this course include radiation safety, radiopharmacy and more advanced procedures.

Prerequisites: NMT 201

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Nuclear Medicine Technology.

NMT 203 Nuclear Med Theory III (2 credits)

This course provides a comprehensive review of topics covered throughout the year in order to prepare the students for the national registry exam.

Prerequisites: NMT 202

NMT 211C Nuclear Med Clin I (5 credits)

This course is designed to introduce the beginning student to the profession of nuclear medicine technology. Practicum takes places at the clinical affiliates. Students learn by observing and assisting the technologist in the performance of nuclear medicine imaging and associated tasks. Various clinical competencies and five procedure competencies are required in this course.

Restrictions: Enrollment is limited to students with a major in Nuclear Medicine Technology.

Attributes: Undergraduate

NMT 212C Nuclear Med Clin II (5 credits)

The student will continue to work toward demonstrating competency in the more frequently performed nuclear medicine studies. They will observe and assist the technologist in the performance of complicated studies. Various clinical competencies and ten additional procedure competencies are required in the course.

Prerequisites: NMT 211 or NMT 211C

Restrictions: Enrollment is limited to students with a major in Nuclear Medicine Technology.

Attributes: Undergraduate

NMT 213 Nuclear Med Internship (6 credits)

This final session of practical learning allows the student to fine tune their skills and apply all they have learned in Nuclear Medicine Theory. The student is expected to be able to perform most studies with limited supervision. Various clinical competencies and ten additional procedure competencies are required for this course.

Prerequisites: NMT 212

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Nuclear Medicine Technology.

NMT 221 Nuclear Medicine Theory I (2 credits)

This is an introductory course in the fundamental concepts of nuclear medicine. Topics will include commonly performed nuclear medicine procedures, mathematics, and basic instrumentation.

Restrictions: Enrollment is limited to students with a major in Nuclear Medicine Technology.

Attributes: Undergraduate

Nursing (NUR)

NUR 010 LPN Assessment Module (0 credits)

The LPN Assessment Module is designed to prepare the licensed practical nurse to make the transition to professional nursing. During the module, the LPN will be assisted in defining the difference between the roles of the licensed practical nurse and the roles of the professional nurse. Holistic assessment skills are practiced and applied to case studies addressing health and wellness across the lifespan.

Prerequisites: BIO 175 and BIO 176 and PSY 100 and (ENG 101 or ENG 100) and (MAT 115 or MAT 150)

Attributes: Undergraduate

NUR 010C LPN Assessment Clinical (0 credits)

Students who register for NUR 010 must also register for a NUR 010 clinical. For example, if you register for NUR 010 you must, at the same time, register for a section of NUR 0101C

Attributes: Undergraduate

NUR 115 Intro Concepts Health & Illness (4 credits)

This course provides opportunities for the student to explore, practice, and apply fundamental nursing principles, concepts and skills necessary for providing client centered care through classroom and clinical experiences.

Prerequisites: (ENG 101 or ENG 100) and CSS 101 and BIO 175

Attributes: Undergraduate

NUR 115C Intro Concepts Health & Illness Clinical (0 credits)

Students who register for NUR 115 must also register for NUR 115C Clinical.

Attributes: Undergraduate

NUR 135 Found Concepts Health & Illness (6 credits)

This course provides the student the opportunity to explore professional nursing identity and concepts related to protection, homeostasis, and oxygenation. The student will apply theoretical knowledge to organize and prioritize safe, holistic client centered care.

Prerequisites: (NUR 265 and (NUR 115 or NUR 110 and NUR 120) or NUR 010) and PSY 100 and BIO 176

Attributes: Undergraduate

NUR 135C Found Concepts Health & Illness Clinical (0 credits)

All students in NUR 135 must register for NUR 135C Clinical.

Attributes: Undergraduate

NUR 160 Hist & Theory of Nursing Prac (3 credits)

The evolution of professional nursing as it relates to history, theories, laws, policies and ethics is explored with emphasis on professional responsibility, clinical decision making and implementation of caring, holistic nursing practice.

NUR 170 Foundational Nursing I (3 credits)

This course provides opportunities for students to develop foundational nursing principles, concepts, and skills. Classroom and clinical learning experiences provide a framework for students to provide safe, client-centered care.

Prerequisites: (MAT 115 (may be taken concurrently) or MAT 150 (may be taken concurrently)) and BIO 175 (may be taken concurrently) and NUR 265 (may be taken concurrently)

Attributes: Undergraduate

NUR 170C Foundational Nursing I Clinical (0 credits)

All students in NUR 170 will also need to register for NUR 170C Clinical.

Attributes: Undergraduate

NUR 210 Concepts of Health & Illness V (4 credits)

This course provides opportunities for the student to explore concepts of adaptation and psychological alteration. Concepts of community and mental health nursing are introduced in this course.

Prerequisites: PSY 100 and BIO 185 and NUR 280 and (MAT 115 or MAT 150) and (NUR 135 or (NUR 130 and NUR 140))

Attributes: Undergraduate

NUR 210C Cncpts Health & Illness V Clnc (0 credits)

All students registered for NUR 210 must also register for NUR 210C Clinical.

Attributes: Undergraduate

NUR 220 Concepts of Hlth & Illness VI (4 credits)

This course expands on the student's knowledge of health promotion and illness prevention with a focus on human development. Classroom and clinical experiences focus on client centered care of child-bearing families, pediatric clients, and specialized populations.

Prerequisites: PSY 100 and BIO 185 and (MAT 115 or MAT 150) and NUR 280 and (NUR 135 or (NUR 130 and NUR 140))

Attributes: Undergraduate

NUR 220C Cncpts Hlth & Illness VI Clnc (0 credits)

All students registered for NUR 220 must also register for NUR 220C.

Attributes: Undergraduate

NUR 230 Concepts of Hlth & Illness VII (5 credits)

This course provides the student the opportunity to expand their knowledge of oxygenation, homeostasis, and adaptation while providing client centered care focusing on acute and chronic health processes.

Prerequisites: NUR 130 and NUR 140 and PSY 100 and BIO 185 and (MAT 115 or MAT 150) and NUR 280

Attributes: Undergraduate

NUR 230C Cncpts Hlth & Illnss VII Clnc (0 credits)

All student registered for NUR 230 must also register for NUR 230C Clinical.

Attributes: Undergraduate

NUR 240 Concept of Hlth & Illness VIII (5 credits)

This course provides the student with the opportunity to explore concepts of health and illness with specific focus on diversity and psychological alterations.

Prerequisites: NUR 210 and NUR 220 and NUR 230 and PHL 490

Attributes: Undergraduate

NUR 240C Cncpt Hlth & Illnss VIII Clnc (0 credits)

All students registered for NUR 240 must also register for NUR 240C Clinical.

Attributes: Undergraduate

NUR 250 Concepts of Hlth & Illness IX (3 credits)

This course provides the student the opportunity to synthesize previously learned knowledge, skills, and concepts into managing the holistic care of clients with complex health problems.

Prerequisites: NUR 210 and NUR 220 and NUR 230 and PHL 490

Attributes: Undergraduate

NUR 250C Cncpts Hlth & Illnss IX Clnc (0 credits)

All students registered for NUR 250 must also register for NUR 250C Clinical.

Attributes: Undergraduate

NUR 260 Pharmacology (3 credits)

This course introduces the learner to the principles of pharmacology with an emphasis on the clinical application of medication administration.

Topics include: pharmacodynamics, pharmacokinetics, mode of action, indications, effects, interactions, contraindications, lifespan considerations, and nursing implications.

Prerequisites: BIO 176 and NUR 271

NUR 265 Health Assessment (3 credits)

In this course, learners develop health history and physical assessment skills. Assessment findings and common variations, cultural differences, life span changes, disease prevention, and health promotion interventions are discussed.

NUR 271 Foundations of Hlth & Illness (4 credits)

Learners apply theoretical knowledge to organize and prioritize safe, holistic client care.

Prerequisites: NUR 265 and BIO 176 and NUR 170

Attributes: Undergraduate

NUR 271C Found of Hlth & Illness Clincl (0 credits)

All students registered for NUR 271 must also register for NUR 271C Clinical.

Attributes: Undergraduate

NUR 275 Health and Illness I (5 credits)

This course provides learners the opportunity to explore wellness and illness concepts with a focus on adaptation and regulatory mechanisms.

Prerequisites: NUR 271 and PSY 100 and NUR 265

Attributes: Undergraduate

NUR 275C Health and Illness I Clinical (0 credits)

All students who register for NUR 275 must register for NUR 275C Clinical.

Attributes: Undergraduate

NUR 280 Concepts of Pathophysiology (3 credits)

This course focuses on concepts of pathophysiology essential to understanding the disease and disabling conditions that can affect the body systems across the lifespan. Content will enhance the learner's comprehension of the scientific complexity and associations of nursing assessments, clinical manifestations, and holistic interventions for various conditions.

Prerequisites: BIO 176

NUR 290 Transitions to Practice (3 credits)

This course focuses on the role of the nurse as a leader in practice incorporating collaboration as a member of the interprofessional health care team.

Prerequisites: NUR 210 and NUR 220 and NUR 230 and PHL 490

Attributes: Undergraduate

NUR 295 Health and Illness II (6 credits)

This course provides learners the opportunity to explore wellness and illness concepts with a focus on protection, psychological alterations, and regulatory mechanisms.

Prerequisites: NUR 271 and PSY 100 and NUR 265

Attributes: Undergraduate

NUR 295C Health and Illness II Clinical (0 credits)

All students who register for NUR 295 must also register for NUR 295C Clinical.

Attributes: Undergraduate

NUR 301 Conceptual Found Nursing Prac (3 credits)

This course explores the historical and theoretical foundations of nursing. Characteristics of the profession, critical thinking, and the concepts of safety and quality as they apply to nursing practice, are examined and analyzed.

Restrictions: Enrollment is limited to students with a concentration in RN to BSN.

NUR 302 Introduction to Capstone (1 credit)

This course prepares the student to explore the meaning, benefits and components of service learning. Students will explore potential ideas for development of a service learning project which will be implemented prior to completion of the curriculum

NUR 312 Diversity and Cultural Care (3 credits)

Students will investigate nursing care to promote health equity for all populations by examining the impact of their beliefs and values on culturally competent care, while understanding factors impacting diverse populations.

Prerequisites: NUR 170 (may be taken concurrently) or NUR 301 (may be taken concurrently)

Attributes: Undergraduate

NUR 314 Nsg Care Syst Disadv Pop (3 credits)

Students will investigate nursing care to promote health equity and social justice in systematically disadvantaged populations by examining the impact of beliefs, values, and biases for the purpose of developing culturally aware nursing care. The course also exposes students to the meaning, benefits, and components of service-learning.

Prerequisites: NUR 170 or NUR 301 (may be taken concurrently)

Attributes: CCC: Diversity, Undergraduate

NUR 325 Chronic Illness and Healthcare (3 credits)

This course is designed to explore chronic illness as it affects the client, family, community, health care provider and health care system.

Restrictions: Enrollment limited to students with a class of Sophomore.

Attributes: Undergraduate

NUR 340 Comprehensive Hlth Assessment (3 credits)

This course is designed to assist the learner in building on prior health assessment skills and knowledge with an emphasis on the critical appraisal of health assessment data. Interprofessional collaboration strategies, patient- and family-centered approaches, and evidence-based practice techniques will be emphasized.

Prerequisites: NUR 301 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a concentration in RN to BSN.

NUR 349 Nursing Internship (3 credits)

This course is a structured internship that allows learners to be immersed in the clinical environment while they investigate a clinical nursing specialty. Learners have opportunities to gain experience and confidence as they actively engage in the interdisciplinary health care team.

Prerequisites: BIO 185 and NUR 260 and NUR 275 and NUR 280 and NUR 295

NUR 355 Health and Illness III (6 credits)

This course expands on the learners' knowledge of health promotion and illness prevention with a focus on human development across the lifespan. Concepts of community health nursing are introduced.

Prerequisites: NUR 275 and NUR 295 and (SOC 101 or SOC 100)

Attributes: Undergraduate

NUR 355C Health and Illness III Clinicl (0 credits)

Students registered for NUR 355 must also register for NUR 355C Clinical.

Attributes: Undergraduate

NUR 371 Health Policy Prof Nurse (3 credits)

This course highlights health policy concepts and frameworks. Exploring health policies through engaging assignments, students will gain knowledge regarding nursing advocacy, medical, legal, and ethical issues to assess healthcare systems.

Prerequisites: NUR 301 or NUR 275 or NUR 295

Attributes: Undergraduate

NUR 401 Research in Health Care (3 credits)

This course focuses on the role of research as it informs professional health care practice. Students will have an opportunity to analyze, critique and interpret quantitative and qualitative research. It serves as a means to incorporate evidence-based practice in the evaluation and modification of current practice.

Prerequisites: MAT 128 and (ENG 206 or ENG 454)

Attributes: Undergraduate

NUR 402 EBP & Research in Nursing (4 credits)

The course explores evidence-based practice and research as it informs practice with an emphasis on critiquing and appraising the evidence in the evaluation and modification of current practice.

Prerequisites: ENG 454 and MAT 128

Restrictions: Enrollment is limited to students with a major in Health Administration, Health Science or Nursing.

Attributes: Undergraduate

NUR 405 Health and Illness IV (5 credits)

This course provides learners the opportunity to expand their knowledge of regulatory mechanisms and psychological alterations. Learners synthesize previously learned knowledge, skills, and concepts into managing the holistic care of clients with complex health problems.

Prerequisites: NUR 275 and NUR 295

Attributes: Undergraduate

NUR 405C Health and Illness IV Clinl (0 credits)

Students registered for NUR 405 must register for NUR 405C Clinical.

Attributes: Undergraduate

NUR 406 Clinical Decision Making (1 credit)

This course focuses on the concepts and principles underlying nursing knowledge, theory, and practice to refine critical thinking skills for the provision of nursing care in simulated client case situations. Emphasis is placed on synthesizing the application of nursing process, nursing diagnoses, and interdisciplinary collaboration for clients with complex multidimensional health needs.

NUR 407 Health Promotion in Nursing (1 credit)

This course examines the nurse's role in promoting and maintaining health in individuals and communities across the lifespan.

Prerequisites: NUR 275 and NUR 295

Attributes: Undergraduate

NUR 410 Issues and Trends in Nursing (3 credits)

This course analyzes issues, trends and forces that influence the nursing practice. Resolution strategies for current issues will be discussed.

Prerequisites: ENG 206 or ENG 454 or ENG 202 or ENG 300 and (MAT 128 or MAT 260)

NUR 412 Women and Health (3 credits)

This course focuses on the physical and psychosocial health issues of women. Factors that influence women's health will be explored.

Prerequisites: NUR 301 or NUR 271

Attributes: Undergraduate

NUR 414 Holistic Health Modalities (3 credits)

This course is designed to expand the students' perspective on health by considering the whole person. Emphasis is placed on physical, mental, emotional, social, and spiritual aspects. Insight will be gained which fosters a cooperative relationship among allopathic, complimentary, and alternative health care models.

Prerequisites: NUR 271 and NUR 301

Attributes: Undergraduate

NUR 416 Palliative Care Nursing (3 credits)

The student explores the principles of palliative care nursing with an emphasis on providing care across the life span that is individualized to the patient and family rather than the diagnosis.

Prerequisites: NUR 271 or NUR 301

Attributes: Undergraduate

NUR 420 Leadership & Management (3 credits)

This course focuses on leadership and management theory and provides practical applications in today's health care settings. Course content focuses on management skills, including problem solving, decision making, team building, communication, facilitating change and conflict resolution. Concepts related to interdisciplinary collaboration and application of management strategies in diverse settings are addressed. Strategies for managing stressors within today's health care environment, as well as strategies for building a professional nursing career, are incorporated.

Prerequisites: ENG 454 or ENG 300

Restrictions: Enrollment is limited to students with a concentration in RN to BSN.

Attributes: Undergraduate

NUR 422 Prof Lead Dev & Trans Practice (3 credits)

This course focuses on leadership and management theory, provides practical applications in today's health care settings, and emphasizes the synthesis of nursing process, nursing diagnoses, and interdisciplinary collaboration and care for clients with complex multidimensional health needs. Course content includes leadership skills such as problem solving, decision making, team building, communication, facilitating change critical thinking, and conflict resolution. Strategies for transition into practice in today's health care environment, continued professional development, and life-long learning are incorporated.

Prerequisites: NUR 355 or NUR 405

Attributes: Undergraduate

NUR 425 Chnrc Illnss Pallv Care Nsg (4 credits)

The course explores chronic illness and palliative care with an emphasis on care across the lifespan that is individualized to the patient and family, rather than the diagnosis.

Prerequisites: NUR 301

Attributes: Undergraduate

NUR 430 Nursing in a Global Society (3 credits)

This course exposes the student to the major concepts and topics related to the specialty of community/public health nursing. The health of the community as a client is explored using wellness principles, epidemiology, emerging health risks, and health policy. Strategies to promote, protect, and preserve a community's health are formulated. Current issues surrounding the social, cultural, political, and environmental influences on global health will be examined.

Prerequisites: ENG 206 or ENG 454 or ENG 202 or ENG 300

Attributes: CCC: Mission: Global Citizenship, Undergraduate

NUR 500 NP Role Development (1 credit)

Students are introduced to the advanced practice registered nurse (APRN) role and the population-focused nurse practitioner competencies. The historical and theoretical foundations for the evolution of advanced nursing practice are explored.

Attributes: Graduate

NUR 501 Health Promo & Disease Prev (3 credits)

This course focuses on social determinants of health for diverse populations and critical analysis of various theories and practices for health promotion and disease prevention. Levels of prevention, population health, environmental health, epidemiology and culture are addressed. Health disparities and vulnerable populations are considered.

NUR 511 Graduate Research (3 credits)

This course provides an overview of quantitative and qualitative research methods commonly used for systematic inquiry in health care. Current research literature is evaluated. Quantitative and qualitative techniques of data analysis are also examined.

Attributes: Graduate

NUR 620 Applied Practice Nursing Adm (3 credits)

In this course students apply knowledge and demonstrate competency in nursing administration through research and practice in a nursing setting.

Attributes: Graduate

NUR 631 Nurse Educator in Clin Pract (2 credits)

In this course, students will create an individualized plan to integrate previous knowledge as well as increase expertise within a focused area of nursing care.

Attributes: Graduate

NUR 632 Nurse Educator in Academic Set (3 credits)

In this course students apply knowledge of best practices in nursing education. Emphasis is placed on professional role development and socialization of becoming a Nurse Educator within the academic setting.

Attributes: Graduate

NUR 640 Advanced Pathophysiology (3 credits)

Pathophysiologic processes of diseases across the lifespan are explored within the context of health promotion, disease prevention and evidence-based practice.

Attributes: Graduate

NUR 641 Advanced Pharmacology (3 credits)

The pharmacokinetics, pharmacodynamics, adverse drug effects, precautions and drug interactions of broad categories of drugs are examined. Safe prescribing of therapeutic agents are addressed within the context of specific populations.

Attributes: Graduate

NUR 642 Adv Hlth Assess & Clin Reason (3 credits)

This course focuses on developing advanced health assessment skills needed to formulate differential diagnoses in the care of individuals across the lifespan.

Attributes: Graduate

NUR 643 Hlth Promo in Integrated Care (3 credits)

The focus of this course is on the theoretical and scientific basis for health promotion of diverse populations across the lifespan.

Attributes: Graduate

NUR 650 Neurosci Mental Hlth Disorders (1 credit)

This course focuses on the neuroscientific concepts underlying common mental health disorders. The relationships between neuroanatomy, neurophysiology, and neurochemistry to neuropsychiatric symptoms and behaviors are emphasized.

Attributes: Graduate

NUR 700 Epidemiology & Population Hlth (3 credits)

Advanced concepts and methods of epidemiology and related topics as they relate to population-based practice are emphasized. Social determinants of health and illness are examined within the context of care delivery for individuals and aggregates/populations.

Attributes: Graduate

NUR 707 Advanced Leadership Practicum (1-6 credits)

Students increase knowledge of clinical leadership in the practice environment. In collaboration with a health care leader and their faculty advisor, students develop personalized learning outcomes that will enhance their professional expertise.

Attributes: Graduate

NUR 710 Health Information Technology (3 credits)

Health care technologies used in clinical decision-making, improvement of health information literacy, assessment of population health data, and evaluation of quality of care are investigated. Ethical use of technology in health care and the value of telehealth technologies for improvement of care are emphasized.

Attributes: Graduate

NUR 715 EBP Research Translation (3 credits)

This course provides the basis for clinical scholarship development. Students will explore the concept of practice-based knowledge and the process of translation of research into practice.

Attributes: Graduate

NUR 720 Family NP Across Lifespan I (4 credits)

This diagnosis and management course introduces the student to strategies for health promotion, disease prevention, assessment and management of selected episodic and chronic health conditions commonly encountered in the primary care setting. Students who register for NUR 720 must also register for NUR 721 Practicum I. For example, if you register for NUR 720 you must, at the same time, register for a section of NUR 721.

Prerequisites: NUR 640 and NUR 641 and NUR 642

Restrictions: Enrollment limited to students in the NUMSN or NUPM programs.

Attributes: Graduate

NUR 721 Family NP Practicum I (3-4 credits)

Students begin integrating the Family Nurse Practitioner competencies in the clinical setting. Emphasis is on the refinement of skills needed for accurate diagnosis and management of common conditions encountered throughout the lifespan. Students who register for NUR 720 must also register for NUR 721 Practicum I. For example, if you register for NUR 720 you must, at the same time, register for a section of NUR 721.

Attributes: Graduate

NUR 722 Family NP Across Lifespan II (4 credits)

This course focuses on increasing competence in analytic skills for clinical decision-making in assessment and management of individuals with acute and chronic health deviations. Students who register for NUR 722 must also register for NUR 723 Practicum II. For example, if you register for NUR 722 you must, at the same time, register for a section of NUR 723.

Prerequisites: NUR 721

Restrictions: Enrollment limited to students in the NUMSN or NUPM programs.

Attributes: Graduate

NUR 723 Family NP Practicum II (3-4 credits)

In this second clinical practicum, students demonstrate increased competency in the diagnosis and management of episodic and chronic medical conditions for individuals across the lifespan. Improved accuracy in data collection, depth of knowledge and efficiency of performance are emphasized. Students who register for NUR 722 must also register for NUR 723 Practicum II. For example, if you register for NUR 722 you must, at the same time, register for a section of NUR 723.

Prerequisites: NUR 721

Attributes: Graduate

NUR 724 Family NP Across Lifespan III (4 credits)

This diagnosis and management course focuses on refinement of analytic skills used for clinical decision-making in assessment and management of individuals and families presenting with acute and chronic health deviations encountered in primary care. Students who register for NUR 724 must also register for NUR 725 Practicum III. For example, if you register for NUR 724 you must, at the same time, register for a section of NUR 725.

Prerequisites: NUR 722 and NUR 723

Restrictions: Enrollment limited to students in the NUMSN or NUPM programs.

Attributes: Graduate

NUR 725 Family NP Practicum III (3-4 credits)

Students demonstrate proficiency and flexibility of thinking in the analytical skills required for clinical decision making. Emphasis is on skills needed for smooth transition to practice as a nurse practitioner. Students who register for NUR 724 must also register for NUR 725 Practicum III. For example, if you register for NUR 724 you must, at the same time, register for a section of NUR 725.

Prerequisites: NUR 723

Restrictions: Enrollment limited to students in the NUMSN or NUPM programs.

Attributes: Graduate

NUR 730 Psych/Mental Health Np I (3 credits)

This diagnosis and management course introduces strategies for health promotion, disease prevention and management of selected mental health conditions commonly encountered in mental health settings. The theoretical basis for the application of individual psychotherapeutic approaches is emphasized.

Attributes: Graduate

NUR 731 Psych/Mental Health NP Prac I (3-4 credits)

Students begin integrating the Psychiatric/Mental Health Nurse Practitioner competencies in the clinical setting. Emphasis is on the performance of the comprehensive psychiatric evaluation and the application of psychotherapeutic modalities needed for accurate diagnosis and management of mental health disorders across the lifespan.

Attributes: Graduate

NUR 732 Psych/Mental Health Np II (3 credits)

This second diagnosis and management course in psychiatric/mental health care focuses on increasing competence in the analytic skills used for clinical decision-making in assessment and management of individuals and families presenting with selected mental health conditions. Emphasis is on the theoretical basis for family-centered psychotherapeutic modalities.

Attributes: Graduate

NUR 733 Psych/Mental Health Np Prac II (3-4 credits)

In this second clinical practicum, students demonstrate increased competency in the diagnosis and management of mental disorders. Emphasis is on improved accuracy in data collection, depth of knowledge and efficiency of performance.

Attributes: Graduate

NUR 734 Psych/Mental Health Np III (3 credits)

This final diagnosis and management course in psychiatric/mental health care focuses on refinement of analytic skills used for clinical decision-making in assessment and management of individuals and families presenting with selected mental health conditions. Emphasis is on the theoretical basis for group psychotherapeutic modalities.

Attributes: Graduate

NUR 735 Psych/Mental Health Np Pra III (3-4 credits)

In this final clinical practicum, students demonstrate proficiency in the diagnosis and management of mental disorders. Emphasis is on skills needed for smooth transition to practice as an independent nurse practitioner.

Attributes: Graduate

NUR 740 Adult-Geron Acute Care NP I (4 credits)

This diagnosis and management course introduces the student to the critical thinking needed for assessing and managing the care of acute and complex chronically ill young adults through older adults with medical illnesses.

Attributes: Graduate

NUR 741 Adult-Geron Acute Care NP Pra (3-4 credits)

This second diagnosis and management course focuses on increasing competence in the care of acute and complex chronically ill young adults through older adults with emphasis on selected illnesses related to medical and surgical sub-specialties. System influences on health outcomes are emphasized.

Attributes: Graduate

NUR 742 Adult-Geron Acute Care NP II (4 credits)

This second diagnosis and management course focuses on increasing competence in the care of acute and complex chronically ill young adults through older adults with emphasis on selected illnesses related to medical and surgical sub-specialties. System influences on health outcomes are emphasized.

Attributes: Graduate

NUR 743 Adult-Geron Acute Care Prac II (3-4 credits)

In this second clinical practicum, students demonstrate increased competency in the diagnosis and management of acute and/or complex chronic illness in young adults through older adults in medical and surgical sub-specialties. Improved accuracy in data collection, depth of knowledge and efficiency of performance are emphasized.

Attributes: Graduate

NUR 744 Adult-Geron Acute Care NP III (4 credits)

This final diagnosis and management course in acute care focuses on increasing competence in the analytic skills used for clinical decision-making in assessment and management of the critical and/or unstable, complex chronically ill young adults through older adults.

Attributes: Graduate

NUR 745 Adult Geron AC Prac III (3-4 credits)

In this final clinical practicum students demonstrate proficiency in managing complex adult and older adult patients in critical care settings with conditions that may result in rapid physiologic deterioration or life-threatening instability. Emphasis is on skills needed for smooth transition to practice as an independent nurse practitioner.

Attributes: Graduate

NUR 801 Intro Doctor of Nursing Pract (2 credits)

This course will provide an overview of the Doctor of Nursing Practice Degree requirements and the Doctor of Nursing Practice Essentials.

Attributes: Graduate

NUR 803 Nur Ldrship for Quality & Safe (3 credits)

This doctoral level course will provide an overview of quality and safety concerns in the health care environment. Students will develop leadership strategies to address quality and safety concerns.

Attributes: Graduate

NUR 806 Leadership Practicum (2 credits)

Students participate in decision-making, policy-making and organizational change through mentored clinical experiences with a health care leader. Students will apply problem-solving skills to propose innovation changes to improve health care delivery.

Attributes: Graduate

NUR 807 Ind Study in Leadership (3 credits)

Students incorporate knowledge of clinical leadership in the practice environment. In collaboration with a health care leader and their faculty advisor, students develop personalized learning outcomes that will enhance their professional expertise.

Attributes: Graduate

NUR 809 Health Information Technology (3 credits)

Health care technologies used in clinical decision-making, improvement of health information literacy, assessment of population health data, and evaluation of quality of care are investigated. Ethical use of technology in health care and the value of telehealth technologies for improvement of care are emphasized.

Attributes: Graduate

NUR 811 Role Immersion I Clin Leader (3 credits)

Students integrate knowledge of health policy, evidence-based practice, leadership skills, informatics, and population health, as appropriate for the clinical setting.

Attributes: Graduate

NUR 813 Role Immersion II Clin Leader (3 credits)

In this culminating clinical immersion, students fully integrate knowledge of health policy, evidence-based practice, leadership, informatics, and population health in a clinical area of interest.

Attributes: Graduate

NUR 815 EBP: Research Translation (3 credits)

This course provides the basis for clinical scholarship development. Students will explore the concept of practice-based knowledge and the process of translation of research into practice.

Attributes: Graduate

NUR 816 DNP Project I: Planning & Dev (3 credits)

Students plan and develop an evidence-based practice change that improves health outcomes in a practice setting. Knowledge of organizational structures and behaviors, program planning and evaluation and translation methods are applied in leading an implementation team.

Attributes: Graduate

NUR 817 DNP Project II Implementation (3 credits)

Students lead a team to translate research to improve practice processes and outcomes.

Attributes: Graduate

NUR 818 DNP III Eval & Dissemination (2 credits)

Students analyze outcomes data for the practice change and disseminate results to the academic and professional community.

Attributes: Graduate

NUR 819 Knowledge Dissemination (1 credit)

Enhanced oral and written communication skills are utilized to disseminate outcomes of practice innovations and promote adoption of improved care delivery models.

Attributes: Graduate

Occupational Therapy (OTH)

OTH 105 Overview of O.T. Practice (2 credits)

Overview of occupational therapy practice includes practice arenas, roles of therapists, populations treated, values of practitioners, relations with other professional and non-professionals, introduction to the history of the profession and theoretical concepts.

OTH 112 Overview of OT Practice I (1 credit)

Overview of the value of occupational therapy in society. An examination of professional terminology, historical and contemporary concepts of occupation, and the use of activities as a therapeutic and healing experience.

Prerequisites: HS 111 or HSC 110 (may be taken concurrently)

Restrictions: Enrollment is limited to Undergraduate Division level students.

OTH 115 Overview of OT Practice II (1 credit)

An overview of the importance of activity, contextual influences, and social participation in the lives of individuals and communities, and the diversity of occupational therapy practices. Basic professional development concepts and skills are introduced.

Prerequisites: OT 112 or OTH 112 (may be taken concurrently)

OTH 405 Overview of O.T. Practice (2 credits)

Overview of occupational therapy practice includes practice arenas, roles of therapists, populations treated, values of practitioners, relations with other professional and non-professionals, introduction to the history of the profession and theoretical concepts.

OTH 500 Level I Experiences Sem (1 credit)

This course is an introduction to fieldwork for the students in the OT program. Students will be introduced to this topic through the study of professional behaviors and review of skills necessary to be successful in both Level I and Level II fieldworks.

Prerequisites: OT 405 or OTH 405 (may be taken concurrently)

OTH 501 Doctoral Seminar 1 (1 credit)

This is the first in a series of 3 doctoral seminars which introduces the student to the concept and scope of practice of the doctorally prepared occupational therapist. Through literature exploration, the student develops a knowledge of the evolution of the doctorally prepared practitioner, not only in occupational therapy but in other healthcare fields. There will be readings, discussions, and lectures based not only on the history of health care and public health but also current practice and future needs.

Prerequisites: OT 405 or OTH 405 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

OTH 502 Human Development & Perform (3 credits)

This course provides foundational knowledge of theories of human development and the developmental changes that occur throughout the lifespan. The course is designed to provide an overview of typical and atypical physical, cognitive, social, emotional aspects of human development. Contextual factors (environmental and personal) will be explored. Introduction to the analysis of developmental changes during human occupational performance will be covered.

Prerequisites: OT 510 or OTH 510 (may be taken concurrently)

OTH 502L Human Dev & Perform Lab (0 credits)

Students who register for OTH 502 must also register for a OTH 502 laboratory. For example, if you register for OTH 502 you must, at the same time, register for a section of OTH 502L.

OTH 508 Movement Analysis (3 credits)

Osteology, surface anatomy, and kinesiology with emphasis on peripheral and cranial nerves, upper extremities, head and neck. Regional approach will emphasize movement, performance, observation, and analysis. Lab will feature tutorial groups, focusing on clinical problems and application of movement principles, kinesiology and anatomy. Techniques for evaluating movement will be learned as a method of analysis.

OTH 508L Movement Analysis Lab (0 credits)

Students who register for OTH 508 must also register for a OTH 508 laboratory. For example, if you register for OTH 508 you must, at the same time, register for a section of OTH 508L.

OTH 510 Neuroscience (4 credits)

An introduction to the function and components of the major structures of the normal and abnormal nervous systems including the study of the neurobiological substrates for behavior, learning and human activity. Laboratory includes an examination of brain specimens.

OTH 510L Neuroscience Lab (0 credits)

Students who register for OTH 510 must also register for a OTH 510 laboratory. For example, if you register for OTH 510 you must, at the same time, register for a section of OTH 510L.

OTH 519 Intro to Clinical Skills (3 credits)

This course is an introduction to basic occupational therapy clinical skills required for work in a variety of clinical settings. Students will be required to demonstrate competencies in, but not limited to, obtaining vital signs, employing safe infection control, and standard precautions. Students will develop basic interviewing, communication, and observation skills. Students will learn client positioning, functional mobility (bed mobility, transfers, and ambulation), ADL and IADL retraining skills using strategies and or compensatory adaptive equipment. Students will begin to develop skills in clinical reasoning, adaptation, teaching, and skills of writing for documenting goals and treatment notes as components of a medical record.

Prerequisites: OT 405 or OTH 405 (may be taken concurrently)

OTH 519L Intro to Clinical Skills Lab (0 credits)

Students who register for OTH 519 must also register for a OTH 519 laboratory. For example, if you register for OTH 519 you must, at the same time, register for a section of OTH 519L.

OTH 531 Clinical Medicine (3 credits)

Study of clinical conditions and disease processes that affect functional performance in individuals from birth through old age.

Prerequisites: OT 510 or OTH 510 (may be taken concurrently)

OTH 551 Human Occ: Cncpts & Prctice (3 credits)

This course explores the meaning and purpose of human occupation and its relationship to the promotion of health and the prevention of disease, illness, and dysfunction for persons, groups, and populations. This includes analysis and examination of occupations, activities, habits, and roles for persons, groups, and populations. Laboratory will emphasize engagement in occupations within one's contextual factors (environmental and personal).

Prerequisites: OT 405 or OTH 405 (may be taken concurrently)

OTH 551L Human Occ: Cncpts & Prctce Lab (0 credits)

Students who register for OTH 551 must also register for a OTH 551 laboratory. For example, if you register for OTH 551 you must, at the same time, register for a section of OTH 551L.

OTH 555 Evaluation & Assessment: OT (3 credits)

Course covers the selection and use of appropriate standardized and non-standardized assessment tools for the comprehensive evaluation of patients/clients. Data are used to establish goals, write reports, communicate findings, supervise staff, and refine interdisciplinary collaboration and home follow-up. Includes an examination of validity and reliability of assessment tools.

Prerequisites: (OT 562 or OTH 562 (may be taken concurrently)) and (OT 519 or OTH 519 (may be taken concurrently)) and (OT 502 or OTH 502 (may be taken concurrently))

OTH 555L Evaluation & Assessment: OTLab (0 credits)

Students who register for OTH 555 must also register for a OTH 555 laboratory. For example, if you register for OTH 555 you must, at the same time, register for a section of OTH 555L.

OTH 562 Theories of OT (3 credits)

Study of the theoretical humanistic foundations of occupational therapy practice. Focus will be on major theoretical perspectives, models for practice, and frames of references as a base for practice. Beginning links between theory, practice, and research will be made.

Prerequisites: OT 510 or OTH 510 (may be taken concurrently)

OTH 572 Clinical Mgmt & Supervision (3 credits)

General principles of administration, management and leadership. Program design, funding and implementation will be presented. Staffing patterns, quality assurance, reimbursement, contractual issues, program development and reimbursement issues are discussed as they relate to management in healthcare. Effects of systems, legislative and social issues on practice will be explored.

Prerequisites: OT 405 or OTH 405 (may be taken concurrently)

OTH 590 Fieldwork Level I: Clinical Exp (1 credit)

Students will participate in on-site and off-site, faculty led clinical experiences. They will be applying concepts learned in courses concurrent in this same semester.

Prerequisites: OTH 551

OTH 599 Independent Study (1-3 credits)

This independent study course is designed to support students who may need/want concentration in a particular topic area. Learning refinement and expanse of skills, reasoning, and professional practice are highlighted and work toward entry-level practitioner status. These topics may change from term to term.

OTH 600 Advanced Seminar & Comp Exm (3 credits)

Students will engage in a seminar analyzing scholarly works and current critical issues in occupational therapy. This will culminate in a comprehensive examination.

OTH 602 Doctoral Seminar II (1 credit)

This seminar is second in a series of 3 seminars which introduces students to the capstone process. Thorough review of the accreditation standards that guide the capstone experiential and project, students will explore their interests, the role of the capstone coordinator, advisor and the student for successful completion.

Prerequisites: OTH 501

OTH 603 Doctoral Seminar 2 (2 credits)

This seminar is the second in a series of 3 seminars which further develops the student's understanding of doctoral preparation and introduces them to the doctoral capstone process. Through review of the accreditation standards that guide the capstone experiential hours and final project, students will explore their interests, the role of the capstone coordinator, advisor and student role for a successful completion of the capstone experience. Students will build on the basics of capstone and start to plan their individual capstone projects and experience including collaborating with their faculty advisors and exploring experiential sites.

Prerequisites: OTH 501

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 610 Case-Based Reasoning (3 credits)

Critical evaluation of evidence-based practice patterns, professional reasoning, and clinical case reviews. The student will demonstrate the ability to translate and advance contemporary concepts in occupational therapy theory, research, and practice.

Prerequisites: OT 668 or OTH 668 (may be taken concurrently)

OTH 611 Evidence-Based Decision Making (1 credit)

This online course will focus on the application of evidence-based decision-making (EBDM) principles to the practice environment. Students will develop clinical questions based upon the fieldwork environment, conduct database searches to obtain evidence to support practice, and explore methods to facilitate the use of EBDM in clinical practice. This course reinforces the general education skill of information literacy.

OTH 612 Clin Reasoning & Prof Devel (3 credits)

This online course will examine both the clinical reasoning process that guides occupational therapy practice and professional development as a responsibility of professional practice. Clinical experiences from Level II fieldwork will be analyzed as the context for exploring these issues. The student is encouraged to critically explore their own practice while integrating didactic material, concepts of occupation based practice, clinical reasoning, reflection, and evidence-based decision-making. This course is taken concurrently with Level II fieldwork or with instructor permission. This course reinforces general education skill areas of reasoning and problem solving and the general education values/attitudes area of reflective and purposeful learning.

Prerequisites: OTH 694 (may be taken concurrently)

OTH 615 Therapeutic Groups (3 credits)

This course offers didactic and experiential components designed to prepare students for care delivery in therapeutic groups in all areas of occupational therapy practice. Students will learn to integrate knowledge of group process, group dynamics, and implementation of occupation-based approaches to therapy through lectures and laboratories that allow them to use clinical reasoning and creative critical thinking throughout the semester. This course reinforces the general education skill area of oral communications and the general education values/attitudes area of leadership and teamwork.

Prerequisites: OT 562 or OTH 562 (may be taken concurrently)

OTH 615L Therapeutic Groups Lab (0 credits)

Students who register for OTH 615 must also register for a OTH 615 laboratory. For example, if you register for OTH 615 you must, at the same time, register for a section of OTH 615L.

Prerequisites: OT 562 or OTH 562

OTH 620 Fieldwork Level I: Clinical (1 credit)

Students will engage in various experiential learning experiences on or off campus throughout the course of the semester to develop clinical skills and professional behaviors in preparation for level II fieldwork. Students will have the opportunity to interact with and understand the needs of clients with various diagnoses, actively engage in the OT Process under guidance, and explore acute care, acute rehab, and/or sub-acute settings through on-site visits.

Prerequisites: OT 682 or OTH 682 (may be taken concurrently)

OTH 623 FWK1:Comm Service Learning (1 credit)

Students are assigned to community sites under the supervision of a professional who is not an Occupational Therapist. Students are expected to participate in the daily activities of the site, engaging with both staff and clients. The focus of this level I experience is on psychosocial behaviors of clients and their environments.

Prerequisites: OT 644 or OTH 644 (may be taken concurrently)

OTH 624 Interventions I: Contextual Ap (4 credits)

The influence of context on occupational performance will be explored from a variety of perspectives and layers including the physical environment and personal factors. The course explores how an individual's, group's, and/or population's goals, values, and interests both influence and are influenced by context. Contextual interventions such as environmental modification, adaptive equipment, cultural consideration, and social determinants of health will be examined to improve or enhance occupational performance.

Prerequisites: OTH 551 and OTH 531

OTH 624L Interventions I: Cntxtl Ap Lab (0 credits)

Students who register for OTH 624 must also register for a OTH 624 laboratory. For example, if you register for OTH 624 you must, at the same time, register for a section of OTH 624L.

Prerequisites: OTH 551 or OTH 531

OTH 630 Community Based OT (3 credits)

This course will develop advanced skills for community-based occupational therapy. Consultative and population-based practices in a variety of contexts including therapy process, funding, and resource development. The student will explain how to assess community needs, propose and design appropriate community programs for individuals and groups, implement a community program and design an outcomes assessment measure. Students will develop a program proposal using community based concepts.

Prerequisites: OT 660 or OTH 660 (may be taken concurrently)

OTH 634 Interventions II: Developmenta (4 credits)

The course aims to introduce students to the use of evaluation data to design and implement meaningful occupation-based interventions to promote development through the life span. The course includes assessment, goal formation, treatment planning, use of intervention techniques, discharge planning, and termination of occupational therapy services. Interventions that will be considered include those that promote health, wellness, and occupational performance across the life span.

Prerequisites: (OTH 624 or OT 624) and (OTH 502 or OT 502) or (OTH 624 or OT 624) and (OTH 502 or OT 502)

OTH 634L Interventions II: Develop Lab (0 credits)

Students who register for OTH 634 must also register for a OTH 634 laboratory. For example, if you register for OTH 634 you must, at the same time, register for a section of OTH 634L.

Prerequisites: (OTH 624 or OT 624) and (OTH 502 or OT 502) or (OTH 624 or OT 624) and (OTH 502 or OT 502) or (OTH 624 or OT 624) and (OTH 502 or OT 502)

OTH 636 Clin Ldrshp, Mgmt,&Supervision (3 credits)

Students will review principles of administration, management, and leadership for clinical program design, funding, implementation, and outcomes. Students will develop an understanding of staffing patterns, quality assurance, contractual issues, program development, and reimbursement issues as they relate to healthcare management; analyze the impact of legislative and social issues on clinical practice, systems of care, and delivery of services; and understand healthcare system cultures as they relate to occupational therapist, professional, and client perspectives.

Prerequisites: OTH 405

OTH 644 Interventions III: Psychosocia (4 credits)

This interventions course introduces students to the design and implementation of occupation-based interventions in various behavioral health settings to allow the client to engage in meaningful occupations throughout the lifespan. The course includes assessment, goals formation, treatment planning, use of intervention techniques, discharge planning, and termination of treatment.

Prerequisites: OTH 624 and OTH 682

OTH 644L Interventions III: Psychosoc L (0 credits)

Students who register for OTH 644 must also register for a OTH 644 laboratory. For example, if you register for OTH 644 you must, at the same time, register for a section of OTH 644L.

OTH 650 Applied Research Methods (3 credits)

Students will obtain a basic understanding of theory-based research, methodological considerations in the design of research, ways of evaluating practice, and approaches to analyzing data. Examples of qualitative and quantitative designs will be analyzed, and techniques of data analysis examined. Knowledge gained through this course can be used in the evaluation of OT services and in designing and implementing beginning-level research projects. The basic concepts of evidence-based practice will be presented.

OTH 652 OT Interventions IV: Cognitive (3 credits)

This course emphasizes the identification of appropriate theoretical frameworks, goal setting, treatment planning, the use of a variety of intervention techniques to allow the client to engage in meaningful occupations, discharge planning, and termination of treatment. The focus will be on the cognitive components, including, but not limited to, level of arousal, orientation, recognition, attention span, initiation of activity, termination of activity, memory, sequencing, categorization, concept formation, spatial operations, problem solving, learning, and generalization, as they are manifested across the lifespan.

Prerequisites: OTH 634 and OTH 644

OTH 652L OT Interventions IV: Cogni Lab (0 credits)

Students who register for OTH 652 must also register for a OTH 652 laboratory. For example, if you register for OTH 652 you must, at the same time, register for a section of OTH 652L.

OTH 660 Applied Research II (3 credits)

This course is the second of three courses required in the Occupational Therapy research sequence. Building on the first research course and using experiences from Level I fieldwork, students are required to develop a research proposal. This activity will provide students with the ability to translate clinical problems into research protocols by incorporating published research and class learning with clinical cases from their fieldwork experience. Learning will occur through lectures, class activities, class discussions, readings, and assignments. Knowledge gained through this course can be used in the evaluation of OT services and in designing and implementing beginning level research projects. Basic statistics is included.

Prerequisites: OTH 650

OTH 664 Interventions V: Rehab Approac (4 credits)

The use of evaluation data to design and implement interventions with clients who are at risk for or who have disabilities due to disease, trauma, medical condition or other impairment. The OT process will include evaluation, goal setting, treatment planning, implementation of intervention techniques, and discharge planning all to allow the client to engage in meaningful occupations and client-centered outcomes.

Prerequisites: (OTH 519 or OT 519) and OTH 634

OTH 664L Interventions V: Rehab App Lab (0 credits)

Students who register for OTH 664 must also register for a OTH 664 laboratory. For example, if you register for OTH 664 you must, at the same time, register for a section of OTH 664L.

OTH 665 Applied Research III (3 credits)

This seminar provides and in-depth examination of research and its relationship to practice. Students will obtain an advanced understanding of theory-based research, methodological considerations in the design of research, ways of evaluating practice, and approaches to analyzing data. Learning will occur through class discussions, readings and assignments, including the implementation of the proposal developed in the prior courses.

Prerequisites: OTH 660

OTH 668 Evidence-Based Practice (3 credits)

Students will develop their ability to locate, evaluate and incorporate research evidence into the practice of occupational therapy. Students will build upon research analysis and information literacy skills from prior coursework as they develop clinical questions, conduct database searches to obtain evidence, critically analyze available evidence, and determine relevance to clinical practice.

Prerequisites: OT 660 or OTH 650 (may be taken concurrently)

OTH 670 OT Ldrship Managing Change (3 credits)

Learning will focus on general principles of healthcare and practice context trends, professional responses to change, current organizational dynamics & leadership theories/applications, and managing change today. The course highlights the manner in which occupational therapists can leverage this knowledge to meet today's demands while maintaining professional integrity. Students will reflect on personal professional development while contributing to the development of the profession.

Prerequisites: OTH 636

OTH 672 OT Interventions VI:Technology (3 credits)

Assistive technology devices and services have the potential to impact the lives of persons with disabilities, resulting in increased independence and participation in their daily activities. This course will focus on learning about the various types of assistive technology devices and services including, but not limited to, evaluation and assessment, selection and training, procurement, legislation, and funding. Students will gain an understanding of these applications as they pertain to the communication, learning, and environmental issues encountered by persons with disabilities.

Prerequisites: OTH 555

OTH 672L OT Interventions V: Tech Lab (0 credits)

Students who register for OTH 672 must also register for a OTH 672 laboratory. For example, if you register for OTH 672 you must, at the same time, register for a section of OTH 672L.

Prerequisites: OTH 555

OTH 674 Independent Project in OT (6 credits)

The student will work collaboratively with a faculty member to develop and carry out an independent project of mutual interest. This project will result in a submission to a juried conference or publication. Student(s) can elect to participate in an ongoing project within the Department of Occupational Therapy.

Prerequisites: OTH 665 or OTH 694 or OTH 696

OTH 675 Research Independent Study (6 credits)

The course is designed to refine research skills for self-directed students who have an interest in OT research. The student will work collaboratively with a faculty mentor to develop and carry forth a research project of mutual interest. This course should result in a poster, platform presentation, or paper that can be submitted for peer review. Student(s) can elect to participate in one of many ongoing research projects within the Department of Occupational Therapy. The student(s) will gain insights into the research process through faculty mentoring and active involvement in all levels of the research process.

Prerequisites: OTH 665 or OTH 694

OTH 676 Adv Concepts Community OT (3 credits)

This course is a capstone course to evaluate current issues in and design program development for community based practice. Professional development planning for advancing community based occupational therapy in the future will occur. Analysis of social policies impacting community based occupational therapy will be emphasized.

Prerequisites: OTH 694 or OTH 649

OTH 677 Capstone Development 2 (3 credits)

This course is designed to build on previous capstone work. Students further develop their individual project for implementation while working with faculty advisors and course instructors. During this course, students set individualized, specific objectives and activities to gain an in-depth experience at their capstone sites.

Prerequisites: OTH 693

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 678 Hand Therapy Interventions (3 credits)

This is a comprehensive elective course specializing in hand therapy, focusing on the occupational therapy process. It will include evaluation, intervention, and outcomes for clients with common upper extremity conditions. Evidence based assessments and interventions will be examined through scholarly journals and research articles to determine appropriate use in treatment planning for clients. Class will include lectures, hands on activities, selected readings, discussions and case studies. Knowledge will prepare students to develop skills of an entry level therapist in preparation for a Level II fieldwork in the specialized area of hand therapy.

Prerequisites: OT 508 or OTH 508 (may be taken concurrently)

OTH 681 OT: Past, Present, & Future (2 credits)

This course will review the history of the profession of OT and put it in perspective in relation to the development of other health professions and society at that time. The impact of the past on the present practice of OT will be explored. Current critical issues will be discussed in terms of the potential influences from the past.

OTH 682 Fieldwork I: Community Client (1 credit)

The student will create adaptations and competence promoting strategies for human and non-human elements of the environment. This will be explored in a collaborative relationship with an individual living in the community. Throughout the course, needs assessments, safety evaluations, community resource finding and construction of low technology devices will be completed by the students, who will be supervised by an OT in the lab.

Prerequisites: OTH 624 (may be taken concurrently)

OTH 685 Family & Client Centered Care (3 credits)

The focus of this course will be to understand and critically analyze both the client-centered and family-centered perspectives for occupational therapy intervention. Students will research various articles written about both perspectives and discuss the effects that these approaches have on intervention. Emphasis will be placed on the critical analysis of each approach from a literature and experiential perspective.

Prerequisites: OTH 624 (may be taken concurrently) or OTH 664 (may be taken concurrently)

OTH 686 Adv Concepts Leadership (3 credits)

Based on their personal strengths, students will develop leadership skills for use in a variety of contexts. Students will analyze and synthesize occupational therapy's unique perspective and responsibility in healthcare leadership. Students will interact with professional leaders to integrate application of leadership concepts. Students will engage in tasks in preparation for their capstone project.

Prerequisites: OTH 636

OTH 687 FW 1f: Program Development (2 credits)

Students will engage in a fieldwork experience under the supervision of a professional, who may or may not be an occupational therapist, at a site that does not currently have an occupational therapy program. Students will engage in a needs assessment and, based on the outcome, develop a plan for an occupational therapy program. Fieldwork experience will be 1 day per week, 12 visits during the semester. In addition, students will meet weekly in a precepting group led by an occupational therapist to process the experience.

Prerequisites: OTH 703

OTH 691 Fieldwork Level IIb (9 credits)

This is a full-time three-month clinical experience under the supervision of an occupational therapist. Students will achieve competence in basic entry-level occupational therapy skills including evaluation, goal setting, treatment planning and implementation, discharge planning, and termination of services. This may take place in a variety of clinical or community settings.

Prerequisites: OTH 694

OTH 692 Current Issues Gerontology (3 credits)

Students will explore selected current topics in area of gerontology and the impact of the aging process on health and participation in occupations. Specific topics to be addressed in the course will be selected by students in collaboration with the course instructor. Students will integrate and apply knowledge from previous and current courses and field experiences.

OTH 693 Capstone Development 1 (2 credits)

Students will engage in experiential learning at their capstone site under the supervision of a professional who may or may not be an occupational therapist. Students will engage in a needs assessment and, based on the outcome, develop a plan for an occupation-based program. The experience will be a minimum of 30 hours on-site during the semester. In addition, students will meet in person for lectures led by a faculty to process the experience and to further the development of their capstone.

Prerequisites: OTH 704

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 694 Fieldwork Level IIa (9 credits)

This is a full-time three-month clinical experience under the supervision of an occupational therapist. Students will achieve competence in basic entry-level occupational therapy skills including evaluation, goal setting, treatment planning and implementation, discharge planning, and termination of services. This may take place in a variety of clinical or community settings.

OTH 696 Fieldwork Level IIb (6 credits)

This is a full-time three-month clinical experience under the supervision of an occupational therapist. Students will achieve competence in basic entry-level occupational therapy skills including evaluation, goal setting, treatment planning and implementation, discharge planning, and termination of services. This may take place in a variety of clinical or community settings.

OTH 697 Doctoral Experience Component (12 credits)

Students will engage in a fieldwork experience relative to their chosen content area under the supervision of an appropriate professional. The specific nature of the fieldwork will be defined by the student in collaboration with a faculty member and will entail a 16-week full-time experience.

OTH 698 Fieldwork Level IIb (9 credits)

This is a full-time three-month clinical experience under the supervision of an occupational therapist. Students will achieve competence in basic entry-level occupational therapy skills including evaluation, goal setting, treatment planning and implementation, discharge planning, and termination of services. This may take place in a variety of clinical or community settings.

OTH 699 Special Topics in OT (1-3 credits)

A special topics course highlights areas of the Occupational Therapy profession as practice and service contexts develop and change over time. These are for advanced learning and the refinement of abilities for the entry-level practitioner. These topics may change from term to term.
Attributes: Graduate

OTH 703 Doctoral Seminar III (1 credit)

This seminar is third in a series of 3 seminars which introduce the students to the professional role of the occupational therapist and a doctorally prepared practitioner. There will be an emphasis on occupational therapy professional writing with a focus on scholarship, and clinical and professional reasoning.

Prerequisites: OT 602 or OTH 602 (may be taken concurrently)

OTH 704 Doctoral Seminar 3 (3 credits)

This seminar is the third in a series of three seminars which refine student development into a doctorally prepared occupational therapist. There will be emphasis on professional writing with a focus on scholarship and professional development, and teaching in academia exploring concepts of curriculum and teaching pedagogy.

Prerequisites: OTH 603

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 705 OT Education Practicum (3 credits)

Students will synthesize and evaluate current theories regarding teaching and learning in occupational therapy education, and design classroom learning experiences for occupational therapy students. This course will require integration of previously acquired content knowledge and skills with both prior and new teaching and learning theories. Teaching experience will occur within select courses.

OTH 706 Doctoral Experiential (12 credits)

This course is the experiential portion of the doctoral capstone. Students will engage in an in-depth, individual full-time, 14-week experience in a mentored practice setting. Students will work on standard and individualized specific objectives during this experience.

Prerequisites: OTH 677

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 711 Doctoral Capstone Project (3 credits)

This course is the culmination of the capstone project, where the students complete and disseminate their capstone. This individual, mentored, capstone project synthesizes knowledge gained throughout the curriculum, relates directly to the capstone experience, and focuses on one or more of the following areas of study: clinical practice skills, research skills, administration, leadership, program and policy development, advocacy, and education. Students complete a project, write a report, and disseminate the project to the University community, and their experiential site, and plan for wider professional dissemination as appropriate.

Prerequisites: OT 675 or OTH 675 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Occupational Therapy. Enrollment is limited to Doctoral level students.

Attributes: Doctoral

OTH 737 Community Based OT (3 credits)

This course will develop advanced skills for community-based occupational therapy. Consultative and population based practices in a variety of contexts including therapy process, funding and resource development. The student will explain how to assess community needs, propose and design appropriate community programs for individuals and groups, implement a community program, and design an outcomes assessment measure. Students will develop a program proposal using community based concepts.

Prerequisites: OTH 660 (may be taken concurrently)

Pharmaceutical Marketing (PMK)

PMK 150 Smart Healthcare Consumer (3 credits)

By virtue of our birth, we are all consumers of healthcare. Becoming a smart healthcare consumer requires us to understand what having healthcare means as a patient as well as how the system of care works (or sometimes fails.) Additionally, it requires insights from the perspectives of various stakeholders, who either provide direct care (doctors, nurses or hospitals), or who indirectly participate by influencing, regulating, and/or paying for healthcare. The course will examine the doctor visit as a transaction and will evaluate the motivation of the various stakeholders. The course will also consider how disruptive technology and medical innovation influence the future of medicine.

Attributes: First-Year Seminar, Undergraduate

PMK 211 Pharmaceutical Mkt Environment (3 credits)

An introduction to the pharmaceutical industry and to the theory of marketing, as well as an overview of the dynamics of the healthcare industry with an emphasis on managed care, cost containment, disease management and accountable care organizations (ACO's). Additionally, students will learn a basic understanding of pharmacology. Prerequisite to all major concentration requirements. Open to all students.

Attributes: Undergraduate

PMK 221 Pharmaceutical Mkt Research (3 credits)

Covers the process that involves systematic gathering of quantitative and qualitative information that will help identify and resolve issues concerning patients, physicians and payers. Areas covered include problem recognition, research design, data collection, data analysis, results, and recommendations.

Prerequisites: PMK 211

Attributes: Undergraduate

PMK 331 Pharm Sales Management (3 credits)

Have you wanted to land your dream job, find your perfect mate, and achieve what you desire out of life? Learn the secrets and basic concepts of selling and persuasion to achieve your sales and life goals. Understand the concepts of applying science (clinical reprints) to communicate important information about your product, service, or your personal brand as it relates to sales, territory management, and pharmaceutical ethics. The course focuses on building relationships through role-play and improv exercises. Students will develop listening skills and learn how to handle objections while thinking on their feet.

Prerequisites: PMK 211

Attributes: Undergraduate

PMK 341 Pharm Channels & Pricing (3 credits)

The first half of the course describes the distribution process of pharmaceuticals, with concepts specific to designing and managing effective strategic channel relationships. The second half examines how firms set prices and the legal and policy ramifications of pricing.

Prerequisites: PMK 211

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Pharm. Healthcare Business.

Attributes: Undergraduate

PMK 351 Pharm Promotions Management (3 credits)

Covers advertising, direct marketing, promotions, e-marketing, ethical, legal and regulatory concerns associated with the promotion of pharmaceutical products.

Prerequisites: PMK 211

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Pharm. Healthcare Business.

Attributes: Undergraduate

PMK 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PMK 430 Brand Management (3 credits)

This course focuses on the essential principles, practices and leading-edge concepts of brand management to prepare students to lead a brand-centered, cross-functional marketing team. The course is designed to introduce the critical analytical, decision making, and planning frameworks and tools effective brand managers need at all stages of the product lifecycle. The emphasis in the course is to explore what every brand manager needs to know to operate successfully in any organization.

Attributes: Undergraduate

PMK 461 Pharm Mkt Strat & Plan I (3 credits)

The course focuses on strategy and planning development for a specific pharmaceutical product. This course focuses on teamwork and expands students' ability to synthesize critical functions in product management.

Prerequisites: PMK 211 and ENG 101 and PMK 221 and PMK 331 and PMK 341 and PMK 351

Attributes: Undergraduate, GEP: Writing Intensive

PMK 470 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PMK 471 Pharm Mkt Strat & Plan II (3 credits)

Drawing on the broad range of content covered in the first six courses, this capstone course integrates and builds on the foundations laid previously. This course addresses pharmaceutical corporate strategies including health policy issues with practical application through a number of formats: cases; exercises; simulations.

Prerequisites: (PMK 211 and PMK 221 and PMK 351 and PMK 341 and PMK 461)

Attributes: Undergraduate

PMK 491 Pharmaceutical Internship (1-3 credits)

The Pharmaceutical Internship enables students who have declared Pharmaceutical Marketing as their major to earn one (1) credit and enhance their knowledge in the sponsoring firm by working in the pharmaceutical or related industries as an intern. Students can earn up to three (3) credits by combining an internship with independent study. Credit is based on a review by the sponsoring faculty member of the student's circumstance, needs of the firm where the student is doing their internship and academic requirements of the sponsoring faculty member. The internship/independent study credits are counted as free electives and can only be applied to the semester during which the internship/independent study was taken.

Prerequisites: PMK 331 (may be taken concurrently) and PMK 351 (may be taken concurrently)

Attributes: Undergraduate

PMK 492 Pharmaceutical Internship (1-3 credits)

The Pharmaceutical Internship enables students who have declared Pharmaceutical Marketing as their major to earn one (1) credit and enhance their knowledge in the sponsoring firm by working in the pharmaceutical or related industries as an intern. Students can earn up to three (3) credits by combining an internship with independent study. Credit is based on a review by the sponsoring faculty member of the student's circumstance, needs of the firm where the student is doing their internship and academic requirements of the sponsoring faculty member. The internship/independent study credits are counted as free electives and can only be applied to the semester during which the internship/independent study was taken.

Prerequisites: PMK 331 (may be taken concurrently) and PMK 351 (may be taken concurrently)

Attributes: Undergraduate

PMK 600 Health Care Marketing (3 credits)

This course covers identifying market opportunities and different segments of the health care delivery system. It will also incorporate strategies and the application of the "4Ps": price, product, place, and promotion. The environment for the course will be managed care. MBA students should enroll in MKT 550.

Restrictions: Enrollment limited to students in the MBAPHMK program. Enrollment is limited to Graduate level students.

PMK 610 Business of Healthcare (3 credits)

The course provides an understanding of structure, conduct and performance of the healthcare industry in the U.S. it will provide a working knowledge of federal regulations and examine various strategies and strategic frameworks while discussing details about how the system operates. It will also review management concepts and how to apply them to solve business problems in the dynamic and evolving U.S. healthcare system.

Prerequisites: PMK 600 or MKT 550

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 620 Supply Chain Mgt in Healthcare (3 credits)

This course describes the distribution process of pharmaceuticals, medical devices, diagnostics and biologics with concepts specific to designing and managing strategic channel relationships.

Prerequisites: MKT 501 and (MKT 550 or PMK 600)

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 625 Pharmaceutical R&D (3 credits)

Traditionally the scientific and commercialization activities within pharmaceutical companies have existed as separate entities with varying relationships related to information sharing and integration of business strategy into the drug development and approval process. Enhanced linkage/collaboration between these two functions can lead to a competitive advantage as it relates to the attainment of the overall corporate research and commercial strategic objectives necessary for improving the business, marketing planning, and commercialization.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 630 Healthcare Marketing Analytics (3 credits)

In this course you will be taught the fundamental steps involved in the healthcare marketing research process. The course will expose you to the healthcare marketing research process using both primary and secondary data sources. Short case studies will be analyzed from the pharmaceutical, medical device, diagnostics and healthcare delivery industries. Special attention will be provided to several syndicate data sources. The course will also cover topics including problem definition, research objectives, research design, data analysis, interpretation of results and report development. Several advanced analytical techniques will be introduced as part of the course. This course can be beneficial to beginners in healthcare marketing research and to the users of marketing research information for decision-making.

Attributes: Graduate

PMK 640 Pharmacoeconomics (3 credits)

This course reviews the principal concepts of economics and the history and development of health economics. Additionally, it emphasizes the application and value of health economic studies through the use of examples from the pharmaceutical, biologic, medical device and diagnostic industries.

Prerequisites: MKT 501 and (MKT 550 or PMK 600)

Restrictions: Enrollment is limited to Graduate level students.

PMK 651 Life Sciences Promotion (3 credits)

This course provides students with a comprehensive framework and tools to understand the modern-day promotional process and the ever-changing digital media landscape. The students will learn about current industry trends, the role of brand manager, understanding the agency-client relationships, uncovering insights, utilizing data and technology, brand positioning, creative strategy, developing big ideas, social media, integrated production, and communications planning. Classes will be a combination real-world examples from the life sciences industry (pharma, biotech, MedTech etc.) Coursework involves a comprehensive group project that fosters learning in all functional areas of promotions, while simulating the development of an integrated marketing communication plan.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 660 Coding Coverage Reimbursement (3 credits)

The course provides information to help a healthcare professional understand how to run their practice as a business in the U.S. Background of coding systems to include ICD-10 and CPT, will be introduced along with case scenarios that reveal how a coding system links a procedure or product to the different reimbursement systems, such as Medicare and Medicaid, to get payment.

Prerequisites: MKT 550 or PMK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 665 Sales Management (3 credits)

This course covers the concepts and applies the theories associated with managing a sales force. Specifically, the course is designed to help students learn sales management concepts and how to apply them to solve business problems in the pharmaceutical industry. We will focus on the activities of first-line field sales managers. To function effectively as managers, students must know how salespeople perform their jobs. With this in mind, we will cover personal selling, account relationships, territory management, and sales ethics with special emphasis on current issues of managing strategic account relationships, team development, and diversity in the work force, sales force automation and ethical issues.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 670 Pricing in Healthcare Industry (3 credits)

This course examines how manufacturers of pharmaceuticals, medical devices, diagnostic and biologics set prices for their products as well as investigates the legal and policy ramifications of pricing.

Prerequisites: MKT 550 or PMK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 680 Healthcare Strategic Management (3 credits)

This course focuses on product/service decisions by an organization from the perspective of managers for healthcare services and new and established products and established brands. The course will also provide the framework for conducting strategic planning and execution based on marketing intelligence derived from market research. The strategic choices across different stages of the product of service life cycle will also be reviewed.

Prerequisites: PMK 600 or MKT 550

Attributes: Graduate

PMK 700 Managed Market Access (3 credits)

The objectives of this course are to understand the dynamics and trends of the evolving healthcare system, to review managed care's impact on pharmaceutical marketing and to develop strategies for success with the managed care customer. Students will learn to assess managed healthcare market segments, to determine the needs of this customer, and to identify the potential business opportunities for their company's brands.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 720 Global Healthcare Markets (3 credits)

This course focuses on the management of multinational corporations (MNCs) with particular emphasis on Pharmaceutical and/or medical device companies operating across different nations. The international environment implies greater opportunities as MNCs have access to a wider variety of markets and resources but this environment also implies greater organizational and managerial challenges. The aim of this course is to investigate whether these challenges are worth it and how they can contribute to a company's "double" bottom line.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 770 Independent Study (3 credits)

This course is designed to accommodate those students who have an interest in a research-worthy topic that can be examined on an independent research basis. The student will work closely with a professor on a research area that will require the identification of a topic, a literature review, appropriate methodology, and analysis.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 780 Future Issues (3 credits)

This course will be periodically offered to cover a variety of different topics that are timely, significant or contemporary. Each time the course is offered it will focus on a different topic specific to healthcare, biotechnology or pharmaceutical marketing. Examples of course topics include Obesity, New Product Launch, and the impact of Healthcare Reform on industry stakeholders.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PMK 795 Capstone (3 credits)

This integrative course is designed to permit students, near the end of the course of study, to integrate the knowledge from their previous courses. Also, this capstone course is intended to give students the opportunity to demonstrate the application of the concepts learned during their tenure in the program.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Pharmaceutical Sciences (PHS)

PHS 141 Intro Pharmaceutical Sciences (1 credit)

This introductory undergraduate course introduces students to academic life in STEM and engages students early on how to be successful early in the science field. Students interested in sciences, health sciences, medicine, drug discovery, drug development and cell gene therapy careers are welcome to join this fun and engaging lecture. It also includes an introduction to electronic search strategies, AI in academia, research and presentations by program faculty and senior students on their research and career paths.

Attributes: Undergraduate

PHS 151 Science Talk (1 credit)

This undergraduate seminar that students with faculty and experts in the field of Pharmaceutical and biopharmaceutical sciences and drug discovery and development by allowing the students to research a given field of interest, connect with alums and SJU professors to discuss and network. Students will research, present and attend presentations every week and engage in networking opportunities early on in the field of Pharmaceutical Sciences.

Attributes: Undergraduate

PHS 170 Special Topics: Pharm Sciences (3 credits)

Concentrated focus on a selected topic in Pharmaceutical Sciences.

Topic and content vary from semester to semester.

Attributes: Undergraduate

PHS 200 Biopharmaceutical Foundation I (3 credits)

Students in this course will connect concepts learned to real life application to human disease, pharmacology, and drug discovery. Biopharmaceutical foundations I lays a strong foundation to prepare students for subsequent and more advanced knowledge linked to the field of Drug Discovery and Development and provide a better understanding on how medicines work in the body. This course provides students with a introductory level understanding of structure, properties, biological functions, bioenergetics, and metabolic fate of macromolecules essential to life (i.e. proteins, lipids, carbohydrates, and nucleic acids), the impact of molecular genetics on these processes.

Prerequisites: CHM 210 and PHY 101 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 241 History Drug Discovery&Medicin (1 credit)

This undergraduate course introduces students to the history of pharmaceuticals and medicine. Students also learn the different areas of the drug development process and familiarize themselves with FDA regulations pertaining to each of these steps. This is an engaging course format with team base learning and discussions.

Attributes: Undergraduate

PHS 270 Special Topics: Pharm Sciences (3 credits)

Concentrated focus on a selected topic in Pharmaceutical Sciences.

Topic and content vary from semester to semester.

Attributes: Undergraduate

PHS 300 Biopharmaceutical Foundatn II (2 credits)

Biopharmaceutical Foundation II, is a 2-credit course designed to instruct students in the knowledge and applications of molecular biology, biotechnology, and genetics relevant to pharmaceutical sciences and drug discovery and development. Through lectures and interactive discussions, students delve into both basic and applied topics, including gene expression, DNA replication, recombinant DNA technology, pharmacogenomics, and biopharmaceuticals. Upon completion of the course, students will have acquired essential knowledge and practical skills to propel their studies forward and pursue careers in pharmaceutical research and development.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 301 Biopharmaceutical Foundatn III (3 credits)

PHS 301 is designed to provide students with a thorough understanding of physiological principles relevant to biopharmaceuticals. Building on Biopharmaceutical Foundation II, this course explores essential physiological systems, including the nervous, cardiovascular, respiratory, gastrointestinal, and endocrine systems. Through lectures, labs, and discussions, students explore physiological mechanisms impacting drug absorption, distribution, metabolism, and excretion, along with concepts like homeostasis, cellular signaling, and organ function. By course completion, students gain insight into drug action and metabolism, enabling them to analyze pharmacological data, assess drug efficacy and safety, and contribute to pharmaceutical research and development.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 302 Intro Lab Tech in Biomedicine (3 credits)

This pre-lecture course is designed to engage students in fundamentals of laboratory procedures, such as pipetting, preparation of buffers, animal handling, dosing, protein and enzyme assays, recording and interpretation of experimental data and results and calculations. These skills are further developed in PHS 306 in later semesters and will help students that are preparing to become scientists in the biopharmaceutical field. Each week, students will perform a laboratory exercise. A pre-laboratory lecture is included to familiarize students with the concepts and expectations of the laboratory exercise scheduled for the subsequent lab. Students who register for PHS 302 must also register for a PHS 302 laboratory. For example, if you register for PHS 302 you must, at the same time, register for a section of PHS 302L.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 302L Intro Lab Tech in Biomed Lab (0 credits)

This lab is designed to engage students in fundamentals of laboratory procedures, such as pipetting, preparation of buffers, animal handling, dosing, protein and enzyme assays, recording and interpretation of experimental data and results and calculations. These skills are further developed in PHS 306 in later semesters and will help students that are preparing to become scientists in the biopharmaceutical field. Each week, students will perform a laboratory exercise. A pre-laboratory lecture is included to familiarize students with the concepts and expectations of the laboratory exercise scheduled for the subsequent lab. Students who register for PHS 302 must also register for a PHS 302 laboratory. For example, if you register for PHS 302 you must, at the same time, register for a section of PHS 302L.

Attributes: Undergraduate

PHS 303 Pharma & Biopharmaceutics I (3 credits)

This undergraduate course is the accompanied lecture to PHS 303 L. It provides the theory of physicochemical and pharmaceutical principles for understanding the development, behavior, preparation, and stability of pharmaceutical dosage forms and drug delivery systems. Students who register for PHS 303 must also register for a PHS 303 laboratory. For example, if you register for PHS 303 you must, at the same time, register for a section of PHS 303L.

Prerequisites: CHM 210 and PHY 101

Attributes: Undergraduate

PHS 303L Pharma & Biopharmac I Lab (1 credit)

This lab provides students with the hands on physicochemical and pharmaceutical principles in the laboratory to gain the practical skills for understanding the development, behavior, preparation, and stability of pharmaceutical dosage forms and drug delivery systems in the lab. Students who register for PHS 303 must also register for a PHS 303 laboratory. For example, if you register for PHS 303 you must, at the same time, register for a section of PHS 303L.

Attributes: Undergraduate

PHS 304 Intro Drug Discovery & Dev (3 credits)

This undergraduate course allows students to gain insight into the process of drug discovery and development. By interacting with different experts in the field of drug discovery and development, students will learn about the steps to drug discovery including new target identification, selection and validation, screening of potential candidates, understanding the formulation process, packaging and delivery of new drugs, and finally being exposed to the important regulatory aspects of the drug discovery process and how it applies to taking novel discoveries to clinics and patients. This course also introduces basic concepts of medicinal chemistry as applied to drug discovery.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 306 Advanced Biomedical Methods (3 credits)

The undergraduate level lecture course is the accompanied lecture for PHS 306 L that familiarizes students with the theory and preparation time to set up advanced techniques utilized in the biomedical field including chromatography, dissolution, electrophoresis, protein assays, liquid chromatography and mass spectroscopy (LC-MS/MS), and basic cell culture related to biomedical field of research. Students who register for PHS 306 L must also register for a PHS 306 lecture. For example, if you register for PHS 306L you must, at the same time, register for a section of PHS 306.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 306L Adv Biomedical Methods Lab (0 credits)

This undergraduate lab course is the familiarizes students with advanced techniques utilized in the biomedical field including chromatography, dissolution, electrophoresis, protein assays, liquid chromatography and mass spectroscopy (LC-MS/MS), and basic cell culture related to biomedical field of research through hands on practice in the lab. Students who register for PHS 306 L must also register for a PHS 306 lecture. For example, if you register for PHS 306L you must, at the same time, register for a section of PHS 306.

Attributes: Undergraduate

PHS 308 Pharma and Biopharmaceutics I (3 credits)

This course provides the theoretical concepts related to the physicochemical and pharmaceutical principles for understanding the development, behavior, preparation, and stability of pharmaceutical dosage forms and drug delivery systems. Students who register for PHS 308 must also register for a PHS 308 laboratory. For example, if you register for PHS 308 you must, at the same time, register for a section of PHS 308L.

Prerequisites: PHY 101 and PHY 102 and CHM 125 and CHM 210

Attributes: Undergraduate

PHS 308L Pharma & Biopharmaceutics I Lab (0 credits)

This course provides hands-on experience in the lab to apply and develop practical knowledge related to physicochemical and pharmaceutical principles related to the development, behavior, preparation, and stability of pharmaceutical dosage forms and drug delivery systems. Students will actively participate and design experiments in the pharmaceuticals laboratory. Students who register for PHS 308 must also register for a PHS 308 laboratory. For example, if you register for PHS 308 you must, at the same time, register for a section of PHS 308L.

Attributes: Undergraduate

PHS 309 Pharm-Biopharmaceutics II (3 credits)

This undergraduate course will provide students with the fundamental principles of rate processes and their application to predicting and computing the rate of drug dissolution, absorption, distribution, metabolism, elimination, and pharmacological action. Engaging format and calculations practice time provided.

Prerequisites: CHM 210 and PHY 101

Attributes: Undergraduate

PHS 310 Biopharmaceutical Foundation I (3 credits)

This undergraduate course will teach students how to connect concepts learned to real life application to human disease, pharmacology, and drug discovery. Biopharmaceutical Foundations I lays a strong foundation to prepare students for subsequent and more advanced knowledge linked to the field of Drug Discovery and Development and provides a better understanding of how medicines work in the body. This course provides students with an introductory level understanding of structure, properties, biological functions, bioenergetics, and metabolic fate of macromolecules essential to life (i.e., proteins, lipids, carbohydrates, and nucleic acids), and the impact of molecular genetics on these processes.

Prerequisites: CHM 210 and PHY 101 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 311 Biopharmaceutical Foundatn II (2 credits)

This undergraduate course will engage students to learn about the knowledge and applications of molecular biology, biotechnology, and genetics relevant to pharmaceutical sciences and drug discovery and development. Through lectures and interactive discussions, students delve into both basic and applied topics, including gene expression, DNA replication, recombinant DNA technology, pharmacogenomics, and biopharmaceutics. Upon completion, students will have acquired essential knowledge and practical skills to propel their studies forward and pursue careers in pharmaceutical research and development.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 312 Systems Physiology (3 credits)

This undergraduate course is designed to provide students in pharmaceutical sciences with a thorough understanding of physiological principles relevant to biopharmaceuticals. This course explores essential physiological systems, including the nervous, cardiovascular, respiratory, gastrointestinal, and endocrine systems. Through lectures, labs, and discussions, students explore the physiological mechanisms impacting drug absorption, distribution, metabolism, and excretion, along with concepts like homeostasis, cellular signaling, and organ function. By course completion, students gain insight into drug action and metabolism, enabling them to analyze pharmacological data, assess drug efficacy and safety, and contribute to pharmaceutical research and development.

Prerequisites: BIO 101 and BIO 102

Attributes: Undergraduate

PHS 317 Pharm-Biopharmaceutics II (4 credits)

Study of the fundamental principles of rate processes and their application to predicting and computing the rate of drugdissolution, absorption, distribution, metabolism, elimination, and pharmacological action.

Attributes: Undergraduate

PHS 370 Special Topics: Pharm Sciences (3 credits)

Concentrated focus on a selected topic in Pharmaceutical Sciences.

Topic and content vary from semester to semester.

Attributes: Undergraduate

PHS 391 Pharm Sciences Seminar I (1 credit)

Pharmaceutical topics of ongoing and current interest are reviewed and presented by students, followed by questions fromthe audience. Emphasis is placed on learning to prepare and deliver a presentation.

Attributes: Undergraduate

PHS 400 Cosmetic Science (1-2 credits)

This undergraduate level course introduces students to the science of cosmetics. To achieve this, we will discuss the biology and chemistry of the two organs of application of cosmetics, the skin and the hair. In addition, discussion will also include the chemistry of the ingredients of cosmetics, and formulation strategies for cosmetics and trends in market. Formulation topics include moisturizing products (creams, lotions, anti-aging products), hair care products (shampoos, conditioners, etc.), and sunscreen products. Students who register for PHS 400 must also register for a PHS 400 laboratory. For example, if you register for PHS 400 you must, at the same time, register for a section of PHS 400L.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Attributes: Undergraduate

PHS 400L Cosmetic Science Lab (2 credits)

This undergraduate level course is designed to give the student practical experiences in cosmetics formulating techniques, particularly of the more common types of products. The aim of this course is to allow each student or group to use basic compounding tools to make small-scale but practical products and to use the same basic raw materials that go into commercial products. Overall the students will gain the knowledge and hands-on experience to prepare products with the same function and usefulness as those that are commercially available. Students will be in our state of the art pharmaceuticals laboratory preparing a variety of types of cosmetics formulations, such as moisturizing products (creams and lotions), hair care products (shampoos and conditioners), oral hygiene products (toothpastes and mouthwashes), beach products (sunscreen lotions, depilatories, and bleaching products), and lip care preparations (lipstick and lip gloss). Students who register for PHS 400 must also register for a PHS 400 laboratory. For example, if you register for PHS 400 you must, at the same time, register for a section of PHS 400L.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Attributes: Undergraduate

PHS 402 Controlled-Release Dosage Form (2 credits)

In this undergraduate level course, students will learn about the study of controlled-release (CR) drug dosage forms. Covers drug release profiles from conventional and nonconventional systems and their relevance in therapeutic outcomes. In this advanced course students will specialize their skill set in pharmaceutical and biopharmaceutics geared towards this specific mode of controlled formulation.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Attributes: Undergraduate

PHS 404 Seminar Pharmaceutical Science (1 credit)

Through this interdisciplinary undergraduate seminar led by faculty with expertise in pharmacology, toxicology, formulation and drug development, students will acquire experience using advanced AI search engine to select reliable literature and gain experience in reading and critically thinking and presenting a selected scientific publication to an engaged audience. Students will be trained on how to generate scientific presentations outline to build a scientific presentation, and use special software to generate graphical supporting working model that summarizes data, discussion and conclusions of the study in the field of Drug Discovery and Development and Cell gene therapy. The selected high impact scientific literature will include topics related to novel technologies related to drug development, cell and gene therapies, formulation as well as pharmacology and medicinal chemistry focused studies. Through this course students will understand how the scientific field moves forward one publication at a time by taking the audience through the journey of the scientific discoveries of the authors.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102 and PHY 101

Attributes: Undergraduate

PHS 411 Drug Development I (3 credits)

This undergraduate level course is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will understand the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 411 must also register for a PHS 411 laboratory. For example, if you register for PHS 411 you must, at the same time, register for a section of PHS 411L.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Attributes: Undergraduate

PHS 411L Drug Development I Lab (0 credits)

This undergraduate level lab is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will gain hands on experience in the lab related to the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 411 must also register for a PHS 411 laboratory. For example, if you register for PHS 411 you must, at the same time, register for a section of PHS 411L.

Attributes: Undergraduate

PHS 413 Drug Development II (3 credits)

In this undergraduate level course, students will learn about the study of controlled-release (CR) drug dosage forms. Covers drug release profiles from conventional and nonconventional systems and their relevance in therapeutic outcomes. In this advanced course students will specialize their skill set in pharmaceutical and biopharmaceutics geared towards this specific mode of controlled formulation.

Prerequisites: PHY 101 and CHM 125 and PHY 102 and CHM 210

Attributes: Undergraduate

PHS 414 Advanced Pharmaceutical Analysis (3 credits)

This course offers a dynamic exploration into the realm of pharmaceutical analytics, set against the engaging backdrop of a cell manufacturing process. This course provides students with invaluable hands-on experience, bridging the gap between theoretical knowledge and practical application in both manufacturing and analytical roles within the pharmaceutical industry. Through direct involvement in a comprehensive cell manufacturing process and exposure to cutting-edge batch release analytical technologies, students will acquire skills and insights that directly translate into competencies required for success in analytical and manufacturing positions in the pharmaceutical sector. Students who register for PHS 414 must also register for a PHS 414 laboratory. For example, if you register for PHS 414 you must, at the same time, register for a section of PHS 414L.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHS 414L Advanced Pharma Analysis Lab (0 credits)

This lab offers a dynamic exploration into the realm of pharmaceutical analytics, set against the engaging backdrop of a cell manufacturing process. This course provides students with invaluable hands-on experience, bridging the gap between theoretical knowledge and practical application in both manufacturing and analytical roles within the pharmaceutical industry. Through direct involvement in a comprehensive cell manufacturing process and exposure to cutting-edge batch release analytical technologies, students will acquire skills and insights that directly translate into competencies required for success in analytical and manufacturing positions in the pharmaceutical sector. Students who register for PHS 414 must also register for a PHS 414 laboratory. For example, if you register for PHS 414 you must, at the same time, register for a section of PHS 414L.

Attributes: Undergraduate

PHS 450 Manufacturing Pharmacy (2 credits)

This undergraduate level course is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will understand the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 450 must also register for a PHS 450 laboratory. For example, if you register for PHS 450 you must, at the same time, register for a section of PHS 450L.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

PHS 450L Manufacturing Pharmacy Lab (1 credit)

This undergraduate level course provides engaging hands on experiences in techniques utilized in Drug Development in the Pharmaceutical Industry. This course mirrors practices associated with manufacturing large-scale batches of products while keeping accurate and detailed records of the manufacturing process through use of a batch record and recording appropriate observations. Specifically students will get advanced hands on experience using manufacturing level equipment to produce creams and lotions, tablets and capsule formulations and delve into the techniques such as homogenizer, tablet press and coating and important quality control involved in drug development and testing such as hardness, fragility and disintegration testing as well as learning how to operate capsule filling equipment and spheronizer, extruder and granulator. Students who register for PHS 450 must also register for a PHS 450 laboratory. For example, if you register for PHS 450 you must, at the same time, register for a section of PHS 450L.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

PHS 470 Special Topics: Pharm Sciences (3 credits)

Concentrated focus on a selected topic in Pharmaceutical Sciences.

Topic and content vary from semester to semester.

Attributes: Undergraduate

PHS 495 Analysis of Current Literature (1-3 credits)

Analysis and discussion of current literature in areas of interest in pharmaceuticals. Papers are presented informally by students and faculty.

Prerequisites: CHM 210 and CHM 215 and PHY 101

Attributes: Undergraduate

PHS 700 Cosmetic Science (1-2 credits)

This graduate level course introduces students to the science of cosmetics. To achieve this, we will discuss the biology and chemistry of the two organs of application of cosmetics, the skin and the hair. In addition, discussion will also include the chemistry of the ingredients of cosmetics, and formulation strategies for cosmetics and trends in market. Formulation topics include moisturizing products (creams, lotions, anti-aging products), hair care products (shampoos, conditioners, etc.), and sunscreen products. Students who register for PHS 700 must also register for a PHS 700 laboratory. For example, if you register for PHS 700 you must, at the same time, register for a section of PHS 700L. *Restrictions:* Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 700L Cosmetic Science Lab (2 credits)

This graduate level course introduces students to the science of cosmetics. To achieve this, we will discuss the biology and chemistry of the two organs of application of cosmetics, the skin and the hair. In addition, discussion will also include the chemistry of the ingredients of cosmetics, and formulation strategies for cosmetics and trends in market. Formulation topics include moisturizing products (creams, lotions, anti-aging products), hair care products (shampoos, conditioners, etc.), and sunscreen products. Students who register for PHS 700 must also register for a PHS 700 laboratory. For example, if you register for PHS 700 you must, at the same time, register for a section of PHS 700L. *Restrictions:* Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 701 Cosmetic Science (1 credit)

This graduate level course introduces students to the science of cosmetics. To achieve this, we will discuss the biology and chemistry of the two organs of application of cosmetics, the skin and the hair. In addition, discussion will also include the chemistry of the ingredients of cosmetics, and formulation strategies for cosmetics and trends in market. Formulation topics include moisturizing products (creams, lotions, anti-aging products), hair care products (shampoos, conditioners, etc.), and sunscreen products. The principles learned here also can apply to drug development process with special formulations. Students who register for PHS 701 must also register for a PHS 701 laboratory. For example, if you register for PHS 701 you must, at the same time, register for a section of PHS 701L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 701L Cosmetic Science Lab (2 credits)

This lab is designed to give the student practical experiences in cosmetics formulating techniques, particularly of the more common types of products. The aim of this course is to allow each student or group to use basic compounding tools to make small-scale but practical products and to use the same basic raw materials that go into commercial products. Overall the students will gain the knowledge and hands-on experience to prepare products with the same function and usefulness as those that are commercially available. Students will be in our state of the art pharmaceuticals laboratory preparing a variety of types of cosmetics formulations, such as moisturizing products (creams and lotions), hair care products (shampoos and conditioners), oral hygiene products (toothpastes and mouthwashes), beach products (sunscreen lotions, depilatories, and bleaching products), and lip care preparations (lipstick and lip gloss). The principles learned here also can apply to drug development process with special formulations. Students who register for PHS 701 must also register for a PHS 701 laboratory. For example, if you register for PHS 701 you must, at the same time, register for a section of PHS 701L.

Attributes: Doctoral, Graduate

PHS 702 Controlled-Release Dosage Form (2 credits)

In his graduate level course, study of controlled-release (CR) drug dosage forms. Covers drug release profiles from conventional and nonconventional systems and their relevance in therapeutic outcomes.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 703 Pharma & Biopharmaceutics I (3 credits)

This graduate level course, provides the physicochemical and pharmaceutical principles for understanding the development, behavior, preparation, and stability of pharmaceutical dosage forms and drug delivery systems. Students who register for PHS 703 must also register for a PHS 703 laboratory. For example, if you register for PHS 703 you must, at the same time, register for a section of PHS 703L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 703L Pharmaceutics Laboratory (1 credit)

Students who register for PHS 703 must also register for a PHS 703 laboratory. For example, if you register for PHS 703 you must, at the same time, register for a section of PHS 703L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 704 Intro Drug Discovery & Dev (3 credits)

This graduate level course will allow students to gain insight into the process of drug discovery and development. By interacting with different experts in the field of drug discovery and development, students will learn about the steps to drug discovery including new target identification, selection and validation, screening of potential candidates, us virtual reality technology (VR) to experience receptor-ligand interactions in 3 dimensional space, understanding the formulation process, packaging and delivery of new drugs and finally being exposed to to the important regulatory aspects of the drug discovery process and how it applies to taking novel discoveries to clinic and patients.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 705 Seminar Pharmaceutical Science (1 credit)

Through this interdisciplinary graduate seminar led by faculty with expertise in pharmacology, toxicology, formulation and drug development, students will acquire experience using advanced AI search engine to select reliable literature and gain experience in reading and critically thinking and presenting a selected scientific publication to an engaged audience. Students will be trained on how to generate scientific presentations outline to build a scientific presentation, and use special software to generate graphical supporting working model that summarizes data, discussion and conclusions of the study in the field of Drug Discovery and Development and Cell gene therapy. The selected high impact scientific literature will include topics related to novel technologies related to drug development, cell and gene therapies, formulation as well as pharmacology and medicinal chemistry focused studies. Through this course students will understand how the scientific field moves forward one publication at a time by taking the audience through the journey of the scientific discoveries of the authors.

Attributes: Doctoral, Graduate

PHS 706 Advanced Biomedical Methods (3 credits)

The graduate level course will familiarize students with advanced techniques utilized in the biomedical field through hands on training on techniques including chromatography, dissolution, electrophoresis, protein assays, liquid chromatography and mass spectroscopy (LC-MS/MS) and basic cell culture as it applies to the field of Pharmaceutical Sciences. Students who register for PHS 706 must also register for a PHS 706 laboratory. For example, if you register for PHS 706 you must, at the same time, register for a section of PHS 706L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 706L Adv Biomedical Methods Lab (0 credits)

This graduate level lab course is the familiarizes students with advanced techniques utilized in the biomedical field including chromatography, dissolution, electrophoresis, protein assays, liquid chromatography and mass spectroscopy (LC-MS/MS), and basic cell culture related to biomedical field of research through hands on practice in the lab. Students who register for PHS 706 must also register for a PHS 706 laboratory. For example, if you register for PHS 706 you must, at the same time, register for a section of PHS 706L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 709 Pharm-Biopharmaceutics II (3 credits)

In this graduate level course you will study of the fundamental principles of rate processes and their application to predicting and computing the rate of drug dissolution, absorption, distribution, metabolism, elimination, and pharmacological action.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 711 Drug Development I (3 credits)

This graduate level course is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will understand the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 711 must also register for a PHS 711 laboratory. For example, if you register for PHS 711 you must, at the same time, register for a section of PHS 711L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 711L Drug Development I Lab (0 credits)

This graduate level course is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will understand the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 711 must also register for a PHS 711 laboratory. For example, if you register for PHS 711 you must, at the same time, register for a section of PHS 711L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 712 Systems Physiology (3 credits)

This graduate level course designed to provide students in pharmaceutical sciences with a thorough understanding of physiological principles relevant to biopharmaceuticals. This course explores essential physiological systems, including the nervous, cardiovascular, respiratory, gastrointestinal, and endocrine systems. Through lectures, labs, and discussions, students explore the physiological mechanisms impacting drug absorption, distribution, metabolism, and excretion, along with concepts like homeostasis, cellular signaling, and organ function. By course completion, students gain insight into drug action and metabolism, enabling them to analyze pharmacological data, assess drug efficacy and safety, and contribute to pharmaceutical research and development.

Attributes: Doctoral, Graduate

PHS 713 Drug Development II (3 credits)

In this graduate level course you will study of controlled release (CR) drugs dosage forms. Covers drug release profiles from conventional and non conventional systems and their relevance in therapeutics and outcomes.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 714 Advanced Pharma Analysis (1 credit)

This course explores in depth of all major analytical instruments utilized in Pharmaceutical Industry, especially those that can be utilized for specialized and precise characterization during drug discovery and development in the Pharmaceutical Industry. This course is the pre-lab that will help prepare students to be trained on these instruments in the lab. Students who register for PHS 714 must also register for a PHS 714 laboratory. For example, if you register for PHS 714 you must, at the same time, register for a section of PHS 714L.

Restrictions: Enrollment limited to students in the PPBS, PPMS or PPPHD programs. Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 714L Advanced Pharma Analysis Lab (2 credits)

This course provides hands on training on all major analytical instruments in the laboratory utilized in pharmaceutical industry, especially those that provide specialized and precise characterization during drug discovery and development processes. This course is a lab. Students who register for PHS 714 must also register for a PHS 714 laboratory. For example, if you register for PHS 714 you must, at the same time, register for a section of PHS 714L.

Restrictions: Enrollment limited to students in the PPBS, PPMS or PPPHD programs. Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 717 Pharm-Biopharmaceutics II (4 credits)

In this graduate level course, you will study of the fundamental principles of rate processes and their application to predicting and computing the rate of drug dissolution, absorption, distribution, metabolism, elimination, and pharmacological action.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 750 Manufacturing Pharmacy (2 credits)

This graduate level course is needed for students joining the Pharmaceutical Industry (drug development) or for those interested in both the science and regulations (regulatory affairs) behind the manufacturing stages of pharmaceutical products (drugs, medical preparations and devices). Specifically, this course trains students on the technology and processes involved in industrial preparation of common dosage forms such as tablets and capsules. Students will be introduced to Good Manufacturing Practice (GMP) and best practices currently used in the Pharmaceutical industry through taught by our knowledgeable faculty and invited speakers from the industry. Upon completion students will understand the basic operating structure of a typical major manufacturers of pharmacy products, gain an understanding of the regulatory and historical aspects of these processes, describe manufacturing stages in the industry and be involved in discussing and understanding the ethical and moral aspects and impact to proper manufacturing. Students who register for PHS 750 must also register for a PHS 750 laboratory. For example, if you register for PHS 750 you must, at the same time, register for a section of PHS 750L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 750L Manufacturing Pharmacy Lab (1 credit)

This graduate level course provides engaging hands on experiences in techniques utilized in Drug Development in the Pharmaceutical Industry. This course mirrors practices associated with manufacturing large-scale batches of products while keeping accurate and detailed records of the manufacturing process through use of a batch record and recording appropriate observations. Specifically students will get advanced hands on experience using manufacturing level equipment to produce creams and lotions, tablets and capsule formulations and delve into the techniques such as homogenizer, tablet press and coating and important quality control involved in drug development and testing such as hardness, fragility and disintegration testing as well as learning how to operate capsule filling equipment and spheronizer, extruder and granulator. Students who register for PHS 750 must also register for a PHS 750 laboratory. For example, if you register for PHS 750 you must, at the same time, register for a section of PHS 750L.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 751 Advanced Pharmaceutics (3 credits)

This course presents the areas of pharmaceutical sciences and drug delivery at an advanced level. The topics include physical properties of drugs, ionic equilibria, solubility and related phenomena, drug diffusion and permeability, drug stability, interfacial phenomena, colloids, micromeritics, drug dissolution, and biomaterials.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 760 Regulatory Issues in Pharma (2-3 credits)

This graduate level course covers in depth the various steps in the process of filing drug approval applications inclusive of processes involved in all FDA-regulated therapies such as cell gene therapy.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 761 Pharmaceutical Product Dev (3 credits)

This course focuses on the process of drug development from laboratory to scale-up.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 762 Pre-formulation and Phys Pharm (3 credits)

This graduate level course is an introductory course in the study of pharmaceutical materials for their physico-chemical properties as they pertain to the development of formulations.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 763 Res Proj in Drug Dev & Ind Pha (3 credits)

This graduate level course an advanced level research project in a selected area of drug delivery systems. This course can be taken multiple times.

Prerequisites: PHS 761

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 770 Special Topics (4 credits)

Topics of interest in Pharmaceutical Sciences that are not covered in a regularly offered course. Content and structure of the course are determined by the course supervisor. The special topic(s) for a given semester will be announced prior to registration.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 799 Master's Research (1-10 credits)

This graduate level course students in the master of science degree program (thesis option) specializing in pharmaceuticals are required to complete a research project under the direction of a member of the graduate faculty in pharmaceuticals.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 800 Biopharmaceutical Foundatn II (2 credits)

Biopharmaceutical Foundation II, is a graduate level course designed to instruct students in the knowledge and applications of molecular biology, biotechnology, and genetics relevant to pharmaceutical sciences and drug discovery and development. Through lectures and interactive discussions, students delve into both basic and applied topics, including gene expression, DNA replication, recombinant DNA technology, pharmacogenomics, and biopharmaceutics. Upon completion of the course, students will have acquired essential knowledge and practical skills to propel their studies forward and pursue careers in pharmaceutical research and development.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 802 Intro Lab Tech and Biomedicine (3 credits)

This graduate level course is designed to engage students in advanced and applied fundamentals of laboratory procedures, such as pipetting, preparation of buffers, animal handling, dosing, protein and enzyme assays, recording and interpretation of experimental data and results and calculations. These skills will help students that are preparing to become scientists in the biopharmaceutical field. Each week, students will perform a laboratory exercise. A pre-laboratory lecture is included to familiarize students with the concepts and expectations of the laboratory exercise scheduled for the subsequent lab.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 804 Intro Drug Discovery and Dev (3 credits)

This course will allow students to gain advanced insight into the process of drug discovery and development. By interacting with different experts in the field of drug discovery and development, students will learn about the steps to drug discovery including new target identification, selection and validation, screening of potential candidates, understanding the formulation process, packaging and delivery of new drugs and finally being exposed to the important regulatory aspects of the drug discovery process and how it applies to taking novel discoveries to clinic and patients. This course also introduces advanced concepts of medicinal chemistry as applied to drug discovery.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 806 Research Literature & Seminar (2 credits)

This graduate-level seminar includes weekly presentations by graduate students, faculty, and guest scientists on current research topics and journal articles relevant to the fields of Drug Discovery and Development and cell gene therapy. Each session is followed by group discussions to foster critical thinking and collaboration. Attendance and active participation are required during the fall and spring semesters.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 811 Drug Diffusion and Controlled (2 credits)

This graduate level course covers the theory of drug permeation through polymer and biological membranes. The mechanistic basis for controlled delivery devices and specialized delivery systems is discussed.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 813 Design of Experiments (2 credits)

This graduate level course the student is provided a review of concepts in basic statistics and then a development of those concepts into approaches to the statistical design of experiments that allow screening of factors and eventual optimization of conditions. Emphasis is placed on applications to preformulation studies and formulation of drug products.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 851 Advanced Pharmaceutics (3 credits)

This graduate level course presents the areas of pharmaceutical sciences and drug delivery at an advanced level. The topics include physical properties of drugs, ionic equilibria, solubility and related phenomena, drug diffusion and permeability, drug stability, interfacial phenomena, colloids, micromeritics, drug dissolution, and biomaterials.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 860 Regulatory Issues in Pharma (2 credits)

This graduate level course covers in depth the various steps in the process of filing drug approval applications inclusive of processes involved in all FDA-regulated therapies such as cell gene therapy.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHS 875 Drug Dynamics (3 credits)

Focuses on determination of pharmacokinetic parameters using compartment models. Other topics include statistical moments, protein binding, clearance volume of distribution, nonlinear pharmacokinetics, and pharmacodynamics. Experimental data will be used to correlate practical applications with theory.

Attributes: Doctoral, Graduate

PHS 880 Pharmaceutical Polymers (3 credits)

Covers the physical properties and characterization methods for polymeric materials, specifically as they apply to the design of pharmaceutical dosage forms and drug delivery systems.

PHS 890 Pharmaceutics Seminar (1 credit)

Presentation of recent research by current graduate students and invited guests will be followed by group discussion.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

PHS 895 Analysis of Current Literature (2 credits)

Analysis and discussion of current literature in areas of interest in pharmaceutics. Papers are presented informally by students and faculty.

PHS 899 Doctoral Research (1-10 credits)

Students in the doctor of philosophy degree program specializing in pharmaceutics are required to fulfill their research requirement under the direction of a member of the graduate faculty in pharmaceutics.

Pharmacology (PHT)

PHT 305 Fundamentals of Pharmacology (3 credits)

Basic principles and therapeutic approaches to the treatment of diseases. Students will be introduced to the role and actions of drugs and their classes as they relate to biological receptors, disease, health, and body systems.

PHT 306 Biomethods in Pharmac & Tox (3 credits)

Survey of biological methods employed in pharmacology and toxicology to assess efficacy and safety of drugs and chemicals. Experiments are designed to illustrate pharmacological principles and to detect and evaluate potential local and systemic toxicities.

PHT 307 Introduction to Toxicology (2 credits)

"his course introduces the basic principles of the effects of toxic substances on biological systems, including consideration of the history, scope, and applications of toxicology, toxicant exposure, the mechanisms of toxic action, some major types of toxicants, and fundamental methods of toxicology studies. Students will apply the basic principles of toxicology to evaluate the safety risks in preclinical, environmental, and forensic studies and practices

PHT 320 Techniques in Pharmacol & Tox (2 credits)

A laboratory course designed to familiarize students with standard methodology used to assess drug and chemical safety.

Restrictions: Enrollment is limited to Undergraduate Division level students.

PHT 340 Intro Neuropsychopharmacology (3 credits)

This course will provide a working knowledge of the neurobiological and neurochemical basis of behavior and the mechanism by which drugs influence synaptic neurotransmission to alter behavior and function in neurologic and psychiatric disorders.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

PHT 402 Advanced Pharmacology (3 credits)

This undergraduate level course will introduce concepts involved in drug discovery and development with an emphasis on drug actions in the body. Principles of medicinal chemistry, pharmacokinetics, pharmacodynamics and pharmacogenomics will be explored from a theoretical standpoint with integration of chemical and biological principles. This course engages students to think critically through medicinal chemistry concepts and designs including functional groups, isomerism, bonding, physicochemical properties, salts, and prodrugs while being able to delve into examples of structure activity relationships with regard to interactions between drugs and their targets. A large emphasis on interaction between a ligand and its target (receptors, signaling cascades, second messengers, enzymes, transporters, etc.) and methodology and experimental design at the preclinical level describing the processes and parameters that determine absorption, distribution, metabolism, and excretion/elimination (ADME) of chemicals will also be covered.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHT 403 Advanced Toxicology (3 credits)

This course introduces the biochemical, genetic, cellular basis of cytotoxicity associated with current treatment therapies (small molecules, biologics and cell gene therapy etc.). Based on this knowledge, the course will study the toxic effects and their underlying mechanisms in different organ systems (e.g., liver, kidney, lung, eye, immunity, endocrine, and reproductive system). Emphasis on key adverse effects of cell gene therapy will also be introduced. In this course students will learn to link the toxicology branch of therapies and medications to the regulatory aspect of the drug development process inclusive of cell gene therapy.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

PHT 405 Pharmacology in Drug Discovery (3 credits)

This course will describe pharmacological classes of therapeutic agents with emphasis on mechanisms of actions and medicinal chemistry as well as introducing the therapies included in the rapidly expanding Cell Gene and Therapy (CGT drug product formulation) and key biologics (large protein molecules). The students will learn the mechanisms of actions and medicinal chemistry linked to effectiveness and side effects of these current therapies. Structure activity function related to drug design will also be introduced for several drugs discussed. Students will also participate in interactive learning related to special topics in pharmacology through engaging discussions guided by relevant and high impact literature.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHT 407 Tox Subst Use Disorder (Appld) (3 credits)

Students will develop a working knowledge of the key neurotransmitters and mechanisms involved in substance use disorders. They will also explore the neurobiological and neurochemical theories proposed for different types of substance use disorders. Students will delve into the neurotoxicology of both the central and peripheral nervous systems, as well as gain insights into the principles of drug metabolism for substances with abuse potential. Lastly, they will examine the mechanisms through which substance use can modify behavior and mood, ultimately leading to the development of disease states.

Prerequisites: CHM 210 and CHM 215 and BIO 101 and BIO 102

Attributes: Undergraduate

PHT 421 Advanced Medicinal Chem/Pharm (4 credits)

This course will introduce concepts involved in drug actions in the body. Principles of medicinal chemistry, pharmacokinetics, pharmacodynamics and pharmacogenomics will be explored from a theoretical standpoint with integration of chemical and biological principles.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

PHT 440 Drug Disc Neurodegenerative (3 credits)

The goal of this course is to examine the drug discovery process for neurodegenerative disorders. Using Alzheimer's disease as a model, we will examine the diagnosis, epidemiology, current therapeutics, and strategies for drug discovery. The in vitro disease models with resulting outcomes in translational studies will be discussed. At the end of the course students will utilize NIH guidelines to develop their own proposal for future studies.

PHT 450 Analysis of Publications (1-3 credits)

The purpose of this course is to use the information learned from retracted scientific papers in the medical/pharmaceutical field to teach many aspects of scientific publication. The class will discuss the specific reasons for the retractions, for example, errors in data, plagiarism, or fraudulent data including manipulated photo images. Using data from subsequent publications that led to the particular retraction, we will analyze the original data in terms of the rigor of statistics, reproducibility, and hints of data manipulation. We will also analyze the impact of the retracted papers on the scientific concepts and to public health. A retracted paper means that the particular data no longer exist in the literature; therefore in this course, we will discuss the ethics and responsibility of authorship, including coauthors. We will also discuss the process of scientific publication and the peer review process that varies widely among journals. Examples of the adverse consequences of retracted papers to medical science, to the biomedical community, and to the public at large will be given in class and discussed in terms of the responsibility of scientists and the ethics in scientific publications. For students electing to receive a letter grade in the course, two written assignments will be required.

Attributes: Undergraduate

PHT 470 Special Topics Pharmacology (4 credits)

This course will describe pharmacological classes of therapeutic agents with emphasis on mechanisms of actions at the cellular and organ levels. Students will also participate in interactive learning related to special topics in pharmacology.

Attributes: Undergraduate

PHT 471 Special Topics in Toxicology (3 credits)

This course considers special topics related to organ-specific pathology and applications of clinical toxicology. Special topics may include substance use disorders, cancer therapeutics, immunotherapy, nanotherapy, and the toxicology of medical devices. The course will provide a working knowledge of toxicology principles that impact specific disease states and therapy.

PHT 495 Independent Research Project (1-4 credits)

This course is a research opportunity for students to work with a faculty mentor in the field of Drug Discovery & Development and Cell Gene Therapy to gain insight and skills in research literature interpretation, hypothesis testing, laboratory measures, and data analysis, as well as research summarization and conclusion generation, with poster preparation and data presentation to a broad audience. Faculty mentor and student should agree upon the specific objectives and expectations for the course at the beginning of the course. This course can be taken multiple times to satisfy free electives.

Attributes: Undergraduate

PHT 702 Advanced Pharmacology (3 credits)

This graduate level course will introduce concepts involved in drug discovery and development with an emphasis on drug actions in the body. Principles of medicinal chemistry, pharmacokinetics, pharmacodynamics and pharmacogenomics will be explored from a theoretical standpoint with integration of chemical and biological principles. This course engages students to think critically through medicinal chemistry concepts and designs including functional groups, isomerism, bonding, physicochemical properties, salts, and prodrugs while being able to delve into examples of structure activity relationships with regard to interactions between drugs and their targets. A large emphasis on interaction between a ligand and its target (receptors, signaling cascades, second messengers, enzymes, transporters, etc.) and methodology and experimental design at the preclinical level describing the processes and parameters that determine absorption, distribution, metabolism, and excretion/elimination (ADME) of chemicals will also be covered.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 703 Advanced Toxicology (3 credits)

This graduate level course introduces the biochemical, genetic, cellular basis of cytotoxicity associated with current treatment therapies (small molecules, biologics and cell gene therapy etc.). Based on this knowledge, the course will study the toxic effects and their underlying mechanisms in different organ systems (e.g., liver, kidney, lung, eye, immunity, endocrine, and reproductive system). Emphasis on key adverse effects of cell gene therapy will also be introduced. In this course students will learn to link the toxicology branch of therapies and medications to the regulatory aspect of the drug development process inclusive of cell gene therapy.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Graduate

PHT 705 Pharmacology in Drug Discovery (3 credits)

This graduate level course will describe pharmacological classes of therapeutic agents with emphasis on mechanisms of actions and medicinal chemistry as well as introducing the therapies included in the rapidly expanding Cell Gene and Therapy (CGT drug product formulation) and key biologics (large protein molecules). The students will learn the mechanisms of actions and medicinal chemistry linked to effectiveness and side effects of these current therapies. Structure activity function related to drug design will also be introduced for several drugs discussed. Students will also participate in interactive learning related to special topics in pharmacology through engaging discussions guided by relevant and high impact literature.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 707 Tox Subst Use Disorder (Appld) (3 credits)

This graduate level course will develop a working knowledge of the key neurotransmitters and mechanisms involved in substance use disorders. They will also explore the neurobiological and neurochemical theories proposed for different types of substance use disorders. Students will delve into the neurotoxicology of both the central and peripheral nervous systems, as well as gain insights into the principles of drug metabolism for substances with abuse potential. Lastly, they will examine the mechanisms through which substance use can modify behavior and mood, ultimately leading to the development of disease states.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 709 Research Project Drug Discov (1-4 credits)

This graduate level course is interactive learning lab with capstone built to simulate an internship in industry projects and research. in Drug Discovery & Cell Gene Therapy. Students can either elect to research literature on topics guided by mentoring faculty and write a semester project paper (dissertation style) and give a presentation to content experts in the Department (self-paced) or can choose to engage in a research faculty's research (drug discovery or cell gene therapy) to gain experience on hands on techniques utilized in the research and field of drug discovery and present their research findings through a semester project paper and presentation.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 720 Intro to Neuropsychopharmacology (3 credits)

This graduate level course will provide a working knowledge of the neurobiological and neurochemical basis of behavior and the mechanism by which drugs influence synaptic neurotransmission to alter behavior and function in neurologic and psychiatric disorders.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 721 Advanced Medicinal Chem/Pharm (4 credits)

This graduate level course will introduce concepts involved in drug actions in the body. Principles of medicinal chemistry, pharmacokinetics, pharmacodynamics and pharmacogenomics will be explored from a theoretical standpoint with integration of chemical and biological principles.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 740 Drug Disc Neurodegenerative (3 credits)

The goal of this graduate level course is to examine the drug discovery process with focus on neurodegenerative disorders. Using Alzheimer's disease for illustration, we will examine diagnosis, epidemiology, current therapeutics, strategies for drug discovery (amyloid hypothesis, tau, apo E, insulin, and various receptors) in vitro and in vivo disease models. We will examine the in vivo models to see how well they simulate the disease and thus how reliable they may be in translational studies. Although the focus of the course is on preclinical studies, we will examine how some of the compounds that have done well in preclinical studies have fared in clinical studies thus illustrating challenges in this field.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 750 Research Ethics and Conduct (1-3 credits)

This graduate level course discusses research ethics and conduct as it relates to Drug Discovery & Development and Cell Gene Therapy (CGT). There will be modules of different topics which will be self-paced and engaging through literature and web based searches, discussions, presentations and papers and real life examples that will be described throughout the semester. Discussions around ethics will include AI, data manipulation, gene editing, healthy donor cells storage and use in cell gene therapy, autologous cell therapy.

Restrictions: Enrollment limited to students in the PPBS, PPMS or PPPHD programs. Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 752 Intro Scientific Data Analysis (1 credit)

This graduate level course is designed to give an introduction to the important foundation of science related to data generation, validation and analysis and conduct in research. In this advanced course students will learn how to accurately analyze data. In this course we will discuss the source of errors and interpretation of statistical p-value, as well as dive into the statistical tests most commonly used in studies related to Drug Discovery & Development (DDD) and Cell Gene Therapy (CGT). We will also discuss the ethics in conducting research. This course can be taken as a "stand alone" course as well as in conjunction with the existing PHT750 courses to satisfy students who need 3-credit electives.

Restrictions: Enrollment limited to students in the PPBS, PPMS or PPPHD programs. Enrollment is limited to Doctoral or Graduate level students.

PHT 770 Special Topics in Pharmacology (4 credits)

This graduate level course will describe pharmacological classes of therapeutic agents with emphasis on mechanisms of actions at the cellular and organ levels. Students will also participate in interactive learning related to special topics in pharmacology.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 799 Master's Research (1-10 credits)

Candidates for the master of science degree complete an independent research project, equivalent to at least 10 research credits, under the direction of an Advisory Committee of graduate faculty.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 801 Research Lit in Pharm/Tox (1 credit)

Weekly presentations by graduate students and faculty on current research papers from journals relevant to the fields of pharmacology and toxicology, followed by group discussion. Attendance and active participation are required during fall and spring semesters.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 802 Advanced Pharmacology (3 credits)

This course will introduce concepts involved in drug actions in the body. Principles of medicinal chemistry, pharmacokinetics, pharmacodynamics and pharmacogenomics will be explored from a theoretical standpoint with integration of chemical and biological principles. This course engages students to think critically through medicinal chemistry concepts and designs including functional groups, isomerism, bonding, physicochemical properties, salts, and prodrugs while being able to delve into examples of structure activity relationships with regard to interactions between drugs and their targets. A large emphasis on interaction between a ligand and its target (receptors, signaling cascades, second messengers, enzymes, transporters, etc.) and methodology and experimental design at the preclinical level describing the processes and parameters that determine absorption, distribution, metabolism, and excretion/elimination (ADME) of chemicals will also be covered.

Attributes: Doctoral, Graduate

PHT 803 Advanced Toxicology (3 credits)

This course introduces the biochemical, genetic, cellular basis of cytotoxicity. Based on this knowledge, the course will study the toxic effects and their underlying mechanisms in different organ systems (e.g., liver, kidney, lung, eye, immunity, endocrine, and reproductive system).

Attributes: Doctoral, Graduate

PHT 804 Intro Drug Discovery and Dev (3 credits)

This course will allow students to gain insight into the process of drug discovery and development. By interacting with different experts in the field of drug discovery and development, students will learn about the steps to drug discovery including new target identification, selection and validation, screening of potential candidates, understanding the formulation process, packaging and delivery of new drugs and finally being exposed to the important regulatory aspects of the drug discovery process and how it applies to taking novel discoveries to clinic and patients. This course also introduces basic concepts of medicinal chemistry as applied to drug discovery.

Attributes: Graduate

PHT 807 Tox Subst Use Disorder (Appld) (3 credits)

Students will develop a working knowledge of the key neurotransmitters and mechanisms involved in substance use disorders. They will also explore the neurobiological and neurochemical theories proposed for different types of substance use disorders. Students will delve into the neurotoxicology of both the central and peripheral nervous systems, as well as gain insights into the principles of drug metabolism for substances with abuse potential. Lastly, they will examine the mechanisms through which substance use can modify behavior and mood, ultimately leading to the development of disease states.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral, Graduate

PHT 811 Research Techniques Laboratory (1-3 credits)

"During the first year of enrollment, each student satisfactorily completes an experiential rotation through the research laboratories of at least two departmental graduate faculty and selects a primary research topic."

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

PHT 821 Molecular Pharmacology (3 credits)

"This is an advanced pharmacology course with a focus on cell signal transduction. Major mammalian signaling pathways will be reviewed and how therapeutics, especially anticancer therapeutics, perturb these signaling pathways for therapeutic purposes will be discussed. Instructors will provide appropriate recent review and research papers to the class. Students are required to read these papers and actively participate in class discussion. Students are also required to write a mock research proposal and present it in class."

PHT 840 Drug Disc Neurodegenerative (3 credits)

The goal of this course is to examine the drug discovery process with focus on neurodegenerative disorders. Using Alzheimer's disease for illustration, we will examine diagnosis, epidemiology, current therapeutics, strategies for drug discovery (amyloid hypothesis, tau, apo E, insulin, and various receptors) in vitro and in vivo disease models. We will examine the in vivo models to see how well they simulate the disease and thus how reliable they may be in translational studies. Although the focus of the course is on preclinical studies, we will examine how some of the compounds that have done well in preclinical studies have fared in clinical studies thus illustrating challenges in this field.

Restrictions: Enrollment is limited to Doctoral level students.

Attributes: Doctoral

PHT 851 Drug Discovery & Development (3 credits)

This is an advanced 3-credit course of pharmacology & toxicology focusing on drug discovery and development. The primary objective of this course is to provide students with an in-depth knowledge about the major steps involved in drug discovery and development with real examples. The course will cover all major stages for advancing a molecule from the pre-clinical space into clinical FIH (First in Human) trials. These include target identification and validation, screening and selection of appropriate targeting molecules, non-clinical safety assessment, PK/PD modeling, clinical trial design, FIH dose calculation and efficacy assessment, et al. In addition to the didactic teaching, students will be assigned with a group project to use the knowledge they have learned to solve problems in drug discovery and development. After completing the course, students will have a deep understanding and practical knowledge of how pharmaceutical industry develops small molecule chemicals and biological macromolecules to become life-saving medicines.

Restrictions: Enrollment limited to students in the PPBS, PPMS or PPPHD programs.

PHT 880 Pharm Tox Seminar (1 credit)

"Reports on current research topics by guest scientists, departmental faculty, and graduate students, followed by group discussion. Attendance and participation are required during fall and spring semesters."

PHT 895 Independent Research Project (1-4 credits)

This graduate level course is a research opportunity (drug discovery & development) for post-bac and graduate students that have already acquired a BS degree to work with a faculty mentor (or faculty's lab team members) to gain insight and skills in research literature interpretation, hypothesis testing, laboratory measures, and data analysis, as well as research summarization and conclusion generation, with poster preparation and data presentation to a broad audience. This course can be taken multiple times.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Doctoral, Graduate

PHT 899 Doctoral Research (1-10 credits)

Candidates for the Doctor of Philosophy Degree, specializing in Pharmacology & Toxicology, and Pharmacuetics are required to fulfill 20 credits of independent research under the direction of a faculty member in the program.

Attributes: Doctoral

Pharmacy (PRX)

PRX 151 Pre-StEPP (0 credits)

Pharmacy students will receive on-campus services that support academic success and professional development. Students will begin to understand and apply cooperative teamwork principles and practices and adopt exemplary personal and professional ethical standards.

PRX 251 Pre-StEPP Year Two (0 credits)

Pharmacy students will receive on-campus services that support academic success and professional development. Students will begin to understand and apply cooperative teamwork principles and practices and adopt exemplary personal and professional ethical standards.

PRX 301 Extrinsic Summative AR I (1 credit)

Extrinsic Summative Assessment and Reassessments (ESAR) are authentic assessments which provide relevance and purpose to learning. Activities and assessments are designed to reveal information to students about how well they retain, transfer, and apply knowledge and skills learned in the first professional year with the goal of competence in real world settings. Students are provided the opportunity for individualized learning support and reassessment if necessary.

PRX 302 Found of Pharmacy Practice (2 credits)

This course provides an introduction to the goals and expectations for student pharmacists entering the professional phase of the PharmD program. The foundations of the profession will be introduced, including emotional intelligence, team building, professional attire/attitudes/ behaviors, relationship building, professional and personal wellness, the history of pharmacy, leadership, professionalism and professional identity formation. This course serves as a foundation for the required co-curricular portion of the doctor of pharmacy curriculum.

PRX 305 Foundations of Clinical Immuno (3 credits)

This module provides a foundation in human immune system components as applied to vaccine design, immunotherapies and biologies. Discussion will emphasize combating infectious disease, cancer, autoimmunity, and allergic responses.

Attributes: CCC: Mission: Ethics Social Justice, Undergraduate

PRX 316 Practice Skills/Prof Behavior1 (4 credits)

This module introduces the skills necessary for patient engagement and interaction, emphasis is on the role of the pharmacist, Pharmacists' Patient Care Process, communication (verbal and written), professionalism and ethics.

PRX 325 Medication Use Systems 1 (3 credits)

This module provides an introduction to the principles and processes involved in medication acquisition/procurement, storage, prescribing/ ordering, dispensing, including handling of controlled substances, utilization of medication safety information, documentation, health insurance payments systems and health informatics. The overall goal is for student pharmacist to demonstrate knowledge of these processes and to be able to process a non-complicated prescription for payment in both community and institutional pharmacy environments.

PRX 330 Foundations of Biomedical Sci (4 credits)

A foundation in the structure, properties, biological functions, bioenergetics, and metabolic fate of macromolecules essential to life (i.e. proteins, lipids, carbohydrates, and nucleic acids), the impact of molecular genetics on these processes; also, application of these concepts to human disease, drug therapy and rational drug design strategies.

PRX 340 Foundations of Pharm Sci 1 (3 credits)

This module provides an introduction to medicinal chemistry, pharmaceuticals, compounding and pharmaceutical calculations. Medicinal chemistry focuses on the in vitro and in vivo chemical basis of drug action including their physico-chemical properties, structure activity relationships and receptor binding and metabolism. Pharmaceutics focuses on the principles and applications of dosage forms. Mathematical skills to accurately prepare prescriptions, including extemporaneously compounded dosage forms are included.

PRX 345 Foundations of Pharm Sci 2 (3 credits)

This module continues with an understanding of the principles and applications of physico-chemical properties of drugs for safe and effective drug delivery. Pharmacodynamics and basic pharmacokinetics with calculations are emphasized in order to provide a thorough understanding of the mechanisms (absorption, distribution, metabolism and elimination) involved in therapeutic and adverse drug actions. Selection of appropriate dosage forms that minimize adverse effects/toxicity are covered.

PRX 350 iPSDT 1:DiseasePrev & SelfCare (3 credits)

This module is the first of the 14 iPSDT modules which integrate the application of the pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals specific disease states and therapeutic decision-making. This module focuses on the principles that underline disease pathogenesis and self-care pharmacotherapy.

PRX 355 iPSDT 2: Cardiovascular 1 (3 credits)

The Cardiovascular 1 module is first of two modules focused on the cardiovascular system. It focuses on the application of the pharmacy sciences, including medicinal chemistry, pharmacology and pharmaceuticals to cardiovascular diseases and therapeutic decision-making. The module encompasses the epidemiology, etiology, pathophysiology, prevention, pharmacologic and nonpharmacologic treatment and self-care of cardiovascular medical conditions. Included are complementary and alternative therapies.

PRX 365 iPSDT 3: Pulmonary (3 credits)

The Pulmonary module focuses on the application of the pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals to pulmonary diseases and therapeutic decision-making. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and nonpharmacologic treatment, and self-care of pulmonary medical conditions. Included are complementary and alternative therapies.

PRX 380 IPPE-1: Service Learning 1 (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is a preceptor-directed experience in service learning and community pharmacy practice. Students will be assigned a service learning and community pharmacy site. Students will observe and be engaged in the following foundational components under preceptor supervision: medication use system, patient and healthcare practitioner communications, patient counseling, self-care triage, and patient care activities. Students will also be involved in professional pharmacy organizations, community service, and advocacy.

PRX 390 IPPE-2: Service Learning 2 (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. This course is a continuation of PRX380 and is a preceptor-directed experience in service learning and community pharmacy practice. Students will be assigned a service learning and community pharmacy site. Students will demonstrate competency in the following components under preceptor supervision: medication use system, patient and healthcare practitioner communications, patient counseling, self-care triage, and patient care activities. Students will also be involved in professional pharmacy organizations, community service, and advocacy.

PRX 401 Extrinsic Summative AR 2 (1 credit)

Extrinsic Summative Assessment and Reassessments (ESAR) are authentic assessments which provide relevance and purpose to learning. Activities and assessments are designed to reveal information to students about how well they retain, transfer, and apply knowledge and skills learned through the first and second professional years with the goal of competence in real world settings. Students are provided the opportunity for individualized learning support and reassessment if necessary.

PRX 410 Health Eq and Pt Care in Pharm (3 credits)

Integrated Approaches to Advancing Health Equity and Patient Care in Pharmacy is a course that explores healthcare disparities, social justice, diversity, and cultural humility, preparing students to address inequities in healthcare. Students will examine the historical and contemporary oppression of marginalized populations, engage in self-reflection on personal biases and privileges, and develop advocacy skills for promoting equity in patient care and professional practice. By the end of the course, students will be equipped to foster an inclusive and equitable environment and work towards improvements that address the unique needs of diverse patient populations.

Attributes: CCC: Diversity

PRX 415 Fndtns Healthcare Policy/Law (3 credits)

This module provides an introduction to the principles of pharmacy law and ethics, healthcare policies, medication payer functions, economic theories and their application to pharmacoeconomics, drug selection, and health coverage laws.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Undergraduate

PRX 418 Pharmacy-Based Immu Delivery (1 credit)

This course module includes a certificate training program (e.g. American Pharmacists Association: Pharmacy-Based Immunization Delivery) for preparing pharmacists to provide immunization services to patients across the life span. Educational materials are based on national educational standards for immunization training from the Centers for Disease Control and Prevention.

PRX 420 Practice Skills/Prof Behavior2 (3 credits)

This module enhances the skills necessary for patient engagement and interactions. Emphasis is on the role of the pharmacist, Pharmacist's Patient Care Process, communication (verbal and written), and professionalism and ethics.

PRX 425 Medication Use Systems 2 (3 credits)

This modular course provides thorough coverage of medication acquisition/procurement, storage, prescribing/ordering, and dispensing processes in addition to applications of non-sterile and sterile compounding techniques, inventory control, adverse drug events, and hazardous waste handling and disposal processes. The overall goal is for student pharmacists to demonstrate appropriate utilization and documentation of medication procurement, distribution and dispensing in both community and institutional pharmacy environments.

PRX 430 Health Info Retrieval & Eval (3 credits)

This module provides the foundational knowledge and skills related to identifying types of literature and health information sources and determining the appropriateness of the source and the content for purposes of providing information to healthcare providers and a lay audience. An understanding of the hierarchy of health information sources and literature will allow the selection of appropriate sources and the development of written and verbal health information sources.

PRX 435 Lit Eval & Evidence-Based Med (3 credits)

This module builds upon the foundations established in RX430, and focuses on primary literature and its application to populations as well as to specific patient situations or questions. The main emphasis is the selection and comprehensive critical evaluation of clinical trials and the appropriate use of available results to develop recommendations for population-based scenarios or patient-specific scenarios. In addition, the literature will be utilized to develop professional oral presentations with written deliverables.

Prerequisites: ENG 101 or WR 101

Attributes: CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

PRX 440 Foundations of Pharm Sci 3 (3 credits)

This module further elaborates the application of physico-chemical properties of drugs to ensure safe, effective and targeted drug delivery. The impact of cutting edge biotechnology, pharmacogenetic/pharmacogenomic parameters, (and manufacturing, specialized compounding) to personalized medication delivery and minimize adverse effects/toxicity will be covered.

PRX 452 iPSDT 4: Cardiovascular 2 (3 credits)

The Cardiovascular 2 module is the second of two modules focused on the cardiovascular system. It focuses on the application of the pharmacy sciences, including medicinal chemistry, pharmacology and pharmaceuticals to cardiovascular diseases and therapeutic decision-making. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and nonpharmacologic treatment, and self-care of medical conditions over the life cycle. Included are complementary and alternative therapies.

PRX 454 iPSDT 5: Renal/Hepatic (3 credits)

The renal/hepatic module of the iPSDT series focuses on the application of pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals, to disease states and therapeutic decision-making in relation to renal and hepatic function. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and nonpharmacologic treatment, and self care.

PRX 455 iPSDT 6: Endocrine/Reproductiv (3 credits)

The endocrine and reproductive systems module of the iPSDT series focuses on the application of the pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals to disease states and therapeutic decision-making. This series encompasses the prevention and management of uncomplicated to complex medical conditions over the life cycle. Included are self-care pharmacotherapy, as well as natural products, dietary supplements, and alternative and complementary therapies. As part of this course, students will complete a training certificate program, such as American Pharmacists Association's The Pharmacist and Patient-Centered Diabetes Care Certificate.

PRX 457 iPSDT 7: Infectious Disease 1 (3 credits)

This is the first of three modules focusing on infectious diseases. The overarching objectives are to associate proper antibiotics (type and dosage) to bacterial infections and to identify main side effects and drug-drug interactions. This module will also allow the student to apply and integrate their knowledge by associating therapeutic dosages, side effects and resistance to antibiotics and mechanisms of actions at the pharmacological level.

PRX 480 IPPE 3: Adv Comm/Ambul Care (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is a preceptor directed experience in advanced community pharmacy practice and ambulatory care. Students will observe and be engaged in the following components under an assigned community/ambulatory preceptor: operations, patient and healthcare practitioner communications, patient counseling, self-care triage, and patient care activities including medication therapy management and immunizations.

PRX 490 IPPE 4: Institutional Pharmacy (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is directed student exposure to pharmacist practice roles in the institutional pharmacy practice setting. Students will observe and be engaged in the following components under the supervision of an assigned institutional pharmacist preceptor: the medication use system, operations, patient and/or healthcare practitioner communications.

PRX 501 Extrinsic Summative AR 3 (1 credit)

Extrinsic Summative Assessment and Reassessments (ESAR) are authentic assessments which provide relevance and purpose to learning. Activities and assessments are designed to reveal information to students about how well they retain, transfer, and apply knowledge and skills learned through the first, second, and third professional years with the goal of competence in real world settings. Students are provided the opportunity for individualized learning support and reassessment if necessary.

PRX 510 Applied Prof Behavior & Comm (2 credits)

This module focuses on complex communications with patients/caregivers and health care providers through both written and verbal skills using both formal and informal methods. Emphasis will be placed on professionalism, ethics, and leadership.

PRX 520 Innovation & Entrepreneurship (1 credit)

This course is designed for student pharmacists to gain business acumen and pursue potential entrepreneurial endeavors. Additionally, this course will motivate student pharmacists to explore entrepreneurial opportunities and innovations in their profession.

PRX 530 iPSDT 8: Infectious Disease 2 (3 credits)

This is the second of three modules focusing on infectious diseases. The overarching objectives are to associate proper antimicrobial uses for various infections. Similar to module 1, this module will also focus on medication side effects and drug-drug interactions. Students will apply and integrate their knowledge by associating therapeutic dosages, side effects, pharmacokinetic and pharmacodynamic principles, and resistance to antimicrobial mechanisms of actions at the pharmacological level.

PRX 534 iPSDT 9: Central Nervous Sys 1 (3 credits)

This the first of two modules focused on the central nervous system. It emphasizes the application of the pharmacy sciences, including medicinal chemistry, pharmacology and pharmaceuticals to central nervous system diseases and therapeutic decision-making. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and non-pharmacologic treatment, and self-care of medical conditions over the life cycle. Included are complementary and alternative therapies.

PRX 538 iPSDT 10: Central Nervous Sys2 (3 credits)

This module focuses on the epidemiology, pathophysiology, and clinical presentation of selected mood disorders, anxiety disorders, thought/psychotic disorders, neurodevelopment disorders, sleep-wake disorders, and substance-related/addictive disorders. The pharmacology and relevant pharmacokinetics, indications, dosage and administration, and adverse effects of the available drugs and drug classes used in the treatment of these disorders will also be addressed. Students will also design evidence-based treatment and monitoring plans based on current treatment guidelines and literature.

PRX 543 iPSDT 11: GI/Nutrition (3 credits)

The Gastrointestinal/Nutrition module of the iPDST series focuses on the application of pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals, to disease states and therapeutic decision-making in relation to gastrointestinal and nutritional disorders. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and non-pharmacologic treatment, and self care.

PRX 545 iPSDT 12: Imm/Muskel/Skin/Eye (3 credits)

The immune/musculoskeletal/skin/eye module of the iPSDT series focuses on the application of pharmacy sciences, including medicinal chemistry, pharmacology, and pharmaceuticals, to disease states and therapeutic decision-making in relation to diseases involving the immune system, musculoskeletal system, eye, and skin. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and non-pharmacologic treatment, and self care.

PRX 553 iPSDT 13: Hematology/Oncology (3 credits)

This module focuses on the hematologic and oncologic processes with application of the pharmacy sciences, including medicinal chemistry, pharmacology and pharmaceuticals to specific diseases and therapeutic decision-making. The module encompasses the etiology, pathophysiology, prevention, pharmacologic and nonpharmacologic treatment, and self-care of medical conditions over the life cycle. Included are complementary, and alternative therapies as well as supportive care treatment options.

PRX 555 iPSDT 14: Infectious Disease 3 (3 credits)

This is the third of three modules focusing on infectious diseases. The overarching objectives are to associate proper antimicrobial use for various infections. Similar to modules 1 and 2, this module will also focus on medication side effects and drug-drug interactions. Students will apply and integrate their knowledge by associating therapeutic dosages, side effects, pharmacokinetic and pharmacodynamic principles, and resistance to antimicrobials to mechanisms of actions at the pharmacological level.

PRX 570 Integrated Practice 1 (3 credits)

This is the first of two modules designed to simulate real life patient scenarios with multiple disease states and patient care settings. This module will also focus on the various skills including, but not limited to, professionalism, communication, health information retrieval, physical assessment, calculation, application of pharmacy sciences, diseases and therapeutic knowledge, and intra-and inter-professional team dynamics. Additionally, various pharmacy practice management consideration, such as regulatory, public health, formulary management, and ethics will be integrated throughout the course activities. Students will serve as peer educators through a series of seminar presentations.

PRX 575 Integrated Practice 2 (3 credits)

This is the second of two modules designed to simulate real life patient scenarios with multiple disease states and patient care settings. This module will also focus on the various skills including, but not limited to, professionalism, communication, health information retrieval, physical assessment, calculation, application of pharmacy sciences, diseases and therapeutic knowledge, and intra- and interprofessional team dynamics. Additionally, various pharmacy practice management considerations, such as regulatory, public health, formulary management, and ethics will be integrated throughout the course activities. Students will serve as peer educators through a series of seminar presentations.

PRX 580 IPPE 5: Adv Institutional Pharm (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is directed student exposure to patient care responsibilities of institutional pharmacists. Students will be assigned an institutional pharmacist preceptor and will observe and be engaged in the following components under their supervision: direct patient care, interprofessional collaboration, applying drug knowledge, the medication use system, patient and/or healthcare practitioner communications.

PRX 590 IPPE 6: Patient Care Elective (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is directed student exposure to patient care responsibilities of institutional, community, or ambulatory care pharmacists. Students will be assigned a pharmacist preceptor and will observe and be engaged in the following components under their supervision: direct patient care, applying drug knowledge, the medication use system, and patient and/or healthcare practitioner communities.

PRX 595 IPPE Patient Care Elective 2 (1 credit)

Introductory Pharmacy Practice Experiences (IPPEs) provides experiences that enhance and support didactic knowledge and skills. The focus of this course is directed student exposure to patient care responsibilities of institutional, community, or ambulatory care pharmacists. Students will be assigned a pharmacist preceptor and will observe and be engaged in the following components under their supervision: direct patient care, applying drug knowledge, the medication use system, and patient and/or healthcare practitioner communities. *Restrictions:* Enrollment is limited to students with a major in Pharmacy.

PRX 610 APPE: Community Pharmacy (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Community Pharmacy Rotation, student pharmacists are engaged in patient-focused provision of pharmacy services in a community pharmacy. Students will provide patient counseling, OTC triage, medication therapy management, etc. under pharmacist supervision as part of an integrated community pharmacy service model.

PRX 618 Pharm Prof Dev & Enrichment (1 credit)

This course is intended to enrich student development and achievement during their APPE year and prepare students to successfully transition from their professional education to practice.

PRX 620 APPE: Ambulatory Care Pharm (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Ambulatory Care Rotation, student pharmacists are engaged in provision of patient care and acute/chronic drug therapy management in an outpatient practice setting.

PRX 630 APPE: Institutional Pharmacy (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Institutional Rotation, student pharmacists gain experience in how medications are managed in the institutional setting and how institution-based pharmacists oversee the approximate and safe use of medications including oversight of medication ordering, dispensing and administration, use of technology and information, and the development and use of formularies, drug policies, procedures and protocols.

PRX 640 APPE: Acute Patient Care (5 credits)

Advanced Pharmacy Practice Experience integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Acute Patient Care Rotation, student pharmacists are engaged in provision of patient care and medication management as part of an interprofessional in-patient based medical team under the supervision of a pharmacist preceptor. Examples of patient focus may include general medicine, critical care, oncology, cardiology, or infectious diseases.

PRX 650 APPE: Indirect Patient Care Elec (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Indirect Patient Care Elective Rotation, student pharmacists are able to gain additional knowledge, skills, and experience in businesses, organizations, and pharmacist practices that do not directly engage patients. Common rotations include pharmaceutical industry, managed care, medical communications, management rotations in community and hospital pharmacy, professional organizations, nuclear pharmacy, law offices, and investigations drug services.

PRX 660 APPE: Patient Care Elective (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance the knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Patient Care Elective Rotation, student pharmacists are able to gain additional knowledge, skills, and experience in patient care/ pharmacy practice settings such as compounding pharmacy, long term care pharmacy, anticoagulation services, poison control centers, home IV infusion, etc.

PRX 670 APPE: Academic Elective (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Academic Elective Rotation, student pharmacists are able to gain additional knowledge, skills, and experience in academic pharmacy. Common experiences during this rotation may include: development of a teaching philosophy statement, creation of course learning activities and assessments, small/large group facilitation, exam proctoring, attending institutional meetings, and observation of various courses, among others.

PRX 680 APPE Research Elective (5 credits)

Advanced Pharmacy Practice Experiences integrate, apply, reinforce, and advance knowledge, skills, attitudes, abilities, and behaviors developed in the Pre-APPE curriculum and in co-curricular activities. During the APPE Research Elective Rotation, student pharmacists are able to gain additional knowledge, skills and experience in research methodology. Experiences may include any or all of the following: exposure to research study design, protocol development, preparation of material for submission to institutional review board (IRB), data collection, data analysis, and publication, among other research-related activities.

Pharmacy Practice (PHP)

PHP 309 Clinical Reasoning (2 credits)

Students are introduced to the concept and application of clinical reasoning. Clinical reasoning skills are developed through application of the clinical reasoning process during in-class case-based team activities.

PHP 310 Research Design (2 credits)

The appropriate design and application of major study types (surveys, interviews, experimental, naturalistic and participant observational, archival, and combined designs) and ethical issues and legal regulations for animal and human research are addressed. Students learn the knowledge and skills necessary to identify and select a suitable research question and develop an appropriate research protocol including data analysis techniques and budgeting.

PHP 321 Immunotherapies (1 credit)

The immunotherapies elective course focuses on mechanism of action, indications, drug administration and adverse effects of select new immunotherapies including immune checkpoint inhibitors, adoptive cellular therapy, dendritic cell vaccines, and non-cancer therapy monoclonal antibodies.

PHP 322 Labs & Diagnostic Tests (1 credit)

Students learn to assess, interpret, and apply common laboratory and diagnostic tests. Laboratory tests include complete blood count, the basic metabolic panel, arterial blood gas, and tests for cardiac and hepatic damage. Diagnostic tests include the electrocardiogram and chest imaging (chest X-ray, MRI, and CT).

PHP 327 Global Health Determinants (2 credits)

This elective course will introduce and discuss important topics in global health, focusing specifically on care of the underserved in a global context. Topics discussed will include health policy and economics, determinants of health, essential medicines, community-oriented primary care, refugee health, women's health, and climate change. In addition to readings and weekly discussion groups, students enrolled in this course will have the opportunity to gain valuable practice-based skills by working with partner agencies. These opportunities are designed to focus on current and future contributions of pharmacists to global health and the role of global health in pharmaceuticals and pharmacy practice.

PHP 335 History of Pharmacy (2 credits)

This course introduces students to the history and development of the Profession of Pharmacy with special emphasis placed on US history and the role of Philadelphia College of Pharmacy in the development of the profession. Students will explore the growth of professionalism and professional organizations, professional practice, commercial and industrial growth, pharmacy education and the sciences. The course will use literature and narratives to foster an interest in history and better understand the impact of leaders and entrepreneurs on the development of the profession. A unique aspect of the course will be utilizing items from the Marvin Samson Museum for the History of Pharmacy as well as rare documents in the library to augment the learning experience.

Attributes: Undergraduate

PHP 339 Herbals, Supps & Nat Prods (1 credit)

Herbals, supplements, and natural products are commonly used by patients for a variety of health reasons, often alongside conventional medicine. Due to easy access, patients are often using these products without guidance on safety or efficacy. This course will prepare future pharmacists to critically evaluate available evidence on herbals, supplements, and natural products, and to use this information to counsel patients on their safe and effective use.

PHP 340 Cultures & Therapeutics (2 credits)

Students are introduced to the cultural differences between the U.S. healthcare (Western) system and non-Western cultures. The course explores characteristics of non-Western cultures and potential strategies for managing pharmacotherapeutic issues with patients who have healthcare belief systems that differ from the U.S. healthcare cultural system.

PHP 345 Pharmacy Book Club (2 credits)

This course will allow students to explore the experience of illness and navigating the healthcare system through the point of view of patients and their caregivers. Students will read, discuss, and complete writing assignments about books that address the emotions, attitudes, beliefs, and concerns of patients suffering with illness, including social determinants of health, health disparities, and psychosocial factors. Students will get an authentic view of how health impacts a patient's daily life and the role of the healthcare provider in impacting a patient's experience of disease and the health care system.

Attributes: Undergraduate

PHP 359 Intro to Pharma Industry (2 credits)

This course is designed for Doctor of Pharmacy students to provide an overview of the pharmaceutical industry, with a focus on the career options available to pharmacists. At the end of this course, the student will demonstrate skills that would be used in retrieving & evaluating medical literature to develop medical information documents that are geared for a global audience of healthcare professionals. In addition, the student will learn aspects of adverse event reporting, drug development and approval process, FDA regulations on product labeling and promotional advertising, and sales marketing.

PHP 370 Special Topics in Pharm Prac (2-3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHP 422 Medication Therapy Mgmt Cert (1 credit)

This advanced MTM (Medication Therapy Management) certificate course will prepare student pharmacists to improve medication use through the delivery of MTM services in a variety of practice settings. At the conclusion of this course, students will have the opportunity to receive the "APhA Delivering Medication Therapy Management Services" certificate.

PHP 451 Adv Asthma Pharmacotherapy (3 credits)

This course is designed to provide an in-depth understanding of the pathophysiology of asthma and evidence-based asthma therapeutics, including the drug-delivery devices, patient assessment skills, and patient education skills.

PHP 495 Project in Pharmacy Practice (1-3 credits)

Opportunity for qualified students to carry out a project in pharmacy practice application or research under the direction of a pharmacy practice faculty member. Each student is required to prepare a report summarizing his/her objectives, progress, and conclusions.

PHP 508 Hospice & Palliative Care (2 credits)

Hospice is one of the fastest growing areas in healthcare today. Increasingly, healthcare professionals are relying on pharmacists to provide recommendations for the management of complicated symptoms at the end of life. The goal of this course is to prepare the pharmacy student to take an active role in the medical management of chronically and terminally ill patients. Students will gain an appreciation for various ethical, social, and legal issues that can impact healthcare provision at the end of life. Furthermore, students will discover the role of the pharmacist as it relates to the interdisciplinary setting of hospice and palliative care.

PHP 514 Psychiatric Illness Approaches (2 credits)

The purpose of the course is to provide an advanced lecture series on the major psychiatric disorders and related special topics with emphasis on psychopharmacologic treatment.

PHP 521 Adv Pulmonary Therapeutics (2 credits)

This course focuses on comprehensive evidence-based therapeutics of pulmonary medical diseases and/or conditions. Using team-based learning, students will gain knowledge of drug-induced lung disease, obstructive lung disease, interstitial and inflammatory lung disease, alveolar lung disease, disorders of the pulmonary circulation, disorders of the pleural space, lung neoplasms, and lung infections.

PHP 523 Ambulatory Care Pharm Practice (2 credits)

This advanced ambulatory care pharmacy practice course will prepare students for providing pharmacy services in primary care settings. Students will build knowledge of practice models and complex therapeutic disease states, improve verbal and written communication skills with patients and providers, and gain experience with utilizing an electronic medical record.

PHP 524 Care of the Geriatric Patient (2 credits)

Students are introduced to the interprofessional nature of geriatric patient care. Focus is placed on the care of geriatric patients from a variety of different health care perspectives using simulated patient cases to continue development of students' abilities in therapeutics, problem solving, and communication.

PHP 525 Cardiovasc Disease Risk Mgmt (2 credits)

The course will provide an in-depth understanding of the pathophysiology of cardiovascular disease, cardiovascular risk assessment, therapeutic lifestyle changes, and evidence based pharmacotherapy. This course will assist students to further develop their critical thinking, clinical decision-making, and patient/healthcare professional communication skills for managing patients with or at risk for cardiovascular disease. At the conclusion of this course, students will receive the APhA Pharmacy-Based CVD Risk Management Certificate.

PHP 529 Intro to Pediatric Pharm Pract (2 credits)

This course is designed to develop skills for the management of neonatal and pediatric drug-related challenges. Basic principles governing optimal drug therapy, such as drug delivery, pharmacokinetics, pharmacodynamics, and assessment of neonatal and pediatric patients will be reviewed. Selected pediatric dilemmas will be discussed with emphasis on medication safety and administration, pediatric resources, and dosing. Problem-solving and decision-making skills will be fostered through patient case presentations and discussions utilizing primary and tertiary resources.

PHP 541 Pharmacogenomics (2 credits)

Basic science of pharmacogenomics with an emphasis of the applications of pharmacogenomic principles to improve drug therapy outcomes.

PHP 547 Critical Care Therapeutics (2 credits)

The course will offer an introduction to the pharmacotherapeutic management of the critically ill patient. The pathophysiology and drug therapy of selected problems in the critically ill population will be covered. Students in the course will discuss these topics with a number of activities throughout the semester. The course will strengthen the student's ability to evaluate and apply primary literature as well as verbal presentation skills. Active participation will allow the student to hone their clinical skills in real-life situations.

PHP 559 Acute Care Medicine (2 credits)

Students will focus on guidelines and evidence-based medicine to further develop the skills and knowledge base in therapeutics in order to provide optimal drug therapy to internal medicine patients who are hospitalized. Faculty will utilize a problem-based learning format in the course to facilitate critical thinking development and student-centered learning.

Philosophy (PHL)

PHL 101 Human Person (3 credits)

An inquiry into the concept of personhood distinctive of the Jesuit, Catholic tradition through an understanding of a philosophical problem concerning human beings as rational, social, biological, historical, aesthetic, or spiritual beings.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: CCC: Philosophy L1 Non Ethics, Undergraduate

PHL 102 Language and Communication (3 credits)

This course is an introduction to the study of human communication and to various aspects of linguistic analysis. It focuses on how language works, how it is used in society, how it changes and how it is learned. We also explore some commonly-held beliefs about the nature of language and communication in real-life contexts.

Attributes: American Studies Course, Communication Studies ILC Crs, CCC: Philosophy L1 Non Ethics, CCC: Social Science, GEP: Social Science, Undergraduate

PHL 104 Ethics in Health Care (3 credits)

This course aims to equip students with tools to evaluate various issues that arise in health care from an ethical point of view. In this course, students will come to understand the main ethical theories and principles that guide health care ethics today. Students will then apply this knowledge to particular areas of health care, the use of case studies and other engaged learning techniques. The goal of the course is to help students develop their ability to think critically about the ethical character of various situations that might arise during the course of their work, so that they are better able to be effective health care providers.

Attributes: CCC: Philosophy L1 Ethics, Undergraduate

PHL 109 Ethics in Health Care (3 credits)

This course aims to equip students with conceptual tools to evaluate various issues that arise in health care from an ethical point of view. In this course, students will come to understand the main ethical theories and principles that guide health care ethics today. Students will then apply this knowledge to particular areas of health care through the use of case studies and other engaged learning techniques. The goal of the course is to help students develop their ability to think critically about the ethical character of various situations that might arise during the course of their work, so that they are better able to be effective health care providers.

Attributes: Undergraduate

PHL 150 First Year Seminar (3 credits)

Various first-year seminars are offered each year by philosophy faculty.

Attributes: First-Year Seminar, Undergraduate

PHL 154 Moral Foundations (3 credits)

A critical study of the various ways in which agents, actions, and social practices are evaluated from the moral point of view, as this has been articulated in major Western ethical theories. Tools for this study include an introduction to philosophical reasoning and concepts basic to the moral point of view, such as rights, duties, virtue and character. Theories studied include but are not limited to Consequentialism, Deontology, and Natural Law.

Attributes: CCC: Philosophy L1 Ethics, GEP: Signature Course, Undergraduate

PHL 170 Special Topics in Philosophy (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHL 201 Knowledge and Existence (3 credits)

Three basic problems concerning reality and the quest to know reality: 1) the origin, validity, and limits of human knowledge; 2) Graeco-Christian, modern, and contemporary approaches to being and causality; and 3) the problem of God.

Prerequisites: PHL 154

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 210 Logic and the Law (3 credits)

The course is designed to develop reasoning skills that are useful for law school preparation, law school itself, and the legal profession. It will begin by introducing fundamental concepts in informal logic-included will be a review of validity and soundness and a variety of deductive forms. We will then discuss strategies for evidential reasoning and fundamental concepts in formal propositional and predicate logic. After establishing this background, we will apply it to the sorts of reasoning questions that appear on the Law School Admissions Test (LSAT). At the end of the course, we will examine Supreme Court or other prominent legal cases and issues in the philosophy of law, analyzing the arguments involved using the skills that have been honed throughout the semester.

Prerequisites: PHL 154

Attributes: CCC: Philosophy L2 Ethics, Justice Ethics and the Law, Undergraduate

PHL 220 Logic (3 credits)

A study of the logic of ordinary language: the functions of language, forms of argument, fallacies, definition; analysis of propositions and deductive reasoning; inductive reasoning, analogy and scientific hypothesis testing. An introduction to symbolic logic is provided. Techniques are developed for translating arguments in ordinary language into a canonical language that highlights their logical form. The predicate and propositional calculi are used to establish the validity of simple arguments.

Attributes: CCC: Philosophy L1 Non Ethics, Justice Ethics and the Law , Undergraduate

PHL 240 Symbolic Logic (3 credits)

The study of the semantic and syntactic properties of propositional and predicate logics- natural deduction systems of the first order. Some results in meta-logic (such as the soundness and completeness proofs for particular systems) may be addressed, and attention may also be paid to the properties of axiomatic deductive systems in contrast to systems of natural deduction. The usefulness of formal systems for studying the property of validity in natural language arguments will also be addressed, in part by learning techniques for "translating" arguments from one language to the other.

Prerequisites: PHL 154

Attributes: CCC: Philosophy L2 Non Ethics, Justice Ethics and the Law , Undergraduate

PHL 250 Philosophy of Death (3 credits)

A study of the reality of death as the boundary of human experience. The course explores the meaning of death and its relationship to the meaning of life, examines evidence for and against the thesis that death is the end of human existence, and considers implications for selected contemporary issues (e.g., death with dignity, medical definition of death).

Attributes: CCC: Philosophy L1 Non Ethics, GEP. Phil. Anthropology, Undergraduate

PHL 252 Philosophy of Karl Marx (3 credits)

This course focuses on the thought and philosophical legacy of the influential but easily misunderstood nineteenth-century German philosopher, economist, and political theorist Karl Marx. Essential themes and ideas include: alienation, species-being, dialectic, historical materialism, class struggle, exploitation, ideology critique, and capitalism and its alternatives. Students will read and critically engage Marx's own writings, but attention may also be paid to philosophers working in the Marxist tradition (e.g., analytic Marxism and Frankfurt School critical theory) as well as to critics of Marx and Marxism.

Prerequisites: PHL 154

Attributes: CCC: Philosophy L2 Non Ethics, GEP. Diversity Course, Faith Justice Course, GEP. Phil. Anthropology, Undergraduate

PHL 256 Freedom and Determinism (3 credits)

A metaphysical and epistemological analysis and evaluation of the various philosophical positions on the determinism-free will issue. Various kinds of determinism (hard, soft, theological, etc.) will be critically examined, and various ways of arguing in support of free-will (from choice, deliberation, remorse, etc.) will be assessed.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Justice Ethics and the Law , GEP. Phil. Anthropology, Undergraduate

PHL 258 The Authentic Self (3 credits)

This course will center on careful textual study of primary sources in philosophy that deal with these questions "What is the human being? What does it mean to be a Self?, Who am I?, and What is personal identity?" These questions about anthropology outline the original field of philosophy because they also include metaphysics, morals, and religion. A key element that will emerge is the role of rationality, of will, and of desire. This is related to the question of freedom, not just the theoretical freedom of the will, but the necessity to make a specific act of the will, namely to will to be one's authentic Self. Focus on works of Plato, Augustine, Descartes, Locke, Kant, Hegel, Husserl, and Charles Taylor.

Attributes: CCC: Philosophy L1 Non Ethics, GEP. Phil. Anthropology, Undergraduate

PHL 260 Philosophy of Human Nature (3 credits)

In this course we shall inquire into the nature of human beings by reading and discussing major philosophical texts from the western intellectual tradition along with essays written by contemporary philosophers. In particular we shall explore such topics as the nature of human rationality, knowledge and belief, immortality, virtue, free will, self-deception, the mind-body problem, and physicalism vs. dualism with respect to human persons.

Attributes: CCC: Philosophy L1 Non Ethics, GEP. Phil. Anthropology, Undergraduate

PHL 262 Freedom, Citizenship, Culture (3 credits)

This course will survey recent trends in political philosophy with special attention to competing conceptions of political freedom, civic identity and responsibility, and the political significance of community and cultural diversity. Does our political freedom depend primarily upon securing the negative liberties celebrated in the classical liberal tradition? Does it also require adequate social rights, democratic self-determination and/or active and ongoing participation in the political process? How should claims of freedom be balanced alongside the need to promote the common good, political solidarity and unity, and a sense of common belonging? How should the demands of citizenship be weighed against commitments arising from membership in sub-state cultural groups and other forms of human community?

Attributes: CCC: Philosophy L1 Ethics, GEP. Ethics Intensive, GEP. Phil. Anthropology, Undergraduate

PHL 264 Topics in Moral Psychology (3 credits)

This course will explore human moral judgment, decision making, and behavior. Included are examinations of issues about whether the psychological processes involved in human moral practice are innate, about the respective roles of emotion and reasoning in moral judgment, and about the extent to which cultural forces shape our moral beliefs. Following the lead of much of the field in recent years, our focus will be primarily on working out the philosophical implications of recent scientific investigation on the topics.

Attributes: CCC: Philosophy L1 Ethics, GEP. Ethics Intensive, GEP. Phil. Anthropology, Undergraduate

PHL 266 Rel & Phil in Amer Identity (3 credits)

From the founding of the American nation under the influence of Puritanism to the rise of Transcendentalism in the nineteenth century, philosophic and religious propositions have decisively shaped the American character. This course examines several important episodes in American thought in order to determine what makes Americans different from other sorts of people, what habits of thought inform their decisions, and what principles govern their understanding of the relation between religion and public life. This course typically involves making two off-campus visits to historical sites in Philadelphia.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 268 The Self: East and West (3 credits)

Philosophers East and West, ancient and modern, have struggled with the question: What does it mean to be a Self? What does it mean to be genuinely myself in the world in which I find myself? And what are important erroneous as well as "accurate" ideas that have practical consequences in the experience of myself? The course is intended to be an introduction to, and survey of, four philosophical notions of the Self, from East and West, from antiquity to recent times: Buddhism, Confucianism, Stoicism and Existentialism.

Prerequisites: PHL 154

Attributes: CCC: Philosophy L1 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 270 Special Topics in Philosophy (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHL 271 Current Moral & Social Issues (3 credits)

This course will explore a variety of moral issues of interest in American society and the global community today. These topics may include abortion, immigration, and issues surrounding the global poor, as well as a variety of others. Special emphasis will be placed on how philosophical questions about the nature of personhood and the relation of persons to society impact the ethical issues. The course will also include a brief overview of some fundamental theoretical concepts and distinctions and will apply those concepts and distinctions extensively.

Attributes: CCC: Philosophy L1 Ethics, GEP: Ethics Intensive, GEP: Phil. Anthropology, Undergraduate

PHL 272 Human Intelligence (3 credits)

There are few things in the modern developed world that get as much attention as human intelligence. Yet, for all the attention that intelligence receives, most people have thought surprisingly little about it: What is intelligence? Can it be learned? Is it possible for us to measure intelligence, and if so how? This course will examine these issues in depth, consider empirical findings, and explore philosophical issues that these findings and a variety of everyday practices surrounding intelligence raise.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 274 From Athens to Philadelphia (3 credits)

This course investigates how a city like Philadelphia was built and considers how a city can be built justly. This involves inquiring into the nature of cities and city life in the United States and attempting to formulate criteria for a just city. Attention will be given to topics of urban planning, to philosophical theories of justice, and to the Great Migration, the movement in the 20th century of African-Americans from the rural south into cities of the northern states. Students will be required to make several trips into Center City in Philadelphia as part of this course.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Diversity, CCC: Philosophy L2 Non Ethics, GEP: Diversity Course, GEP: Ethics Intensive, GEP: Phil. Anthropology, Undergraduate

PHL 284 Philosophy & Personal Relation (3 credits)

This course is a philosophical exploration of relationships between individuals, particularly friendship and love, but including sex, marriage, and family, as well as any other ways in which individuals relate. Building on theories of philosophers and other thinkers, this course may consider, for example, what makes personal relationships valuable, how personal life relates to social context, how personal relationships like love and friendship have changed over time, how gender, race, age and other differences figure in personal relationships.

Attributes: CCC: Philosophy L1 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 285 Philosophy of Medicine (3 credits)

This course examines critical philosophical questions that arise from the nature and practice of medicine and medical research. Emphasizing how human persons define, understand, experience, and negotiate such states as health, illness, suffering, and death, the course also asks questions such as what does it mean to receive a medical diagnosis, what is the proper aim of medical therapies, what role should medical research and inquiry play in the practice of medicine, how should medical resources be distributed? Specific relevant topics may include: disease ontology, causation, and classification; the roles of informed consent and confidentiality in medicine; the phenomenology of illness and suffering; historical conceptions of medicine; reproductive and end-of-life issues.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 or PHI 210

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 286 Philosophy of Mental Illness (3 credits)

This course will explore philosophical questions at the heart of the fields of psychiatry, clinical psychology, and other mental health professions. Broadly, we will identify and critically evaluate assumptions that underlie labeling and treating certain individuals as "insane"/"mentally ill"/"mentally disordered." We will use conceptual tools within the philosophy of mind, philosophy of science, philosophy of medicine, and moral philosophy to consider questions such as: What is insanity? Is it a disease or illness, "just like diabetes"? What is a disease in the first place? How do we define a "good" or "healthy" human life? What are the ethical implications of labeling people as mentally disordered? Might so-called mental disorders be better described as forms of "neurodiversity," to be celebrated instead of cured?

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 287 Philo Artificial Intelligence (3 credits)

Philosophers and scientists were thinking about AI well before AI even existed. Now, AI is an increasingly pervasive reality of modern life. This course surveys the history of AI itself—the term "artificial intelligence" was coined in 1956—as well as the evolution of thinking about whether human-designed machines might ever be correctly described as intelligent. Thinking about artificial intelligence forces us to think carefully about what we understand intelligence to be, and how it is related to more general concepts, such as mind, personal identity, consciousness, and free will. Many have argued that human intelligence is the basis of human moral agency, which raises the possibility of artificial moral agents. Contemporary AI systems are impressive enough in their capabilities that these questions are becoming less and less theoretical, and more culturally pressing.

Attributes: CCC: Philosophy L1 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 288 Minds & Souls (3 credits)

This course surveys both the main issues and theories in contemporary philosophy of mind as well as traditional and contemporary conceptions of the soul. It philosophically examines the difference between these distinct approaches, and will inquire: Why have soul theories been largely eclipsed by other approaches until relatively recently? Why are a few philosophers taking another look at soul theories? How do broader worldview considerations inform the debates? The topic of "singularity" will also be covered.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Ethics Intensive, GEP: Phil. Anthropology, Undergraduate

PHL 290 Reasons and Rationality (3 credits)

What is it to do something for a reason? What is it to believe something for a reason? Reasoning is normative. When we act, we think there are either good or bad reasons for the actions we undertake. To believe something is to believe that it is true or at least reasonably likely to be true. And to rationally believe that a claim is true is for the believed claim to be epistemically justified. But what are good reasons for action and what is it to be rationally justified in a belief? How are good reasons for action and good reasons for belief related? Are there two different notions of good reason at work, or is there a way to think about reasons that unifies these two domains? This course addresses these questions and examines standard forms of both good deductive and inductive reasoning paying special attention to how inductive reasoning can go wrong.

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 294 Reproducing Persons (3 credits)

This course examines how race, class, sex, gender identity, sexual orientation, queer and trans identity, nationality affects how we, as human persons, reproduce ourselves. It begins with a criticism of the ways in which white supremacy has established the dominant ideology of 'reproductive choice' (which centers the experiences of white middle-class women and reinforces social and political institutions that harm marginalized peoples) and contrasts this with the inclusive but revolutionary theoretical framework of Reproductive Justice, as developed by African American feminists. Drawing on the work of leading philosophers and women's studies scholars, the course seeks to not only address ethical and legal questions as they relate to women's reproductive lives but also to examine the material circumstances in which the reproduction of persons is realized.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP: Diversity Course, Gender Studies Course, GEP: Phil. Anthropology, Undergraduate

PHL 295 Philosophy of the Environment (3 credits)

This course examines philosophical problems and questions that arise when we consider our place as human persons embedded in the natural world. We ask how our natures as complex human persons with rational, biological, and spiritual elements are both formed by and, in turn, form the natural world. As creatures bound by norms, we can also interrogate our ethical responsibilities as they pertain to the environment and one another. Specific topics covered may include global warming, responsibilities to future generations, population and consumption, wilderness preservation and restoration, the extinction crisis, environmental disobedience.

Attributes: CCC: Philosophy L1 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 302 Philosophy of Race (3 credits)

Race has long played a prominent role in our social existence, and continues to do so even in what some have called a "post-racial society." In this course, we will take a philosophical approach to understanding a set of related questions about race. What is the origin and basis for racial concepts? Is race socially constructed? Does it have a biological basis? Does racial discourse serve to further entrench racial divisions? How does racial oppression relate to other forms of oppression such as class- and gender-based oppression? What is "privilege"? What could it mean to say that a person has moral obligations deriving from harms which s/he has not personally brought about, and do persons ever have such obligations? We will also investigate issues such as affirmative action, racial solidarity, and the ways in which racial oppression differentially affects men and women.

Attributes: Africana Studies Course, CCC: Philosophy L1 Ethics, GEP. Diversity Course, GEP. Phil. Anthropology, Undergraduate

PHL 303 Phil of Race Class & Gender (3 credits)

This course introduces the student to the role of identity in contemporary life and prepares students to live, work, and interact with others in situations defined not by the similarity of those involved, but their differences. The course proceeds in three ways. First, in order to see how racial, ethnic, class, sexual, gendered, intersectional, and other identities have been understood, we study basic modern theories of human identity, of what it means to be a person. Then we turn to experiences and theories of the specific identities that are the focus of our class. Many of our readings introduce the student to oppressive experiences of race, ethnicity, class, sex and gender identities and the diverse responses that people have elaborated in an effort to overcome their marginalization and dehumanization. Third, we examine, in particular, different ways in which oppressed people have theorized race, class, and gender identities in an effort to develop emancipatory identities.

Attributes: CCC: Diversity, CCC: Philosophy L1 Non Ethics, GEP. Diversity Course, GEP. Phil. Anthropology, Undergraduate

PHL 304 African Philosophy (3 credits)

Introduction to African philosophical approaches to: the problems of God, causality and chance, freedom, fate and destiny, the concepts of spirit, the philosophical wisdom of the African proverbs and the implications of Africa's history for philosophy, with applications to Western thought. Selected Readings from modern African novels, essays in anthropology, traditional philosophical, religious and literary texts, and essays by contemporary African philosophers.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: Africana Studies Course, CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 308 Asian Philosophies (3 credits)

This course will examine the concepts of self, nature, and society in the Asian philosophical paradigms as they have been articulated by contemporary Asian philosophers in one or more historical traditions, including Indian philosophy, Chinese philosophy, and Japanese philosophy.

Attributes: Asian Studies Course, CCC: Philosophy L1 Non Ethics, GEP. Non-Western Studies, GEP. Phil. Anthropology, Undergraduate

PHL 309 Personhood in Islamic Phil (3 credits)

Reflection on personhood in Arab-Islamic philosophy is informed, broadly, by two different sources: the Quran, and Quranic Islam more generally, in which personhood is approached via legal, moral, and religious concepts; and falsafa, or Greek (and, in particular, Platonic, Aristotelian, and neo-Platonic) philosophy, where the operative concepts are rather scientific: metaphysical, epistemological, and psychological. This course examines the many ways in which thinkers in the Arab-Islamic tradition, informed by these sources, have considered the existence and nature of persons, both divine and human. Much of the course will focus on the high classical period (9th to 12th c. CE), though we will also cover some significant post-classical, modern, and contemporary thought. Broad topics to be addressed include the existence and attributes of God, the order of the cosmos and the place of human persons within it, human nature, as well as the proper ethical ordering of human life and of the political state. We will discuss these ideas as they operate within the Islamic world and also how they interact with the broader Western philosophical tradition.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP. Non-Western Studies, GEP. Phil. Anthropology, Undergraduate

PHL 310 Philosophy of Art (3 credits)

An examination of the philosophical questions arising from the human activity of creating and appreciating art (of all kinds: visual, musical, literary, etc.). Questions can include: the relation of perception and aesthetic appreciation to knowledge; the relation between emotion and belief; the relation between artist/creator, audience/spectator, and art work. How is art distinguished from nature as possible object of aesthetic appreciation? Must art even be aesthetic? If not, how is the category 'art' defined, and by whom?

Attributes: CCC: Philosophy L1 Non Ethics, GEP. Phil. Anthropology, Undergraduate

PHL 311 Philosophy of Law (3 credits)

Philosophy of Law examines some of the philosophical questions raised by law and legal systems, such as the nature and limits of law, the relation between law and morality, the challenges in applying the principles of constitutional, contract, criminal and tort law, and specific issues such as civil disobedience, equality and liberty, rights and responsibility, and punishment and excuses.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP. Ethics Intensive, Justice Ethics and the Law , GEP. Phil. Anthropology, Undergraduate

PHL 312 Animal Ethics (3 credits)

Animal ethics refers to the moral and legal obligations of humans to nonhuman animals. To determine these obligations, we will give the first few weeks of the course to considering the shared mental faculties of humans and animals. Traditionally obligations in ethics and law are owed in ethics to persons, and so it is necessary to find out whether any nonhuman animals qualify as persons. Related to the issue of nonhuman animals qualifying as persons, we will examine several moral theories in modern Western philosophy: Kant's theory of duty, the original and contemporary versions of utilitarianism, the social contract theory of John Rawls, and Martha Nussbaum's capabilities theory. In addition we will investigate the current situation in law for the permitted treatment of animals.

Attributes: CCC: Philosophy L1 Ethics, GEP: Ethics Intensive, Undergraduate

PHL 313 Gender and the Arts (3 credits)

Gender and the Arts undertakes central philosophical questions regarding issues of gender in the visual, literary, and performing arts. This course examines depictions of women in various artforms using prominent feminist theories of gender representation and expression and also investigates the ways in which these representations change based on race and sexual orientation. Other topics include critiques of historical definitions of art and artistic creation that cater to male artists and the role of cultural, political, and technological forces that have historically marginalized women artists. Finally, Gender and the Arts centers the works and lives of important women artists that have been systematically overlooked in the Western critical canon.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 320 Business, Society and Ethics (3 credits)

This course will discuss ethical issues in the practice of business. Topics will typically include ethical issues in marketing, finance, human resources, the environment, product liability, global sales and labor practices, etc. The course will address these issues in business practice through the lenses of traditional ethical theories.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP: Ethics Intensive, Faith Justice Course, Justice Ethics and the Law , Undergraduate

PHL 322 Philosophy of Science (3 credits)

Scientific values, theories, and practices play a central role in the ways modern human beings live, act, and interact. Increasingly, science affects how we understand our very natures as rational, biological, and social beings. This course examines the nature, role, and meaning of scientific inquiry and knowledge. It addresses topics such as scientific realism and anti-realism, the nature of observation, the structure of scientific theories, philosophical problems in the history of science, the role of values in science, the role of science in human affairs.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 324 Philosophy of Social Sciences (3 credits)

This course will involve an analysis of the metaphysical conceptions of the human person presupposed by various theories of the social sciences. The course will also examine the relation of various criteria for knowing to the theories which issue from them. Other topics may include materialism, positivism, historicism, cultural relativism, and various epistemological questions.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 326 Philosophy of Sports (3 credits)

This course will investigate a variety of philosophical issues surrounding sports. The main focus will be on ethical topics such as the use of performance enhancing drugs, the appropriateness of institutions surrounding college athletics, and the use of government funds to subsidize stadiums and arenas for professional sports franchises. These issues will be investigated by employing common methods in moral philosophy, informed by empirical research in economics and a variety of other scientific disciplines.

Attributes: CCC: Philosophy L1 Ethics, GEP: Ethics Intensive, Undergraduate

PHL 330 Social and Political Phil (3 credits)

This course serves as an introduction to major works in the history of social and political philosophy. With a survey of important figures and texts from pre-modern, modern and contemporary periods, the course will address basic philosophical questions about the individual, society and the political order, such as: What is justice? In what sense is the political order a kind of community? What is the philosophical basis and justification of law and political authority? What are the social and political implications of a commitment to human freedom and equality? What are the necessary social conditions for realizing freedom, justice and human flourishing? Major authors might include Plato, Aristotle, Augustine, Aquinas, Hobbes, Locke, Rousseau, Hume, Smith, Kant, Marx, Mill, Arendt, and Rawls.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP: Ethics Intensive, Justice Ethics and the Law , GEP: Phil. Anthropology, Undergraduate

PHL 331 Inequality: A Phil Exploration (3 credits)

This course explores the problem of inequality from a philosophical perspective. To that end, we reconstruct and critically evaluate arguments for and against inequality in ancient, modern, and contemporary political philosophy. When, if ever, are social, political, and economic inequalities justified? Is inequality simply a reflection of human nature, or is it the product of society's major institutions? Who has a moral responsibility to combat unjust forms of inequality that already exist? To answer these questions, we survey the works of major figures such as Plato, Aristotle, Locke, Rousseau, Wollstonecraft, Marx, DuBois, Rawls, and MacKinnon.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP: Diversity Course, GEP: Ethics Intensive, GEP: Phil. Anthropology, Undergraduate

PHL 332 Economic and Social Philosophy (3 credits)

This course will investigate the idea of social justice from several philosophical perspectives and/or traditions. Issues to be addressed may include: distributive justice, private property, the working poor, economic globalization, and capitalism and its alternatives.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP Phil. Anthropology, Undergraduate

PHL 334 Ethics and Criminal Justice (3 credits)

This course will address ethical issues in the criminal justice system at both the theoretical and applied levels. Typical theoretical issues addressed might include the following: the relationship between law and morality; theories of punishment; conditions for the moral and/or legal responsibility of individuals; notions of procedural justice. Typical applied ethics issues might include the following: limits on the police use of deception and of deadly force; search and seizure rules; plea bargaining; mitigation and excuse defenses (e.g. insanity); mandatory sentencing, especially life without parole; capital punishment.

Attributes: CCC: Philosophy L1 Ethics, GEP Ethics Intensive, Justice Ethics and the Law , Undergraduate

PHL 336 Violence and Non-Violence (3 credits)

This course will focus on two levels: philosophical reflection on the moral dimensions of violence and nonviolence in general, and analysis of some specific moral issues concerning the resort to violence. Issues include the morality of war, especially under current conditions, and criminal punishment. Theories of nonviolence, and practical alternatives to violence, will be examined.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP Ethics Intensive, Justice Ethics and the Law , Undergraduate

PHL 338 Violence & Reconciliation in N. Ireland (3 credits)

The course will examine violence and reconciliation in Northern Ireland from both a philosophical and empirical perspective. Special attention will be paid to both the socio-historical roots of "The Troubles" and the moral context of discourses of retribution and forgiveness. During the stay in Northern Ireland, SJU students are guests of Corrymeela, an ecumenical community committed to the work of reconciliation by providing a "safe and shared space" where people can meet as Protestants and Catholics, British and Irish, rich and poor, and through open dialogue and interaction grow in trust with one another. Students will also visit selected sites in Derry and Belfast.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP Ethics Intensive, Justice Ethics and the Law , Undergraduate

PHL 340 Topics in Political Philosophy (3 credits)

This course will examine recent developments and debates in social and political philosophy. The emphasis of the course will be on contemporary discussions of a problem or set of problems, though some attention may be paid to the treatment of these problems in the history of philosophy. Topics to be examined might include political legitimacy, human rights, private property and distributive justice, just and unjust war, cosmopolitanism and patriotism, global justice, social unity and solidarity, toleration, multiculturalism, and the role of religion in politics.

Attributes: GEP Ethics Intensive, Undergraduate

PHL 342 Dimensions of Freedom (3 credits)

Political philosopher Hannah Arendt claims that the ability to forgive and the ability to make and keep promises are at the center of human freedom, the capacity to interrupt automatic processes and begin something new. The experience of imprisonment will be an important focus of class discussion, and a starting point to examine multiple dimensions of human freedom. These include: negative vs. positive freedom; freedom of action vs. inner freedom (thought, imagination, will); political freedom vs. political oppression; the extent to which freedom in any of these senses is a good, worthy of the value we tend to give it. For each dimension, we will also ask what inner and/or external conditions limit or even preclude its exercise.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP Phil. Anthropology, Undergraduate

PHL 344 A Good Life (3 credits)

The course will begin with an examination of Plato's classical account of a good life, grounded in the health of the body and soul and in active participation in a just community. We will then turn to the modern German philosophical tradition that further specifies this conception of a good life in terms of the reflective, yet concrete self-realization of the person grounded in right relations to oneself, other persons, nature, the institutions in which one's life is embedded, and to the future. Key topics will include human freedom and responsibility, the need for mutual recognition among human beings, and the notion of common sense. We will also spend time on the difficult human problems of rampant consumerism, commodification, and the instrumentalizing of human reason. In Germany we will explore specific ways in which the now philosophically grounded themes of health, sustainability, and community are manifest in institutions and cultural practices. We will spend the majority of our time in the award winning "Green City" of Freiburg, a socially innovative and historic university town, and capital of the Black Forest. We will then travel to the idyllic, medieval city of Tübingen and finally to Frankfurt, a major urban center well-known for its sustainable practices and innovative ideas. Can count for either CCC Level 2 Ethics or Level 2 Non-Ethics with chair permission.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP Phil. Anthropology, Study Tour, Undergraduate

PHL 350 God in Recent Philosophy (3 credits)

The course examines three different conceptions of God: [1] Popular Theism: God conceived as similar to a human person - though incorporeal, unobservable, and possessed with superhuman attributes. This is the view of God held by most traditional theists. [2] Perfect Existence Theism: in which God is not a being of any kind, not even a personal being, even though personal language can be used in speaking of God. This is the view of God espoused by Thomas Aquinas; and [3] Panentheism: God conceived as inclusive of rather than independent of the world; the relation between God and the world being like the relation between the mind and its body. This view has been defended by Charles Hartshorne. In the case of each form of theism, questions arise as to how it deals with the problem of evil: how its view of God squares with the fact that the world contains vast amounts of moral and physical evil.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 351 Reason, Faith, and Relativism (3 credits)

Intelligent, sincere, and equally well-informed people often strongly disagree. This seems especially true when it comes to religious beliefs. In that context, people will often appeal to "faith," which some construe as belief without good reason. It is therefore important to ask what counts as good reason for holding a belief, and whether all beliefs are subject to the same standard. If two individuals hold contradictory beliefs, then certainly one of them is wrong, but might both be justified in holding those beliefs? If so, does this imply that truth is relative? This course deals with the general topic of rational belief formation in a world that is religiously, ideologically, and culturally diverse.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 352 Kierkegaard, Nietzsche, Dostvsky (3 credits)

Against the backdrop of classical metaphysics and human rationality, the sources and early development of existential themes are developed. Selected readings from Kierkegaard (Either/Or, Fear and Trembling), Nietzsche, (Thus Spoke Zarathustra, Beyond Good and Evil), and Dostoevsky (Notes from the Underground).

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 353 Philosophy, Science & Religion (3 credits)

A consideration of important issues in philosophy and philosophy of religion within the historicizing context of the scientific world-view of the times. Simultaneously, the course will consider the implications of the current (and changing) scientific world-view (genetics, astronomy, physics) for philosophical and religious reflection, including the idea of God. Philosophically as well as scientifically, the course will take its point of departure in Darwin and come back to consider the radical implications for philosophy and religion prophetically seen by his contemporary Nietzsche. Satisfies Signature core course requirement in Faith and Reason

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 354 Philosophy of Religion (3 credits)

Philosophical analysis of some of the following topics: religious experience, testimony, belief, human destiny, evil, knowledge of and language and arguments about God. Readings from classical and contemporary sources.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Mission: Faith Reason, CCC: Philosophy L2 Non Ethics, Faith Justice Course, GEP: Faith-Reason Course, Undergraduate

PHL 355 Phil Iss in Christian Doctrine (3 credits)

This course will investigate the coherence and plausibility of some of the most central teachings of Christianity. A sampling of potential topics includes: heaven and hell, the Trinity, Original Sin, the Atonement, and the Incarnation. There will also be a discussion of different methods of deciding when a teaching is essential to Christianity, and an exploration of various alternative interpretations of the doctrines. Can count for either CCC Level 2 Ethics or Level 2 Non-Ethics with chair permission.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Mission: Faith Reason, CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 356 Religious Diversity (3 credits)

Religious diversity is an inescapable fact. It is hard to imagine anyone is thinking their religion (should they have one) to be the only one that exists or the only one capable of evincing commitment and devotion. The diversity of religions raises questions that are practical as well as theoretical. The fact of religious diversity has elicited various philosophical reactions, ranging from exclusivism to relativism to inclusivism.

Prerequisites: PHL 101 or PHL 102 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 154 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Honors Course, Undergraduate

PHL 358 Atheism & Prob of God (3 credits)

After a study of the classical arguments concerning God's existence, the course examines examples of 19th century atheism (Feuerbach, Marx, Nietzsche) and belief (Kierkegaard, Dostoevsky), and 20th century atheism (Sartre, Camus) and belief (Rahner, Marcel).

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 359 Existence of God (3 credits)

This course will focus on arguments for and against the existence of God. It will begin by examining the ontological, cosmological, and design arguments for the existence of God. Included will be a discussion of purported evidence for the existence of God from modern biology and cosmology. It will then examine arguments against the existence of God based on human and animal suffering, followed by arguments against the existence of God arising from the scarcity of credible miracle claims.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Mission: Faith Reason, CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 360 Philosophy of God in Aquinas (3 credits)

This course will examine the philosophical writings of Thomas Aquinas on the existence and nature of God. Topics include the procedure of philosophical theology, the methodological problem of attaining true knowledge of God, Aquinas's "five ways" of demonstrating the existence of God, and arguments for the various "attributes" of God: simplicity, perfection, goodness, infinity, ubiquity, unchangeableness, eternity, and oneness. Aquinas's innovative method of analogical predication will be employed to offer a philosophical interpretation of core theistic assertions that God has life and knowledge that God wills and loves, that God exercises providence both justly and mercifully, that God is all-powerful and perfect happiness. This course may be taken to satisfy the major requirement for a course in the ancient or medieval period.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Medieval, Ren & Reform Studies, Undergraduate

PHL 361 Vision, Experience Faith (3 credits)

This course engages students with the puzzle of whether religious faith is strengthened or weakened by reflection on human perceptual experience, in particular visual experience. The status of religious experience as a possible support for justified religious belief will be examined. Contemporary scientific accounts of visual experience will be considered.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155)

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 362 Faith & Reason in Kantian Phil (3 credits)

This course begins with an examination of two types of traditional arguments for the existence of God: those based on putative grounds of reason and those based on putative grounds of experience. The questionable success of such proofs will raise several questions: what is the nature of human reason, what is the nature of faith as a distinct epistemic attitude, and how should we think about the relation between them? We shall then pursue Kant's systematic answers to these questions with the hope that they will give us a workable and empowering alternative to the arguments studied earlier in the course. Possible further topics for the course include (1) the possibility of understanding the history of arguments for God's existence as a progressive development of reason's awareness and articulation of its needs, and (2) the application of Kant's analysis of reason to some fundamental claims and themes of the Christian religion in order to show how they can be understood as having a basis in reason.

Prerequisites: (PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and ENG 101) and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 364 God, Evil, and Hiddenness (3 credits)

This course will examine recent arguments against the existence of God based on the problem of evil and the problem of divine hiddenness. (The problem of evil is the problem of reconciling God's existence with the presence and severity of suffering in the world, and the problem of divine hiddenness is the issue of understanding why God would provide so few clear and dramatic signs of his presence.) Although no prior mathematical knowledge will be presupposed, as part of the process of understanding the arguments students will also be expected to master some basics of probability theory.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Mission: Faith Reason, CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 365 Christianity and Evidence (3 credits)

This course will investigate several topics surrounding Christianity and evidence. The course is divided into two sections. The first is an exploration of the question of whether we have good evidence for Christianity. Included in this first unit will be a discussion of both scriptural evidence and the evidence provided by purported miracles in the modern world. The second section will examine the relationship between belief and evidence, in an attempt to understand whether Christian belief (and religious belief more generally) should be based on evidence in the same way as many other kinds of beliefs.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Mission: Faith Reason, CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 370 Special Topics in Philosophy (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHL 377 Inside-Out (3 credits)

This class offers a unique opportunity to have meaningful discussions about a range of topics from inside a correctional facility. Inside-Out classes bring together students from Saint Joseph's University and adult students who are incarcerated to learn about and discuss topics such as the causes of crime, racism, literature, philosophy, and restorative justice. Through the readings and dialogue, inside and outside students will be able to integrate their theoretical knowledge with lived experiences. It is through this exchange that we hope to critically analyze and challenge the current system in the U.S. that has resulted in a higher incarceration rate than other similar countries.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, Faith Justice Course, GEP Art/Literature, Justice Ethics and the Law, GEP Phil. Anthropology, Service Learning Course, Undergraduate

PHL 401 Ancient Philosophy (3 credits)

What is the nature of ultimate reality? What standards must our beliefs meet if they are to qualify as knowledge? Is the soul distinct from the body, and what sort of trait is virtue? These are among the most basic questions of philosophy, and they took shape originally in the ancient world of Greece and Rome. This class provides a critical survey of the questions and possible answers provided by the founders of the western philosophical tradition. Philosophers discussed include the Presocratics, Socrates, Plato, Aristotle, the Stoics.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 402 Plato and Aristotle (3 credits)

A focused examination of the major ethical, metaphysical, and political theories of Plato and Aristotle. The class will cover the ideas of these two philosophers on such topics as the nature of virtue, the soul, change in the physical world, substance, the best political regime, and the relation between political activity and philosophy.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 404 Love, Friendship, Ancient World (3 credits)

This course explores a number of descriptions of love and friendship found in works of literature and philosophy from ancient Greece and Rome. Two topics in particular will be studied in these works on love and friendship. The first is the connection between friendship, justice, and politics that is asserted in a number of ancient works. The second is the presentation of erotic love as a form of divine madness that can be both dangerous and beneficial. Some authors to be read include Sophocles, Euripides, Plato, Aristotle, Cicero, and Catullus.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and ENG 101

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Philosophy L2 Ethics, GEP Phil. Anthropology, Undergraduate

PHL 409 Philosophy of St. Augustine (3 credits)

This course examines the philosophical thought of Augustine of Hippo through three of his most important works. The course will engage with a number of themes that are central to Augustine's thought—for example, sin and free choice, evil, the human condition, human flourishing, desire, cognition, memory, time, as well as creation and its relationship to God, and the nature of God Itself.

Prerequisites: PHL 101 or PHL 102 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 154 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Medieval, Ren & Reform Studies, GEP Phil. Anthropology, Undergraduate

PHL 410 Medieval Philosophy (3 credits)

An introduction to medieval philosophy through a study of its most important thinkers (e.g., Augustine, Boethius, Anselm, Aquinas) and its central questions (e.g., the existence and nature of God, the problem of evil, the compatibility of human freedom and divine foreknowledge, the limitations of human reason, the immortality of the soul, happiness, virtue, natural law).

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Medieval, Ren & Reform Studies, Undergraduate

PHL 412 The Philosophy of Aquinas (3 credits)

A close examination of Thomas Aquinas's writings on topics such as proofs for the existence of God, the nature of God, creation, providence, the relation of body and soul, immortality of the soul, human knowing, happiness, virtue, natural law

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Medieval, Ren & Reform Studies, GEP Phil. Anthropology, Undergraduate

PHL 420 Early Modern Philosophy (3 credits)

A critical analysis of the rationalist and empiricist movements of the 17th and 18th centuries. Emphasis will be placed on the epistemological and metaphysical theories of the following thinkers: Descartes, Spinoza, Leibniz, Locke, Berkeley, and Hume.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 428 The Enlightenment & Its Critics (3 credits)

This course provides a survey of the "critical tradition" in philosophy - a tradition seeking to ascertain the nature and limits of human reason in the hopes of moving toward social and cultural progress. The course will begin with the critical tradition's roots in the thinkers of the French and German Enlightenments of the 18th century, continue with three of the Enlightenment's major critics - Marx, Nietzsche, and Freud - and culminate in the critical social theories of the Frankfurt School and Michel Foucault in the 20th century. In the end, the course will consider the tenability of the Enlightenment project and its hopes for the future as well as the status of critical social theory today.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 430 Kant's Critique of Pure Reason (3 credits)

In this course we shall pursue a close study and critical assessment of Kant's highly original theory of transcendental idealism as it is presented in his seminal work, the Critique of Pure Reason. Specific topics will include, but are not limited to, the nature of human reason, the nature of experience, the possibility of synthetic a priori knowledge, the relation between mind and world, the limits of human knowledge, transcendental idealism vs. transcendental realism, varieties of skepticism and responses to them, self-knowledge, the problem of free will, and philosophical method. We shall begin the course by sketching some of the problems that Kant inherited from early modern philosophy and to which he is responding.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 432 German Idealism (3 credits)

In this course we shall explore the views of the major thinkers of the German idealist period - namely, Kant, Fichte, Schelling, and Hegel - with respect to such topics as the nature of human reason, knowledge and the self, the relation between mind and world, the unconditioned, freedom and morality, the nature and role of art, God and religion, and reason in history. We shall begin the course by sketching the philosophical context and a set of problems that helped motivate the movement as a whole. Some attention may also be paid to some of the lesser-known figures of the period, such as Reinhold, Jacobi, and Maimon.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 434 Existentialism (3 credits)

A study of the Existentialist movement, from its 19th century origins in Kierkegaard and Nietzsche and the Phenomenology of Husserl to its most prominent 20th century representatives, including Heidegger, Jaspers, Sartre and Camus.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Ethics, GEP: Phil. Anthropology, Undergraduate

PHL 440 Phenomenology (3 credits)

A study of the philosophical background, methods, and results of the phenomenological movement in 20th century European thought. After examining a cluster of philosophical problems that gave rise to the movement, we shall focus mainly, though not exclusively, on the work of Husserl, Heidegger, and Sartre. In addition to our study of philosophical method, we shall explore phenomenological accounts of various matters such as consciousness, perception, hermeneutics, the existential nature of human beings, transcendence, self-deception, and otherness.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 295 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 446 Feminist Epistemology (3 credits)

Feminist challenges to traditional ways of thinking in epistemology, philosophy of science, metaphysics and ethics. Examination of feminist criticisms regarding: the nature and justification of knowledge; dominant conceptions of rationality and objectivity; various dualistic ontologies; and prevailing conceptions of the self. Consideration of possible gender-bias in traditional philosophical methods.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 450 American Philosophy (3 credits)

Philosophy in the American context: the "American experience", historical and contemporary; philosophical concerns that arise in that context; the classical American philosophers - Edwards, Peirce, James, Royce, Dewey, and Whitehead. Central concerns: the meaning of experience; scientific inquiry as a model of knowing; the meaning of religion and religious experience; the problems of value (moral and aesthetic); the problem of community.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: American Studies Course, CCC: Philosophy L2 Non Ethics, GEP: Faith-Reason Course, Undergraduate

PHL 461 Contemporary Thomism (3 credits)

St. Thomas Aquinas, one of the greatest philosopher-theologians of the Middle Ages, employed both faith and reason to conceive a remarkably comprehensive and nuanced understanding of reality. Recently, some philosophers have been returning to the works of Aquinas and attempting to transpose his vision to meet the distinctive intellectual challenges of our own quite different age. After providing an introduction to Aquinas' thought, this course will examine in depth the writings of one or more contemporary Thomists (e.g., Bernard Lonergan, Jacques Maritain, Etienne Gilson, Karl Rahner, Pierre Rousselot, Joseph Marechal, Josef Pieper).

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 470 Special Topics in Philosophy (3 credits)

Topics will vary according to the semester in which the class is offered.

Prerequisites: PHL 154

Attributes: Undergraduate

PHL 471 Problems in the Theory of Know (3 credits)

A critical examination of key problems in contemporary epistemology.

Problems relating to the analysis of knowledge and justification will be examined. Topics may include: knowledge and warrant; knowledge closure; skepticism of various forms; foundationalism, coherentism, reliabilism, contextualism; virtue epistemology; internalism and externalism; the role of formal (probabilistic) models in epistemology.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 473 Philosophy of Mind (3 credits)

A critical examination of metaphysical and epistemological issues in the contemporary philosophy of mind. These issues include the problem of reductionism, the problems of intentionality and mental representation, personal identity, conceptual foundations of psychology, and the possibility of artificial minds.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334 or PHL 271 or PHL 284

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 474 Language and Thought (3 credits)

Rene Descartes held a view called "mind-body dualism," according to which human persons are fundamentally thinking substances that are somehow causally linked to particular physical substances: bodies. One of his reasons for holding this view was that he believed that the human faculty of language could never, even in principle, be adequately explained by any purely physical description of things. Language, as he saw it, is evidence of mind, and indeed he believed that where language is absent, mind is also absent. Creatures without language are, in Descartes' view, mindless organic automata. Few today would defend Descartes' view in all details, but the general sense that language is an important "mark of the mental" has not gone away. Instead, it has given rise to a cluster of narrower but interesting and important questions: Are certain kinds of mental states impossible without language? Does the specific language that we speak influence our thoughts in some way? Do our innate tendencies of thought force our languages to take certain forms?

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 475 Language and Meaning (3 credits)

This course examines the core issues in the philosophy of language, focusing on the nature of linguistic meaning. What is linguistic meaning? Are meanings things in the world, ideas in our minds, or something else? How does the meaning of a sentence depend on the meaning of the words that compose it? In what ways does the content we communicate go beyond the words we use? How is meaning related to grammar? In what ways does meaning depend on context? We will examine how philosophers and linguists have answered these questions.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 481 History of Analytic Philosophy (3 credits)

This course will explore important figures and themes from the history of analytic philosophy. We will start with the birth of modern logic in the seminal works of Gottlob Frege and Bertrand Russell. As time permits, we will also discuss the project of philosophical analysis in the works of G. E. Moore, Russell and the early Ludwig Wittgenstein, the rise of logical positivism and emotivism (Rudolph Carnap, Susan Stebbing, A. J. Ayer, C. L. Stevenson), W. V. Quine's critique of Logical Positivism (in particular, his critique of the analytic-synthetic distinction), and the rise of ordinary language philosophy in the works of J. L. Austin, Peter Strawson, and the later Wittgenstein.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: CCC: Philosophy L2 Non Ethics, Undergraduate

PHL 490 Ethical & Legal Dimen Hlth Sci (1 credit)

This course will present students with the opportunity to investigate legal aspects of professional practice and ethical dilemmas that occur in patient care. Content includes laws and policies that define and regulate professional practice, criminal and civil actions involving health care providers and the legal responsibilities related to executing job responsibilities. Emphasis is placed on patients' rights and the professional duty to safeguard them. This course also explores ethical decision-making and the resolution of ethical dilemmas encountered in professional practice.

PHL 493 Independent Research in Phil (3 credits)

A research project under the direction of a faculty advisor.

Prerequisites: PHL 154

Attributes: Undergraduate

PHL 494 Independent Research in Phil (3 credits)

A research project under the direction of a faculty advisor.

Prerequisites: PHL 154

Attributes: Undergraduate

PHL 495 Philosophy Seminar (3 credits)

Readings, research, and discussion concerning a common theme; a paper is required.

Prerequisites: PHL 101 or PHL 102 or PHL 154 or PHL 220 or PHL 250 or PHL 258 or PHL 260 or PHL 262 or PHL 264 or PHL 268 or PHL 271 or PHL 284 or PHL 287 or PHL 295 or PHL 302 or PHL 303 or PHL 308 or PHL 310 or PHL 312 or PHL 326 or PHL 334

Attributes: Undergraduate

Physical Therapy (DPT)

DPT 501 Anatomy I (3 credits)

This is the first part of a regional study of the structure, function, and development of the human body with emphasis on the musculoskeletal, vascular and peripheral nervous systems of the lower extremity and back. Select pathologies will be used to explore the clinical relevance of anatomic relationships to human movement and function. Students who register for DPT 501 must also register for a DPT 501 laboratory. For example, if you register for DPT 501 you must, at the same time, register for a section of DPT 501L.

DPT 501L Anatomy I Lab (0 credits)

Students who register for DPT 501 must also register for a DPT 501 laboratory. For example, if you register for DPT 501 you must, at the same time, register for a section of DPT 501L.

DPT 502 Anatomy II (3 credits)

This course is the second part of a regional study of the structure, function, and development of the human body with emphasis on the musculoskeletal, vascular, and peripheral nervous systems of the upper limb, head and neck. Students will explore the viscera of the thorax and abdominopelvic cavities. Select pathologies will be used to explore the clinical relevance of anatomic relationships to human movement and function. Students who register for DPT 502 must also register for a DPT 502 laboratory. For example, if you register for DPT 502 you must, at the same time, register for a section of DPT 502L.

Prerequisites: (DPT 501 and (DPT 511 and (DPT 521 and (DPT 541 and (DPT 531

DPT 502L Anatomy II Lab (0 credits)

Students who register for DPT 502 must also register for a DPT 502 laboratory. For example, if you register for DPT 502 you must, at the same time, register for a section of DPT 502L.

DPT 511 Biomechanics/Kinesiology I (2 credits)

This is the first course, in a two-course sequence, studying the principles of kinesiology and biomechanics in relationship to movement disorders of the lumbar spine and lower extremity. Participants will develop the ability to analyze normal and abnormal functional movement, determine pathomechanics of movement dysfunctions, and incorporate kinesiological and biomechanical principles for solving movement dysfunctions. Students who register for DPT 511 must also register for a DPT 511 laboratory. For example, if you register for DPT 511 you must, at the same time, register for a section of DPT 511L.

DPT 511L Biomechanics/Kinesiology Lab (0 credits)

Students who register for DPT 511 must also register for a DPT 511 laboratory. For example, if you register for DPT 511 you must, at the same time, register for a section of DPT 511L.

DPT 512 Biomechanics/Kinesiology II (2 credits)

This is the second course, in a two-course sequence, studying the principles of kinesiology and biomechanics, in relationship to movement disorders of the upper extremity, cervical and thoracic spine. Participants will develop the ability to analyze normal and abnormal functional movement, determine pathomechanics of movement dysfunctions, and incorporate kinesiological and biomechanical principles for solving movement dysfunctions. Students who register for DPT 512 must also register for a DPT 512 laboratory. For example, if you register for DPT 512 you must, at the same time, register for a section of DPT 512L.

Prerequisites: (DPT 501 and (DPT 511 and (DPT 521 and (DPT 541 and (DPT 531

DPT 512L Biomechanics/Kinesiology II Lab (0 credits)

Students who register for DPT 512 must also register for a DPT 512 laboratory. For example, if you register for DPT 512 you must, at the same time, register for a section of DPT 512L.

DPT 521 PT Exam/Interventions I (2 credits)

An introduction to basic examination procedures, movement assessment, and intervention techniques in physical therapy of the lower quarter across the lifespan consistent with PT patient management model and International Classification of Functioning, Disability, and Health (ICF).

DPT 522 PT Exam/Interventions II (2 credits)

An introduction to basic examination procedures, movement assessment, and intervention techniques in physical therapy of the upper quarter across the lifespan consistent with PT patient management model and International Classification of Functioning, Disability, and Health (ICF).

Prerequisites: (DPT 501 and (DPT 511 and (DPT 521 and (DPT 541 and (DPT 531

DPT 531 Clinical Practice I (2 credits)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this first course of the series will introduce patient communication and mobility skills. Students who register for DPT 531 must also register for a DPT 531 laboratory. For example, if you register for DPT 531 you must, at the same time, register for a section of DPT 531L.

DPT 531L Clinical practice I Lab (0 credits)

Students who register for DPT 531 must also register for a DPT 531 laboratory. For example, if you register for DPT 531 you must, at the same time, register for a section of DPT 531L.

DPT 532 Clinical practice II (2 credits)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this second course of the series will focus on patient history, documentation skills, and patient teaching.

Prerequisites: (DPT 501 and (DPT 511 and (DPT 521 and (DPT 541 and (DPT 531

DPT 532L Clinical Practice II Lab (0 credits)

Students who register for DPT 532 must also register for a DPT 532 laboratory. For example, if you register for DPT 532 you must, at the same time, register for a section of DPT 532L.

DPT 533 Clinical Practice III (2 credits)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this third course of the series will focus on teamwork as a means to facilitate professional relationships and expand services to meet the needs of patients. Students will also be introduced to health insurance as it relates to access and payment for physical therapy services.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 541 Exercise Physiology (3 credits)

Concepts learned in this class will include the acute and chronic physiological changes that occur with exercise in the healthy population. You will develop an understanding of the scientific basis for aerobic and anaerobic training, exercise testing principles, fundamentals of exercise prescription, nutrition and recognize when appropriate to refer to appropriate health care professionals.

DPT 541L Exercise Physiology Lab (0 credits)

Students who register for DPT 541 must also register for a DPT 541 laboratory. For example, if you register for DPT 541 you must, at the same time, register for a section of DPT 541L.

DPT 542 Functional Neuroscience (3 credits)

A study of the basic principles and concepts related to the nervous system, including neuroanatomy, neurophysiology, neuropathology and motor learning and control theories. Brain and behavior relationships are explored with an emphasis on how changes in the nervous system and sensorimotor behaviors interact and linked to clinical reasoning for managing individuals with neuropathology.

DPT 542L Functional Neuroscience Lab (0 credits)

Students who register for DPT 542 must also register for a DPT 542 laboratory. For example, if you register for DPT 542 you must, at the same time, register for a section of DPT 542L.

DPT 550 Research I (2 credits)

The course provides an introduction to the research process and its relationship to evidence-based practice. Students will obtain a basic understanding of theory-based research, methodological considerations in the design of quantitative and qualitative research, ways of evaluating practice, and approaches to analyzing data.

DPT 551 Research II (2 credits)

In this course students will use clinical questions/scenarios to explore, critically appraise, and apply findings in the literature to inform and direct physical therapy practice. This course will emphasize the application of evidence-based practice to optimize patient outcomes.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 560 Psychosoc Issues Health/Well (3 credits)

This course provides an in-depth understanding of psychosocial determinants of health. It explores the ways psychological factors interact with social, cultural, economic, and environmental contexts of health. The course will apply relevant theories, concepts and models to understand, modify and promote health and wellness. A variety of topics will be presented through readings, lectures, discussions and experiential activities.

DPT 561 Ethics in Healthcare (2 credits)

This course provides an overview of common ethical frameworks and theories. The focus is on identifying and analyzing ethical issues and dilemmas facing the individual therapist and on the application of ethical principles and the APTA Code of Ethics to these dilemmas. The APTA Core Values will also be explored in the context of professional behavior and in relationship to the APTA Code of Ethics. This course includes aspects of federal, state, and case law as they apply to the individual therapist, as well as how they fit with ethical principles.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 571 Mvmnt Science Across Lifespan (2 credits)

This course explores typical age-related changes in human movement across the lifespan, with an emphasis on infants and older adults. Task-specific examples are used as the framework to integrate information from multiple diverse fields such as movement science, gerontology, developmental science, and biomechanics to provide the student with an understanding of the evolution of movement with age.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 542 and (DPT 550 and (DPT 560 and (DPT 532

DPT 581 Medical Management I (3 credits)

This is the first part of a two-course sequence that will present an overview of the pathophysiology and medical management of disorders frequently encountered by physical therapists, pain science, and the application of therapeutic modalities. Specific pathologies covered include diseases of the immune, endocrine, and musculoskeletal systems as well as other major clinical medicine disorders. Medical management includes modalities and basic pharmacologic and radiologic principles, relevant to physical therapists. A problem-solving approach with a focus on clinical decision making will be emphasized for the selection and application of appropriate procedures to manage pain, edema, limitations in motion, muscle weakness, and wound healing.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 601 Musculoskeletal Rehab I (5 credits)

This is the first course within a two-course sequence. This course will introduce the student to physical therapy examination and intervention for musculoskeletal dysfunction of the lower quarter from disease, disuse, trauma, surgery, and the aging process. The course will use musculoskeletal conditions with primarily inflammatory, degenerative, traumatic, and post-surgical etiologies as the basis for formulating a fundamental musculoskeletal exam and treatment plan. Students will develop skills and decision making to recognize when physical therapy is indicated, contraindicated, and when a referral to other health care personnel is needed.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 601L Musculoskeletal Rehab I Lab (0 credits)

Students who register for DPT 601 must also register for a DPT 601 laboratory. For example, if you register for DPT 601 you must, at the same time, register for a section of DPT 601L.

DPT 602 Musculoskeletal Rehab II (4 credits)

This is the second course within a two-course sequence. This course will introduce the student to physical therapy examination and intervention for musculoskeletal dysfunction of the upper quarter from disease, disuse, trauma, surgery, and the aging process. The course will use musculoskeletal conditions with primarily inflammatory, degenerative, traumatic, and post-surgical etiologies as the basis for formulating a fundamental musculoskeletal exam and treatment plan. Students will develop skills and decision making to recognize when physical therapy is indicated, contraindicated, and when a referral to other health care personnel is needed.

Prerequisites: (DPT 551 and (DPT 561 and (DPT 571 and (DPT 581 and (DPT 601 and (DPT 611

DPT 602L Musculoskeletal Rehab II Lab (0 credits)

Students who register for DPT602 must also register for a DPT 602 laboratory. For example, if you register for DPT602 you must, at the same time, register for a section of DPT 602L.

DPT 611 Cardiovascular Rehabilitation (2 credits)

This course will examine the impact of cardiovascular diseases on the movement system. Students will develop clinical skills inclusive of decision making for the physical therapy management of those with primary and secondary cardiovascular disorders across the lifespan in order to optimize movement, promote health and wellness, to mitigate the progression of impairments, and to prevent the development of, or the progression of, disability.

Prerequisites: (DPT 502 and (DPT 512 and (DPT 522 and (DPT 532 and (DPT 542 and (DPT 550 and (DPT 560

DPT 611L Cardiovascular Rehab Lab (0 credits)

Students who register for DPT 611 must also register for a DPT 611 laboratory. For example, if you register for DPT 611 you must, at the same time, register for a section of DPT 611L.

DPT 612 Pulmonary Rehabilitation (2 credits)

This course will examine the impact of pulmonary diseases on the movement system. Students will develop skills and decision making for the physical therapy management of those with primary and secondary pulmonary disorders across the lifespan in order to optimize movement, promote health and wellness, to mitigate the progression of impairments, and to prevent the development of, or the progression of, disability.

Prerequisites: (DPT 551 and (DPT 561 and (DPT 601 and (DPT 611 and (DPT 571 and (DPT 581

DPT 612L Pulmonary Rehabilitation Lab (0 credits)

Students who register for DPT 612 must also register for a DPT 612 laboratory. For example, if you register for DPT 612 you must, at the same time, register for a section of DPT 612L.

DPT 620 Leadership (2 credits)

This course will explore the concept of leadership and the traits, values, and actions of effective leaders. Students will analyze the implementation and effectiveness of different leadership styles and management principles within the context of current health care systems, practices, and other professional arenas. Students will formulate a plan for their own continued professional growth as they create a portfolio of evidence of leadership activities.

Prerequisites: (DPT 673

DPT 621 Neurorehabilitation I (4 credits)

This is the first course within a two-course series which focus on identifying and performing optimal examination and treatment techniques with individuals with neuromuscular dysfunction using valid and reliable outcome measures to comprehensively understand the impact of deficits on all levels of the International Classification of Functioning, Disability and Health model. Students will begin to develop clinical decision making skills utilizing evidence based practice to manage individuals with neuromuscular pathology from the start of care and through the continuum of care. Students will begin to develop competence in performing examination and treatment of individuals with neurologic dysfunction across the lifespan with a focus on those with acquired brain injury.

Prerequisites: (DPT 551 and (DPT 561 and (DPT 571 and (DPT 581 and (DPT 601 and (DPT 611

DPT 621L Neurorehabilitation I Lab (0 credits)

Students who register for DPT 612 must also register for a DPT 612 laboratory. For example, if you register for DPT 612 you must, at the same time, register for a section of DPT 612L.

DPT 622 Neurorehabilitation II (5 credits)

This is the second course within a two-course sequence which focuses on the human movement system and the development of proficiency in the examination and treatment of individuals with neuromuscular dysfunction using valid and reliable outcome measures to comprehensively understand the impact of deficits on all levels of the International Classification of Functioning, Disability and Health model. In this course students will develop clinical decision making skills utilizing evidence based practice to manage individuals with neuromuscular pathology from the start of care and through the continuum of care with attention to contextual, personal, environmental factors, and psychosocial issues surrounding patients and their support system. Students will develop competence in performing examination and treatment of individuals with neurologic dysfunction across the lifespan with a focus on those with acquired and progressive conditions.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 622L Neurorehabilitation II Lab (0 credits)

Students who register for DPT 622 must also register for a DPT 622 laboratory. For example, if you register for DPT 622 you must, at the same time, register for a section of DPT 622L.

DPT 631 Clinical Practice IV (1 credit)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this fourth course of the series will focus on clinical reasoning and focused exam procedures.

Prerequisites: (DPT 551 and (DPT 561 and (DPT 571 and (DPT 581 and (DPT 601 and (DPT 611

DPT 632 Clinical Practice V (2 credits)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this fifth course of the series will focus on billing and financial considerations as well as interprofessional education.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 632L Clinical Practice V Lab (0 credits)

Students who register for DPT 632 must also register for a DPT 632 laboratory. For example, if you register for DPT 632 you must, at the same time, register for a section of DPT 632L.

DPT 633 Clinical Practice VI (1 credit)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this sixth course of the series will focus on mentorship and peer teaching.

Prerequisites: (DPT 622 and (DPT 641 and (DPT 661 and (DPT 671 and (DPT 681 and (DPT 651

DPT 634 Clinical Practice VII (1 credit)

The Clinical Practice course series gives students a variety of exposures to clinical situations and experiences to integrate classroom learning with real and simulated patient encounters from the first- through the third-professional year. These encounters are designed in stepwise fashion to guide the development of interpersonal, communication, and decision-making skills while affording the student an opportunity to practice select clinical skills. Didactic sessions in this seventh and final course of the series will focus on coordination of care and complex decision making.

Prerequisites: (DPT 652 and (DPT 672

DPT 641 Integumentary PT (3 credits)

This course will examine the impact of the integument and its related disorders on the movement system. Students will develop skills and decision making for the physical therapy management of those with primary and secondary integumentary disorders in order to optimize movement, promote health and wellness, to mitigate the progression of impairments, and to prevent the development of, or the progression of, disability.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 650 Research III (1 credit)

The student will participate in the development and implementation of a research related capstone project. The student will gain insights into working with peers while engaging in faculty mentored capstone project. This capstone practicum is intended to provide a learning opportunity for the student(s) to integrate didactic knowledge and clinical experience into critical inquiry related to administration, clinical practice, research or teaching.

Prerequisites: (DPT 551 and (DPT 561 and (DPT 571 and (DPT 581 and (DPT 601 and (DPT 611

DPT 651 Research IV (1 credit)

The student will continue to implement and progress in a research related capstone project while engaging with peers and faculty mentors. The capstone project provides opportunity for students to integrate their didactic and experiential education into a capstone project within the context of administration, clinical practice, research or teaching.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 652 Research V (1 credit)

This course is the final research related capstone course in the DPT curriculum, which provides opportunity for students to integrate their didactic and experiential education into a capstone critical inquiry project within the context of administration, clinical practice, research or teaching. The students complete the capstone critical inquiry process by developing several avenues of disseminating project results and analyses.

Prerequisites: (DPT 622 and (DPT 641 and (DPT 661 and (DPT 671 and (DPT 681 and (DPT 651

DPT 661 Acute Care PT (2 credits)

In this course students will further develop clinical decision-making skills for the management of a person in the acute care setting across the lifespan. Students will develop and refine technical and professional behavior skills for the physical therapy management of patients in the acute care setting. This course will focus on diagnoses commonly seen, as well as contraindications and precautions needed to competently evaluate and treat in this setting. Students will be able to interpret commonly used diagnostic tools including radiology, lab values, vital sign response, and medications to modify their physical therapy interventions. Students will learn to work collaboratively with the interprofessional team to communicate patient needs and determine appropriate discharge disposition.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 671 Rehab across the lifespan (2 credits)

This course is designed to provide the student with an understanding of the biological, pathological, psychological and social aspects of development and aging from birth through end of life. Examination and intervention techniques will be presented focusing on the overall management of pediatric and geriatric patients/clients. Discussion will emphasize the use of current literature to promote evidence-based practice.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 671L Rehab Across the Life Lab (0 credits)

Students who register for DPT 671 must also register for a DPT 671 laboratory. For example, if you register for DPT 671 you must, at the same time, register for a section of DPT 671L.

DPT 672 Integrative Management I (2 credits)

This is the first of two case-based courses designed to give students the skills to make advanced clinical decisions, identifying needs across multiple body systems and integrating these with the resources and challenges patients encounter in the healthcare system and within their own social support systems. In this first course, students will draw and expand on their knowledge of select pediatric conditions to create comprehensive treatment plans that are relevant to settings across the continuum of care. Lab sessions will give students practice adapting evidence-based exam and intervention skills to younger populations.

Prerequisites: (DPT 622 and (DPT 641 and (DPT 661 and (DPT 671 and (DPT 681 and (DPT 651

DPT 673 Integrative Management II (3 credits)

This is the second of two case-based courses designed to give students the skills to make advanced clinical decisions, identifying needs across multiple body systems and integrating these with the resources and challenges patients encounter in the healthcare system and within their own social support systems. In this second course, students will draw and expand on their knowledge of select geriatric conditions to create comprehensive treatment plans that are relevant to settings across the continuum of care. Lab sessions will give students practice adapting evidence-based exam and intervention skills to older populations.

Prerequisites: (DPT 652 and (DPT 672

DPT 681 Medical Management II (2 credits)

Medical Management II is the second of a two-course sequence that will present an overview of the pathophysiology of disorders frequently encountered by physical therapists, particularly those affecting the gastrointestinal, integumentary, and neuromuscular systems, as well as other major clinical medicine disorders such as infectious disease. Disease processes across the life span are presented. Basic pharmacological intervention is discussed. The course will emphasize the relationships of pathological processes to patient symptoms and function throughout the lifespan.

Prerequisites: (DPT 602 and (DPT 612 and (DPT 621 and (DPT 650

DPT 690 Clinical Educa. Experience I (12 credits)

This course is the first full-time clinical education experience occurring under the direct supervision of a licensed physical therapist. The purpose of this experience is to practice technical and professional behavior skills, and develop efficiency in the areas of patient examination, evaluation, clinical reasoning, goal setting, program planning, and intervention implementation. Through interactions with patients and other healthcare disciplines, students will have the opportunity to integrate academic coursework into this patient setting. This rotation may be completed in an acute care hospital, post-acute rehabilitation unit, outpatient center, early intervention/school setting, home care, specialty care, or combination of above.

Prerequisites: (DPT 622 and (DPT 641 and (DPT 651 and (DPT 661 and (DPT 671 and (DPT 681

DPT 691 Clinical Educ. Experience II (12 credits)

This course is the first of two terminal full-time clinical education experiences occurring under the direct supervision of a licensed physical therapist. The purpose of this experience is to refine professional behavior, as well as skill and efficiency in the areas of patient examination, evaluation, goal setting, program planning, intervention implementation, and clinical decision-making in a setting that will meet the educational needs of each student individually. Through interactions with patients and other healthcare disciplines, students will have the opportunity to integrate academic coursework into a variety of patient settings. This rotation may be completed in an acute care hospital, post-acute rehabilitation unit, skilled nursing facility, outpatient center, early intervention/school setting, home care, specialty care, or a combination of above.

Prerequisites: (DPT 652 and (DPT 672

DPT 692 Clinical Educ. Experience III (12 credits)

This course is the second of two terminal full-time clinical education experiences occurring under the direct supervision of a licensed physical therapist. The purpose of this experience is to promote professional behavior, as well as independence and proficiency in the areas of patient examination, evaluation, goal setting, program planning, intervention implementation, and clinical decision-making in a setting that will meet the educational needs of each student individually. Through interactions with patients and other healthcare disciplines, students will have the opportunity to integrate academic coursework into a variety of patient settings. This rotation may be completed in an acute care hospital, post-acute rehabilitation unit, skilled nursing facility, outpatient center, early intervention/school setting, home care, specialty care, or a combination of above.

Prerequisites: (DPT 673

DPT 693 Clinical Educ Exp Off-Cycle (6 credits)

This course is for students who are off-cycle with their clinical experiences. Students will have an opportunity to continue to improve their skills and efficiency in the areas of professional behaviors, patient examination, evaluation, goal setting, program planning, intervention implementation, and/or clinical decision-making in a setting that will meet the educational needs of each student individually. Through interactions with patients and other healthcare disciplines, students will have the opportunity to integrate academic coursework into a variety of patient settings. This experience may be completed in an acute care hospital, post-acute rehabilitation unit, skilled nursing facility, outpatient center, early intervention/school setting, home care, specialty care, or a combination of the above.

Attributes: Doctoral

Physician Assistant Studies (PHA)

PHA 501 Advanced Human Anatomy (4 credits)

This intensive, graduate-level course in advanced human anatomy is designed for physician assistant students, providing an in-depth study of human anatomical structures with an emphasis on clinical application. The course will combine theoretical lectures with practical dissections and imaging techniques, preparing students for professional practice in medicine. Throughout the course, students will develop a strong foundation in human anatomical principles that are critical for diagnosing and managing conditions in clinical settings. The advanced nature of this course ensures that students will have a robust understanding of anatomical systems and their clinical applications.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 502 Advanced Human Physiology (3 credits)

This rigorous, graduate-level accelerated course in advanced human physiology is designed for physician assistant students to deepen their understanding of human physiological processes and prepare them for clinical practice. Through an integrated approach of lectures and clinical correlations, students will explore the functional mechanisms of the body and their relevance to health and wellness. Emphasis will be placed to link physiological concepts to clinical scenarios in medical practice. Throughout the course, students will connect physiological principles to clinical scenarios, equipping them with the knowledge necessary for effective patient care. The course aims to integrate physiological theory with the clinical skills required for practicing as a physician assistant in a wide range of healthcare settings.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 503 History/Physical I (3 credits)

This graduate-level course is designed for physician assistant students to develop essential skills in performing comprehensive history-taking and physical examinations. The course will provide both theoretical knowledge and practical application of clinical examination techniques. Students will learn to gather comprehensive patient information, conduct comprehensive physical examinations, and accurately document findings to support diagnosis and patient care. The course emphasizes the integration of history and physical examination skills in a clinical setting, with a focus on patient-centered approaches and communication. Throughout the course, students will integrate history-taking and physical examination techniques to build clinical reasoning skills, ensuring they are well-prepared to perform comprehensive and accurate evaluations in real-world healthcare settings.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 504 Pharmacology I (3 credits)

This is the first of two courses designed to provide a solid foundation in pharmacokinetics, pharmacodynamics, pharmacotherapeutics, and the physiology associated with drug action and interaction. Drugs will be discussed by class with attention given to specific drugs, indications, contraindications, dosage, mechanism of action, side effects, similarities, and differences. Emphasis will be placed on the more common drugs in the treatment of common diseases including ophthalmologic diseases, disorders of the ears, nose, and throat, infectious diseases to include antibiotics and antivirals, and respiratory, cardiovascular, and hematologic diseases. Additionally, students will learn about prescribing medications across the lifespan, including dosing and dose considerations for infants, children, adolescents, adults, the elderly, and patients with both acute and chronic diseases. Learning to prescribe will include instruction on reducing error, mandatory reporting, prescription databases, and facilitating adherence to a treatment plan. Students will learn the impact of pharmacology on preventive medicine with instruction on travel medicine and safety, and the legal, political, social, and preventive implications of vaccinations.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 505 PA History (1 credit)

This graduate-level course is designed for physician assistant students, providing an in-depth exploration of the history, professionalism, and evolving role of physician assistants within the healthcare system. The course will examine the development of the PA profession, the ethical and legal responsibilities of PAs, and their contributions to the healthcare team. Students will also explore the demographic trends shaping PA practice, the future of the profession, and the role of PAs in global health, public health, and patient advocacy. Through case studies, readings, and interactive discussions, students will be equipped with the knowledge to navigate the complex and dynamic landscape of healthcare as PAs. Throughout this course, students will gain an understanding of the history, development, and professional identity of the PA role, while also gaining the tools to navigate the evolving healthcare environment. Emphasis will be placed on the PA's growing impact on healthcare delivery, patient advocacy, public health, and global health initiatives.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 507 Psychosocial Medicine (2 credits)

This graduate-level course for physician assistant students offers a comprehensive study of the psychological, social, and cultural factors influencing patient care and health outcomes. This course emphasizes the integration of psychosocial considerations with clinical practice to improve patient-provider communication, promote culturally competent care, and address the psychological needs of patients across the lifespan. The course provides PA students with the knowledge and tools to navigate complex ethical issues, manage challenging patient encounters, and understand the role of social determinants of health in shaping healthcare access and disparities. Throughout this course, students will gain a comprehensive understanding of the psychosocial factors that affect patient care, from communication and ethical conduct to the recognition and management of health disparities. By integrating these concepts into clinical practice, students will be better equipped to provide compassionate, culturally competent, and patient-centered care.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 508 Human Pathophysiology (3 credits)

This graduate-level course in human pathophysiology is designed for physician assistant students, providing an advanced understanding of the physiological mechanisms underlying disease processes. The course offers in-depth coverage of pathophysiological changes at the cellular, tissue, and organ system levels, linking the mechanisms of disease to clinical manifestations. Through a combination of lectures and clinical correlations, students will develop the knowledge necessary to identify common and complex diseases across multiple organ systems. Throughout the course, students will apply their understanding of pathophysiological mechanisms to clinical scenarios, integrating this knowledge. The course prepares students to recognize disease patterns, anticipate complications, and make informed decisions in the care of diverse patient populations.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 509 Medical Sciences Foundations (1 credit)

This graduate-level course is designed for physician assistant students and provides an advanced understanding of the fundamental scientific concepts critical to medical practice. This course integrates key areas of biochemistry, genetics, and pharmacology to support clinical decision-making and improve patient care. Emphasis is placed on the application of these scientific principles in the PA practice setting, with a focus on personalized medicine, genetic insights into diseases, and the pharmacologic basics. Students will develop a comprehensive foundation in medical sciences to enhance their ability to diagnose, treat, and prevent disease through evidence-based practices. Throughout this course, students will gain the foundational knowledge needed to approach patient care from a scientific perspective, applying these insights to their clinical practice. Emphasis will be placed on the translation of molecular and genetic information into practical, evidence-based healthcare, preparing students for advanced decision-making in diverse clinical settings.

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 522 Hist/Phys II & Clinical Skills (3 credits)

This graduate-level course is designed to build upon the foundational skills developed in previous clinical training, providing physician assistant students with advanced tools and techniques for focused health assessments. This course focuses on the practical application of physical examination skills through clinical scenarios, hands-on skills labs, and real-world patient encounters. Students will refine their diagnostic abilities and gain proficiency in performing a wide range of clinical procedures and interventions relevant to PA practice. Emphasis will be placed on clinical reasoning, patient-centered care, and interprofessional collaboration to improve patient outcomes. Throughout this course, students will develop advanced clinical skills, improve their ability to assess and diagnose a wide variety of conditions, and gain hands-on experience in performing essential procedures. By integrating theory with practice, students will be prepared for the dynamic demands of clinical practice, ensuring they are equipped to deliver high-quality, patient-centered care.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 523 Clinical Medicine I (5 credits)

This graduate-level course is designed to provide physician assistant students with a comprehensive understanding of the clinical evaluation, diagnosis, and management of common and complex medical conditions across a range of specialty areas. This course emphasizes evidence-based practices, clinical decision-making, and the integration of foundational knowledge into real-world clinical scenarios. Through a series of in-depth modules, students will enhance their diagnostic and therapeutic skills, preparing them for effective patient care in a variety of clinical settings. Through these modules, students will learn to integrate clinical knowledge with hands-on skills, enabling them to evaluate, diagnose, and manage patients with a range of medical conditions. With a focus on both common and complex presentations, this course prepares students to navigate the dynamic and evolving challenges of clinical practice, ensuring they are well-equipped to provide comprehensive and patient-centered care.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 525 Diagnostics I (2 credits)

This graduate-level course is designed to provide physician assistant students with a comprehensive understanding of diagnostic methods used in various medical specialties. Through a series of modules, students will develop the skills to assess, interpret, and apply diagnostic tests and technologies in the clinical setting. This course prepares students to approach patients with a structured, evidence-based mindset, utilizing laboratory results, imaging studies, and clinical findings to form a comprehensive patient care plan. Upon completion of the course, students will be equipped with the skills to accurately interpret a broad range of diagnostic tests across multiple specialties. They will be able to apply their knowledge in clinical settings, leading to improved patient care through efficient diagnostic decision-making.

Prerequisites: PHA 501 and PHA 502 and PHA 505 and PHA 503 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 528 Pharmacological Therapy I (3 credits)

This graduate-level course for physician assistant students offers an advanced study of the pharmacological agents and therapeutic strategies used to manage a wide array of clinical conditions. This course provides a thorough understanding of drug mechanisms, pharmacokinetics, pharmacodynamics, and clinical applications across various organ systems. By focusing on the latest evidence-based pharmacotherapeutic approaches, students will develop the knowledge and skills necessary to make informed decisions when prescribing and administering medications for diverse patient populations. Emphasis is placed on integrating pharmacology with clinical practice to optimize patient outcomes, minimize risks, and enhance therapeutic effectiveness. Throughout this course, students will gain an in-depth understanding of the pharmacologic agents and therapeutic strategies used in the management of common conditions across multiple organ systems. The course will integrate pharmacological knowledge with clinical application, providing students with the tools necessary to make informed, patient-centered decisions and improve clinical outcomes through optimal medication management.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 529 Clinical Research & Evidence (1 credit)

This graduate-level course is designed to provide physician assistant students with a deep understanding of the principles and methodologies essential for conducting and applying research in clinical practice. This course integrates key concepts of research design, statistical analysis, ethical considerations, and evidence-based medicine, preparing students to critically evaluate scientific literature and apply findings to improve patient care. Students will gain the skills necessary to design, conduct, and assess clinical research studies, while fostering an understanding of the scientific method and its practical application in healthcare. Upon completion of the course, students will be proficient in the scientific methods of research design, data analysis, and critical evaluation of evidence. They will be prepared to contribute to the body of medical knowledge through rigorous research and to apply evidence-based practices in their clinical work to improve patient outcomes.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 541 Clinical Medicine II (5 credits)

This graduate-level course is designed to provide physician assistant students with advanced knowledge and clinical skills necessary for the diagnosis, management, and treatment of common and complex conditions in various specialties. Through a comprehensive exploration of gastroenterology, nephrology, orthopedics & rheumatology, endocrinology, neurology, and psychiatry, students will develop a deep understanding of pathophysiology, clinical evaluation, and evidence-based management strategies. This course aims to prepare students for hands-on clinical practice by integrating theoretical knowledge with practical skills to manage diverse patient populations across multiple clinical settings. Upon completion of the course, students will possess a comprehensive understanding of the pathophysiology, diagnostic approaches, and treatment strategies for a wide range of medical conditions across the specialties of gastroenterology, nephrology, orthopedics & rheumatology, endocrinology, neurology, and psychiatry. Students will be prepared to manage both acute and chronic conditions, interpret diagnostic tests, and provide evidence-based care. Through hands-on clinical practice and problem-solving, students will be ready to deliver high-quality patient care in diverse healthcare settings, demonstrating proficiency in medical decision-making and multidisciplinary collaboration.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 542 Diagnostics II (2 credits)

This graduate-level course is designed to equip physician assistant students with advanced knowledge and practical skills in diagnostic medicine, focusing on laboratory tests, imaging modalities, and other diagnostic tools used in clinical practice. This course will enable students to understand the purpose, procedure, interpretation, and clinical relevance of a wide range of diagnostic tests used in patient evaluation. With an emphasis on critical thinking and evidence-based decision-making, students will gain expertise in interpreting complex diagnostic results, tailoring patient care, and managing diverse medical conditions. The course will also address the unique considerations for different patient populations and specialized diagnostic techniques across various medical fields. Upon completion of the course, students will have a comprehensive understanding of advanced diagnostic tools and laboratory tests used to evaluate a wide range of medical conditions. Students will be prepared to integrate these diagnostic techniques into clinical practice, interpret complex results accurately, and develop targeted treatment strategies. The course emphasizes patient-centered care, ensuring that students are well-equipped to handle the diverse needs of patients in various clinical settings, from routine assessments to critical diagnostics.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 543 Research Design & Methods (1 credit)

This graduate-level course is designed to equip physician assistant students with the essential skills to design, implement, and critically assess research studies, with a specific focus on literature reviews and randomized controlled trials (RCTs). Through practical exercises and collaborative learning, students will gain hands-on experience in developing a structured approach to literature review projects, designing methodology, and applying research findings to clinical practice. This course emphasizes critical thinking, evidence-based practices, and teamwork to evaluate high-quality research and contribute to the advancement of medical knowledge. Upon completion of the course, students will be proficient in designing and writing the introduction and methodology sections of a rapid literature review. They will also have developed the critical skills necessary to evaluate and interpret randomized controlled trials, applying these findings to clinical settings. Through teamwork and practical experience, students will gain the necessary tools to contribute effectively to clinical research and evidence-based medicine.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 544 Pediatrics (2 credits)

This graduate-level course is designed to provide physician assistant students with comprehensive knowledge and clinical skills necessary to assess, diagnose, and manage common and complex pediatric conditions across various specialties. This course covers a wide range of topics, from the care of newborns and preterm infants to managing adolescent health, and includes both preventive and therapeutic approaches to pediatric care. Through a combination of didactic learning and hands-on clinical experiences, including objective structured clinical examinations (OSCE) and clinical reasoning conferences (CRC), students will develop the skills required to provide compassionate, evidence-based care to pediatric patients. Upon completing the course, students will be proficient in evaluating, diagnosing, and managing a wide array of pediatric conditions across different specialties. They will gain experience in preventive care, diagnostic reasoning, and therapeutic interventions. Through both individual learning and collaborative experiences, students will be prepared to provide high-quality, evidence-based care for pediatric patients in diverse clinical settings.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 545 Emergency Medicine (3 credits)

This graduate-level course is designed to equip physician assistant students with the foundational knowledge and hands-on clinical skills required for effective emergency care. This course covers the urgent assessment and management of a broad range of acute conditions commonly encountered in emergency settings, including trauma, environmental emergencies, toxicology, and pediatric crises. Emphasizing practical application through clinical reasoning conferences (CRC), simulation cases, and advanced life support protocols, students will develop the expertise to handle life-threatening situations and deliver high-quality care in fast-paced, high-pressure environments. Upon completion of the course, students will be equipped with the essential knowledge and skills required to excel in emergency medicine. Students will be prepared to assess, diagnose, and manage a wide range of acute and life-threatening conditions, applying evidence-based practices in high-pressure environments. The combination of didactic learning, clinical reasoning conferences, and simulation cases will provide a comprehensive foundation for effective practice in emergency settings.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 546 Surgery (2 credits)

This graduate-level course provides physician assistant students with the foundational knowledge and clinical skills necessary to assist in the management of surgical patients throughout the perioperative period. This course covers a broad range of surgical specialties and prepares students for the assessment, surgical intervention, and postoperative care of patients. Through a combination of didactic instruction, clinical reasoning, and hands-on laboratory experiences, students will learn to apply evidence-based practices in the care of surgical patients, focusing on preoperative assessment, surgical technique, anesthesia, and postoperative recovery. Emphasis is placed on patient safety, teamwork, and clinical decision-making in both elective and emergent surgical settings. Upon completion of the course, students will be proficient in managing the care of surgical patients across a variety of specialties. They will be skilled in preoperative and postoperative care, able to assist with procedures in the operating room, and prepared to recognize and manage complications. Through comprehensive didactic and practical training, students will gain the expertise needed to function effectively as physician assistants in surgical practice, ensuring optimal patient outcomes in a variety of surgical settings.

Prerequisites: PHA 521 and PHA 522 and PHA 523 and PHA 524 and PHA 525 and PHA 526

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 547 Women's Health (2 credits)

This graduate-level course provides physician assistant students with an in-depth understanding of the medical care and treatment of female patients across the lifespan. This course focuses on the physiological, pathological, and clinical aspects of women's health, emphasizing preventive care, reproductive health, and the management of common and complex conditions unique to women. Through lectures, case studies, and hands-on clinical practice, students will develop the skills necessary to provide comprehensive care in a variety of settings, from primary care to specialty women's health services. Throughout the course, students will gain a thorough understanding of the complex medical issues affecting women's health. By integrating clinical knowledge with hands-on skills, this course ensures that students are prepared to provide comprehensive, evidence-based care that addresses the unique needs of female patients at all stages of life.

Prerequisites: PHA 501 and PHA 502 and PHA 503 and PHA 505 and PHA 508 and PHA 509

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 548 Pharmacological Therapy II (3 credits)

This graduate-level course provides advanced education on pharmacologic management and therapeutic approaches to diseases commonly encountered in various medical specialties. Building upon foundational pharmacology knowledge, this course delves into specific pharmacotherapeutic strategies for treating conditions in gastroenterology, nephrology, orthopedics & rheumatology, endocrinology, neurology, psychiatry, and addiction medicine. Emphasis is placed on understanding drug mechanisms, indications, contraindications, side effects, drug interactions, and patient-specific factors affecting pharmacotherapy. Students will gain the expertise needed to optimize pharmacological treatments, providing safe, effective, and personalized care for patients. Upon completion of the course, students will be equipped with an in-depth understanding of pharmacological treatments across a range of medical disciplines. They will be able to apply evidence-based pharmacotherapeutics to individual patient cases, considering clinical guidelines, patient history, and drug interactions. Students will be prepared to make informed decisions about pharmacological treatments, ensuring safety, efficacy, and personalized care for patients across diverse therapeutic areas.

Prerequisites: PHA 522 and PHA 523 and PHA 525 and PHA 528 and PHA 529 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 601 Professional Practice I (1 credit)

This graduate-level course provides physician assistant students with an in-depth understanding of the legal, ethical, and regulatory frameworks that guide professional practice in healthcare. This course emphasizes the knowledge required to navigate the complex healthcare landscape, including laws and regulations related to patient care, decision-making, professional conduct, and advocacy. By integrating policy discussions and practical case scenarios, students will develop a comprehensive understanding of the legal responsibilities and ethical considerations essential for effective and responsible clinical practice. Throughout this course, students will gain essential knowledge regarding the intersection of law, policy, and healthcare practice. By addressing real-world scenarios and exploring case studies, students will develop the critical thinking skills needed to navigate professional practice issues, ensuring they are equipped to provide safe, ethical, and effective care while remaining compliant with applicable laws and regulations.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547 and PHA 548

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 602 Geriatrics I (1 credit)

This graduate-level course is designed to provide physician assistant students with an in-depth understanding of the unique medical, diagnostic, and therapeutic considerations in the care of elderly patients. This course covers essential topics in geriatric medicine, including normal and abnormal aging processes, complex differential diagnoses, preventive medicine, and palliative care. Through a series of modules, students will gain skills in comprehensive patient evaluation, effective management of acute and chronic conditions, and improved communication with geriatric patients and their families. Special attention is given to polypharmacy, patient safety, and evidence-based decision-making, ensuring students are prepared to deliver high-quality care to this growing patient population. Upon completion of the course, students will be equipped to manage the complex and often multifactorial health issues of elderly patients. They will be able to apply evidence-based practices in assessing, diagnosing, and treating geriatric patients, with a strong understanding of patient safety, polypharmacy, preventive medicine, and palliative care. Furthermore, students will be prepared to communicate effectively with elderly patients and their families, ensuring a patient-centered approach to care.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547 and PHA 548

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 603 Professional Practice II (1 credit)

This graduate-level course is designed to provide physician assistant students with an in-depth exploration of the administrative, ethical, and legal aspects of professional practice. This course covers essential topics related to healthcare delivery systems, insurance models, medical coding and billing, palliative care, and professional development. Students will develop the knowledge and skills necessary for effective practice within the healthcare system, including navigating regulatory requirements, engaging in end-of-life care, and preparing for successful careers as physician assistants. Upon completion of the course, students will be equipped with a comprehensive understanding of the administrative, legal, and ethical dimensions of healthcare. They will be prepared to navigate complex healthcare delivery systems, insurance models, and billing practices. Additionally, students will have a strong foundation in professional development, including communication skills, licensure maintenance, and career planning, allowing them to thrive in the dynamic and evolving field of physician assistant practice.

Prerequisites: PHA 601 and PHA 602

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 604 Capstone (2 credits)

This graduate-level course is the culminating experience of the Physician Assistant Program, designed to integrate and apply the knowledge and clinical skills acquired throughout the curriculum. This course prepares students for the Physician Assistant National Certifying Examination (PANCE) while further developing their professional skills and clinical competence. Students will participate in comprehensive review sessions, practice summative clinical evaluations, and complete a Capstone Project that emphasizes research, evidence-based practice, and professional presentation. Through structured activities such as objective structured clinical examinations (OSCEs), clinical skills evaluations, and a rapid literature review project, students will refine their abilities in patient care, clinical decision-making, and scholarly communication. The course culminates in a professional practice examination, ensuring students are ready for both the PANCE and their future roles as practicing physician assistants. Upon successful completion of the course, students will be well-prepared for the PANCE and the transition to clinical practice. They will have demonstrated proficiency in their clinical skills, critical thinking, research, and professional communication. The Capstone Project and summative evaluations will ensure that students are equipped with the knowledge, skills, and confidence to excel in both their certification examination and their future careers as physician assistants.

Prerequisites: PHA 603 and PHA 605

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 605 Geriatrics II (1 credit)

This graduate-level course builds on foundational knowledge in geriatric care, focusing on the complexities of managing acute and chronic conditions in elderly patients across various care settings. The course explores the multifaceted aspects of geriatric medicine, including the management of acute illnesses, the challenges of long-term care, pain management, preventive strategies, and social issues that affect the elderly population. Through didactic lectures, case studies, and clinical reasoning exercises, students will gain a deeper understanding of the unique physiological, psychological, and social needs of geriatric patients. The course emphasizes the importance of multidisciplinary approaches in providing holistic, patient-centered care that addresses both medical and non-medical factors influencing health outcomes. Upon completion of the course, students will be equipped to assess, manage, and treat a wide variety of acute and chronic conditions in the geriatric population. They will be able to apply advanced clinical reasoning to complex cases, address the psychosocial and ethical challenges of aging, and implement preventive strategies aimed at improving the health and well-being of elderly patients across various care settings. Students will be prepared to provide compassionate, comprehensive care tailored to the unique needs of the geriatric population.

Prerequisites: PHA 601 and PHA 602

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 606 Professional Practice III (1 credit)

This graduate-level course explores the essential principles and challenges in the evolving landscape of healthcare. This course addresses clinical ethics, healthcare disparities, social determinants of health, and patient wellness, as well as professional conduct in the practice of medicine. Students will examine the complex ethical issues faced in clinical practice and develop strategies for navigating challenging patient encounters. The course also emphasizes the impact of social and cultural factors on healthcare delivery, including access to care, special patient considerations, and cultural competence in working with diverse populations. Furthermore, the course integrates critical discussions on quality assurance, risk management, and the maintenance of public health. Through interactive lectures, case studies, and practical applications, students will gain the skills needed to advocate for patients, provide high-quality care, and address systemic challenges in healthcare. Upon completion of the course, students will be equipped with the skills to navigate complex ethical and cultural issues in clinical practice, advocate for vulnerable populations, and address disparities in healthcare delivery. They will also develop a deep understanding of the role of public health, patient safety, and quality improvement in their professional practice, preparing them for a successful career as competent, compassionate, and ethical physician assistants.

Prerequisites: PHA 603 and PHA 605

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 651 Family Medicine Rotation I (5 credits)

This course is the first of two 5-week rotations in an outpatient setting at a family medicine office. The goal of this rotation is to educate the PA student in the diagnosis, management and treatment of both preventative, acute, and chronic illness for the patient in the primary care setting. Experience is provided at the level of a primary care PA and will include becoming familiar with the primary care provider's role in overall patient health, prevention of disease and screenings, health and wellness counseling, and coordination of care within the healthcare system for all patients across the lifespan to include adolescents, adults, and the elderly.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 652 Family Medicine Rotation II (5 credits)

This course is the second of two 5-week rotations in an outpatient setting at a family medicine office. The goal of this rotation is to educate the PA student in the diagnosis, management and treatment of both preventative, emergent, acute, and chronic illness for the patient in the primary care setting. Experience is provided at the level of a primary care PA and will include becoming familiar with the primary care provider's role in overall patient health, prevention of disease and screenings, health and wellness counseling, and coordination of care within the health-care system for all patients across the lifespan to include adolescents, adults, and the elderly.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 653 Internal Med Clinical Rotation (5 credits)

This 5-week rotation provides the PA student with the practical experience to develop their clinical reasoning skills in the management of preventative, emergent, acute, and chronic medicine in adults and elderly patients in an in-patient setting. Students will gain the skills necessary to interpret and integrate information obtained through the comprehensive history and physical examination, and laboratory and other diagnostics, to formulate differential diagnoses; to develop effective treatment plans; and to provide patient management and counseling throughout the hospital course of treatment. In addition, the students will learn the indications, limitations, and methodology of inpatient diagnostic procedures and therapeutic regimes common to internal medicine. Students are expected to see both adults and elderly adults, in an in-patient or out-patient setting during this rotation.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 654 Pediatrics Clinical Rotation (5 credits)

This five-week rotation provides the PA student with clinical experience in diagnosis, evaluation and management of infants, children, and adolescent patients, in an out-patient setting. Emphasis is placed on the recognition of normal as well as abnormal findings, diagnosis and management of common acute, emergent, and chronic childhood illnesses, assessment of developmental milestones, and preventative medicine such as immunizations and well-child care from birth through adolescence. Students should also gain familiarity with the clinical skills necessary to manage behavioral and mental health conditions in the pediatric population. Students should also focus on communication with parents, particularly with anticipatory guidance, preventive medicine, counseling, and communicating the management plan.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 655 Women's Health Rotation (5 credits)

This 5-week rotation provides the PA student with practical clinical experience in diagnosis, evaluation, and management of normal and abnormal conditions in women's health, including prenatal and gynecological care. In addition, students will learn to provide pre-natal, peri-partum and postpartum care, family planning, preventative medicine, health education, and counseling in the out-patient setting. Students will learn to provide care for women presenting with emergent, acute, and chronic gynecological and obstetrical conditions, including those conditions surrounding prenatal care.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 656 Behav/Mental Health Rotation (5 credits)

This 5-week rotation provides the PA student with practical clinical experience in diagnosis, evaluation, and management of psychiatric, behavioral, and mental health conditions and disorders in an outpatient setting. The student will be provided with practical clinical experience in the identification, evaluation, management, and referral of patients presenting with emergent, acute, and chronic psychiatric, behavioral, and mental health conditions. Students will engage with their patients by providing preventative medicine, including health counseling. Students will learn to recognize and treat behavioral and mental health disorders, throughout the lifespan (specifically: adolescent, adult, and elderly) patients.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 657 Surgery Rotation (5 credits)

This 5-week rotation provides the PA student with practical clinical experience in diagnosis, evaluation, and management of pre-operative, operative, and post-operative adult surgical patients. Students participate in the medical and surgical management of surgical inpatients during the pre-operative phase, intra-operative phase in the operating room, and post-operative phase while the patient remains admitted as an inpatient. Students are to gain practical clinical experience with surgical patients experiencing emergent, acute, and chronic surgical conditions. Students will engage with their patients by providing preventative medicine guidance, including health counseling in the preoperative and postoperative phases.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 658 Emergency Medicine Rotation (5 credits)

This 5-week rotation provides the Physician Assistant student with practical clinical experience working in an Emergency Department setting. This enables the student to develop focused and systematic approaches to the diagnosis and treatment of common medical and surgical emergencies. This rotation teaches the student to recognize the acuity level of presenting patients by prioritizing care and management in collaboration with their emergency medicine preceptor and the interprofessional emergency department team. Students will develop the necessary skills when considering the social and/or physical determinants of health, and other patient safety considerations when determining patient dispositions and treatment plans. Students will recognize the indications, limitations, and methodology of emergency room diagnostic procedures and therapeutic regimens. In addition, this rotation provides students with the opportunity to formulate organized and complete emergency room care for patients of all ages (child, adolescent, adult, and elderly) with a host of conditions presenting as acute, emergent, or chronic. Students will engage with their patients by providing preventative medicine guidance, including health counseling for patients presenting to the emergency department for care.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

PHA 660 Elective Rotation (5 credits)

This five-week rotation provides the PA student with practical clinical experience by working in a medical setting of their choice. This enables the student to develop a focused and systematic approach to the diagnosis and treatment of common medical issues in that specialty. In addition, this rotation provides students with the opportunity to formulate organized and complete medical records, problem lists, and management plans. Each student will research and present a medically interesting case that they were directly involved in, via the evaluation and management of the patient.

Prerequisites: PHA 541 and PHA 542 and PHA 543 and PHA 544 and PHA 545 and PHA 546 and PHA 547

Restrictions: Enrollment is limited to students with a major in Physician Assistant Studies.

Attributes: Graduate

Physics (PHY)

PHY 100 Physics Orientation (1 credit)

In this orientation course students are presented with an overview of all aspects of physics, including current topics, career opportunities in the field, academic standards, and integrity, as well as general information about the University and services that help students achieve academic success.

Attributes: Undergraduate

PHY 101 General Physics I (3 credits)

This two-semester sequence is an algebra-based physics course intended primarily for students majoring in biological and health sciences. Emphasis is on understanding fundamental principles and applying them to the analysis of physical phenomena, with several applications that arise in biology. Topics include classical kinematics and dynamics, fluids, waves, optics, electricity and magnetism and optics.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

PHY 101L General Physics Laboratory I (1 credit)

A two-semester laboratory sequence to accompany PHY 101-102.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 102 General Physics II (3 credits)

This two-semester sequence is an algebra-based physics course intended primarily for students majoring in biological and health sciences. Emphasis is on understanding fundamental principles and applying them to the analysis of physical phenomena, with several applications that arise in biology. Topics include classical kinematics and dynamics, fluids, waves, optics, electricity and magnetism and optics.

Prerequisites: PHY 101

Attributes: GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

PHY 102L General Physics Laboratory II (1 credit)

A two-semester laboratory sequence to accompany PHY 101-102.

Attributes: Undergraduate

PHY 105 University Physics I (3 credits)

This two-semester sequence is a calculus-based physics course intended primarily for students majoring in physics, chemistry, mathematics, or computer science. Emphasis is on developing both qualitative and quantitative understanding of fundamental physical principles, and the ability to apply those principles to analyze physical phenomena. Topics include classical kinematics and dynamics, electricity and magnetism, waves, and optics.

Prerequisites: MAT 161 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Actuarial Science, Chemistry, Computer Science, Mathematics, Mathematics - Secondary Educat or Physics.

Attributes: CCC: Natural Science, GEP: Natural Science, GEP: Science Course w/Lab, Undergraduate

PHY 105L University Physics Lab I (1 credit)

A two-semester laboratory sequence to accompany PHY 105-106.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 106 University Physics II (3 credits)

This two-semester sequence is a calculus-based physics course intended primarily for students majoring in physics, chemistry, mathematics, or computer science. Emphasis is on developing both qualitative and quantitative understanding of fundamental physical principles, and the ability to apply those principles to analyze physical phenomena. Topics include classical kinematics and dynamics, electricity and magnetism, waves, and optics.

Prerequisites: PHY 105

Attributes: GEP. Natural Science, GEP. Science Course w/Lab, Undergraduate

PHY 106L University Physics Lab II (1 credit)

A two-semester laboratory sequence to accompany PHY 105-106.

Attributes: Undergraduate

PHY 110 Understanding Natural World (3 credits)

This course offers the non-science major an opportunity to explore how physics impacts everyday life. Topics will vary depending upon the interests of the class, but may include: the physics of sports, why musical instruments sound different from each other, rainbows and other optical phenomena, the physics of toys, Einstein's theory of relativity, and how a laser works. Although mathematics will not be the focus of the course, a working knowledge of algebra, geometry, and simple trigonometry is necessary. Emphasis is placed on developing critical thinking and scientific observation skills.

Restrictions: Students cannot enroll who have a major in Biology, Chemistry, Chemical Biology, Environmental Science or Physics.

Attributes: GEP. Natural Science, Undergraduate

PHY 111 The Astronomical Universe (3 credits)

In this course designed for the non-science major, the student is introduced to modern astronomical knowledge and theories. The planets, stars, and galaxies are investigated. Space exploration is discussed. Minimal mathematics is used and no previous science is required.

Restrictions: Students cannot enroll who have a major in Biology, Chemistry, Chemical Biology, Environmental Science or Physics.

Attributes: GEP. Natural Science

PHY 112 Energy: Problems & Promises (3 credits)

The goal of this course is to teach the student how to read, analyze, and intelligently comment on news articles about energy and the environment. The physics is straightforward and requires no more than basic business mathematics. Topics include: fossil fuels, large scale renewables, small scale renewables, nuclear power, megawatt accounting for conservation, transportation, and emissions control. The course emphasizes how real data shapes economics and policy, so the exact content will vary with current events.

Restrictions: Students cannot enroll who have a major in Biology, Chemistry, Chemical Biology, Environmental Science or Physics.

Attributes: GEP. Natural Science, Undergraduate

PHY 113 Physics by Experiment (4 credits)

In this course, students build up the basic principles of geometrical optics, electricity, thermodynamics, and/or classical mechanics by carrying out guided experiments and interpreting their results. Mathematics, at the level of geometry and simple algebra, is introduced when and as it is needed.

Attributes: CCC: Natural Science, GEP. Natural Science, GEP. Science Course w/Lab, Undergraduate

PHY 114 Tech Breakthroughs of 20th Cen (3 credits)

This course will explore a smorgasbord of major technological advances that occurred during the 20th century. Many of these developments occurred as a result of the historical, political, and economic factors that shaped much of the landscape of the previous century. The scientific achievements will be discussed in the historical context upon which they occurred paying particular emphasis on the interesting personalities that were responsible for many of the discoveries.

Attributes: GEP. Natural Science

PHY 115 Investigations in Astronomy (4 credits)

This course, designed for the non-science major, provides an introduction to the science of astronomy. Topics include the roles of observation, theory, philosophy, and technology in the development of the modern conception of the Universe. The Copernican Revolution, the birth and death of stars, our Milky Way galaxy, time, and our ancestral heritage in the cosmos will be discussed and explored. No previous science, nor mathematics beyond the level of high school algebra, is required.

Restrictions: Students cannot enroll who have a major in Biology, Chemistry, Chemical Biology, Environmental Science or Physics.

Attributes: CCC: Natural Science, GEP. Natural Science, GEP. Science Course w/Lab, Undergraduate

PHY 115L Investigations in Astro Lab (0 credits)

A laboratory course to accompany PHY 115.

Attributes: CCC: Natural Science, GEP. Natural Science, Undergraduate

PHY 121 Physics for Pharmacy (3 credits)

Algebra-based general physics course introducing principles of mechanics, electricity, magnetism, and fluids with applications to health sciences. The course includes lecture plus an experiential component.

Restrictions: Enrollment is limited to students with a major in Pharma Healthcare Studies.

Attributes: Undergraduate

PHY 150 First Year Seminar (3 credits)

First year seminar course in Physics.

Attributes: First-Year Seminar, Undergraduate

PHY 170 Special Topics in Physics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHY 200 Survey of Physics (3 credits)

Covers the basic concepts in physics, including biological and medical applications of pressures and fluids, bioelectricity, biodynamics, and kinesiology.

Prerequisites: (MAT 120 (may be taken concurrently) or MA 107) or (MAT 155 (may be taken concurrently) or MA 110) or (MAT 161 (may be taken concurrently) or MA 122)

Attributes: CCC: Natural Science, Undergraduate

PHY 200L Survey of Physics Laboratory (1 credit)

A laboratory course to accompany PHY 200.

Attributes: CCC: Natural Science, Undergraduate

PHY 201 Introductory Physics I (3 credits)

Algebra- and trigonometry-based general physics course covering principles of mechanics and heat with applications to the health sciences. First course in a two-semester course sequence. This course is not interchangeable with one-semester physics courses such as PHY 200.

Prerequisites: (MAT 120 (may be taken concurrently) or MA 107) or (MAT 155 (may be taken concurrently) or MA 110) or (MAT 161 (may be taken concurrently) or MA 122)

Attributes: Undergraduate

PHY 201L Intro. Physics I Laboratory (1 credit)

A laboratory course to accompany PHY 201.

Attributes: Undergraduate

PHY 202 Introductory Physics II (3 credits)

Algebra- and trigonometry-based general physics course covering principles of wave motion, electricity and magnetism, optics, and modern physics with applications to the health sciences. Second course in a two-semester course sequence. This course is not interchangeable with one-semester physics courses such as PHY 200.

Prerequisites: PHY 201 or PHY 101

Attributes: Undergraduate

PHY 202L Intro. Physics II Laboratory (1 credit)

A laboratory course to accompany PHY 202.

Attributes: Undergraduate

PHY 211 Physics I (3 credits)

First semester of a three-semester, calculus-based general physics course sequence. It covers principles of mechanics and heat with applications to the health sciences. The course may involve the use of physics web resources, computer-controlled laboratory experiments, and spreadsheets for data analysis.

Prerequisites: (MAT 161 (may be taken concurrently) or MA 122 (may be taken concurrently))

Attributes: Undergraduate

PHY 211L Physics I Laboratory (1 credit)

A laboratory course to accompany PHY 211.

Attributes: Undergraduate

PHY 212 Physics II (3 credits)

Second semester of a three-semester, calculus-based general physics course sequence. It covers principles of waves, electricity, magnetism, optics, and modern physics with applications. The course may involve the use of physics web resources, computer-controlled laboratory experiments, and spreadsheets for data analysis. This course meets the PHY 202 prerequisite for all physics elective courses where applicable.

Prerequisites: PHY 211 or PHY 105

Attributes: Undergraduate

PHY 212L Physics II Laboratory (1 credit)

A laboratory course to accompany PHY 212.

Attributes: Undergraduate

PHY 213 Physics III (3 credits)

Third semester of a three-semester, calculus-based general physics course sequence. It is an introduction to the physics of waves, geometrical optics, fluids, and classical thermodynamics. The course may involve the use of physics web resources.

Prerequisites: (PHY 212 or PHY 106) and (PHY 202 or PHY 102) and (MAT 162 or MA 221)

Attributes: Undergraduate

PHY 213L Intro. Physics III Laboratory (1 credit)

A laboratory course to accompany PHY 213.

Prerequisites: PHY 212 and PHY 212L

Attributes: Undergraduate

PHY 221 Intro to Renewable Energy (3 credits)

This course provides an introduction to Renewable Energy: the scientific principles behind different approaches (solar, wind, hydropower, nuclear, biomass, geothermal, etc.), advantages and disadvantages of these approaches, and the different technological and socio-economic barriers to implementation. The course will also discuss energy storage, carbon capture, sequestration and utilization, climate change, renewable energy policy and economics of the carbon marketplace, and environmental justice. After taking the course, students will be literate with terminology associated with renewable energy approaches, climate change, sustainability, energy auditing, energy storage and energy microgrids. The class will employ a mixture of assigned readings, class discussions, and presentation of case studies in poster sessions. The class will have a required experiential/laboratory component, PHY 221L.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 221L Intro to Renewable Energy Lab (1 credit)

This three-hour lab period provides an experiential course component for PHY 221 that includes (a) laboratory experiments where students perform practical, project-builds of energy-powered devices (solar spinners, solar cells, turbines) and hands-on energy measurements on solar cells, solar circuits, wind turbines, and measure gas production in biomass processes; (b) participate in energy-themed seminars and symposia; and when possible, (c) field trip to a laboratory that studies renewable energy, a renewable energy facility such as a solar farm or infrastructure that harnesses renewable or related energy.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 235 Views of the Cosmos (3 credits)

This course offers an introduction to the study of the universe from scientific, religious, philosophical, and literary standpoints. The course content surveys humankind's efforts to understand the nature of the cosmos, including its origins, evolution, and eventual demise. The viewpoints of many religious groups, cultures, and scientific thinkers will be discussed and compared; moreover, the impact of these perspectives on the history of art and literature—from classical mythology to contemporary science fiction—will be analyzed. Contemporary debates in cosmology will be fully explored without mathematics, and students will demonstrate skills in scientific literacy and communication as they explore and represent the corollaries of these discoveries and controversies. Using techniques in formal literary analysis, students will also critique the ways in which works of literature have striven to represent the "universe" or the "cosmos," often in ways that reflect historical and cultural attitudes regarding the limits of spiritual, empirical, or scientific reality; likewise, students will consider how such works envision the position, importance, or rights of the human within these contexts.

Attributes: CCC: Literature, CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 235L Views of the Cosmos Laboratory (1 credit)

A laboratory course to accompany PHY 235.

Attributes: CCC: Natural Science, GEP: Natural Science, Undergraduate

PHY 251 Modern Physics I (3 credits)

An analytical survey of the experiments, theories, and principles that led to the modern view of physical reality. Topics include: an introduction to special relativity theory, the dual nature of waves and particles, uncertainty relations, Bohr theory of hydrogen, fundamental aspects of quantum mechanics, the quantum theory of the hydrogen atom, and, if time permits, many-electron atoms.

Prerequisites: PHY 106

Attributes: Undergraduate

PHY 252 Modern Physics II (4 credits)

An extension of PHY 251 to include specific applications of the quantum theory. Topics include: structure and spectra of many-electron atoms and molecules, classical and quantum statistics, theory of solids, nuclear structure and dynamics, and an introduction to elementary particles.

Prerequisites: PHY 251

Attributes: Undergraduate

PHY 253 Survey of Nanotechnology (3 credits)

Nanotechnology embraces the disciplines of applied physics, materials science, supramolecular chemistry, and biological engineering to name a few. An overview of this highly interdisciplinary field will be given with a focus on the role of physics principles that guides this technology and on the new and exotic materials used.

Prerequisites: PHY 106

Attributes: Undergraduate

PHY 257 Math Methods in Physics (3 credits)

Advanced mathematical methods for physics: includes linear vector spaces, orthogonal functions, partial differential equations, complex variables, and transform techniques. Emphasis is on application of these mathematical techniques in solving problems in physics.

Prerequisites: PHY 106 or PY 212

Attributes: Undergraduate

PHY 270 Special Topics in Physics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHY 282 Modeling, Simulation & Design (4 credits)

This course introduces students to fundamental concepts of mechanical design, solid modeling, and prototype development. Topics to be covered will include industrial design principles, orthographic projections, and assemblies. Students will engage in designing, simulating, and manufacturing mechanical components.

Prerequisites: PHY 105 and MAT 161

Attributes: Undergraduate

PHY 301 Classical Mechanics (3 credits)

Newtonian particle dynamics is presented with special emphasis on damped and forced simple harmonic motion and central-force motion. Generalized coordinates are introduced, and both Lagrange's formulation and Hamilton's formulation of classical mechanics are developed.

Prerequisites: PHY 106

Attributes: Undergraduate

PHY 303 Thermal Physics (3 credits)

The laws of thermodynamics are introduced and studied in the classical manner and the statistical mechanical foundations of thermodynamics are developed, including quantum statistics.

Prerequisites: PHY 251

Attributes: Undergraduate

PHY 305 Intro to Invention and Patents (1 credit)

This short course is designed to expose engineering physics and physics students to the process of patenting inventions, patents' requirements and laws.

Attributes: Undergraduate

PHY 307 Electricity and Magnetism (3 credits)

The classical (non-quantum) theory of electric and magnetic fields and charge interactions is presented. The appropriate tools of vector analysis are developed as they are needed. The Maxwell equations in both differential and integral form are introduced.

Prerequisites: PHY 106 and PHY 257

Attributes: Undergraduate

PHY 308 Waves and Optics (3 credits)

The study of electromagnetic waves and their associated boundary-value problems. Other topics include a brief analysis of geometrical optics, and detailed study of interference, diffraction, and polarization phenomena associated with electromagnetic waves.

Prerequisites: PHY 106 and PHY 257

Attributes: Undergraduate

PHY 311 Experimental Methods of Phy I (3 credits)

Laboratory intensive with some lecture. Provides the theory of operation and laboratory experiences for both analog and digital circuitry. Emphasis placed on written and oral communication skills and team work.

Prerequisites: (PHY 106 or PY 212) and (PHY 106L or PY 212L)

Attributes: Undergraduate

PHY 312 Experimental Methods in Phy II (3 credits)

Laboratory intensive. Focus on modern physics experiments.

Prerequisites: PHY 106 and PHY 106L

Attributes: Undergraduate

PHY 313 Comp Methods for Sci and Eng (3 credits)

The goal of the course is to prepare students for success in applying the power of computers to the solution of physics, science and engineering problems. In this course students learn a wide variety of practical computational techniques including curve fitting, approximations of derivatives and integrals, root finding, and many more. Students have the opportunity to study computational theory and algorithms, and their applications to modeling, data analysis, data science, AI, and machine learning. In addition, they gain experience utilizing important computational software tools that are used in academic and industrial settings, such as Mathematica and MATLAB. Modern computational approaches, including Python numpy/scipy libraries and Jupyter notebooks, will be utilized to develop a strong foundation in computational methods in physics, science and engineering.

Prerequisites: PHY 106 and MAT 213

Attributes: Undergraduate

PHY 315 Einstein, Bohr, & Modern Phys (3 credits)

An examination of the lives and achievements of the great physicists of the first half of the twentieth century, including Albert Einstein, Niels Bohr, Werner Heisenberg, Wolfgang Pauli, and others, as they developed the basis of special relativity, general relativity, quantum physics, and nuclear physics. Considers the personal and philosophical dilemmas they faced, through an analysis of historical source materials such as letters, papers, and interview transcripts, and delves into the cultural impact of their work.

Prerequisites: PHY 200 or PHY 202 or PHY 212 or PHY 102 or PHY 106

Attributes: Undergraduate

PHY 321 Quantum Mechanics I (3 credits)

The Schrodinger formulation of quantum theory is developed with its constructs of wave packets, differential operators, and eigenvalue equations. Special emphasis is given to the quantum theory of measurement. Applications include various one-dimensional problems, central potentials and angular momenta. The transition to the matrix formulation of quantum theory is developed.

Prerequisites: PHY 251 and (MAT 213 or MA 222)

Attributes: Undergraduate

PHY 327 Quantum Inform Science & Engr (3 credits)

Provides an elementary introduction to the fundamentals and implementation of quantum computers and quantum computation. It introduces the concepts of qubits, quantum entanglement, quantum coherence, and quantum gates and algorithms, with a focus on superconductor-based approaches.

Prerequisites: MAT 226

Attributes: Undergraduate

PHY 330 Descriptive Astronomy (3 credits)

Covers basic concepts of astronomy, its historical development, and theories of the origin of the universe. The search for life in the universe, the colonization of outer space, and the social and moral issues of the space program are also covered.

Attributes: Undergraduate

PHY 331 Nonlinear Dynamics and Chaos (3 credits)

This course introduces the theoretical foundations of nonlinear dynamics and chaos. Phase space analysis, bifurcations, routes to chaos, renormalization and universality, fractals and strange attractors are presented for a variety of nonlinear systems including maps and flows. Several examples are used to illustrate the theory, from physics, chemistry, biology, neuroscience, economics and social science. Simulations are used throughout the course either by numerical computations with Matlab, Mathematica, or specific software packages.

Prerequisites: MAT 161 or MAT 155

Attributes: GEP. Natural Science, Undergraduate

PHY 332 Intro. to Network Science (3 credits)

Basics of networks theory is introduced. Different network architectures are studied and analyzed. These include random and scale-free networks. Their properties and evolution are presented. In each component of the course a variety of examples of how these networks can model real processes and systems in various fields (data science, social science, mathematics, physics, environmental science, epidemiology, computer science, biology and chemistry, business analytics) will be analyzed. In particular the application of network science in Physics will be included for example for topics such as aggregation phenomena, lattices, neuro physics, critical phenomena, percolation to name few. Also the application of these physics topics to other fields will be presented. This course can be taken only by students in their third year or above.

Prerequisites: MAT 161

Attributes: GEP. Natural Science, Undergraduate

PHY 357 Mathematical Methods (3 credits)

This course is an introduction to mathematical methods used in physics, chemistry, and related sciences: vector calculus, functions of complex variable, Fourier series, Fourier transform, series solutions of ordinary differential equations, and introduction to group theory. These topics are introduced in the context of specific problems in various areas of physics and physical science such as fluid dynamics, electricity and magnetism, quantum mechanics, thermodynamics, biophysics, and mechanics.

Prerequisites: (PHY 212 or PHY 106) and MAT 123

Attributes: Undergraduate

PHY 370 Special Topics in Physics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PHY 380 Engineering Circuit Analysis (3 credits)

This course introduces the analysis and design of electric circuits. It covers the DC (Direct current) and AC (Alternating current) analysis, including transient and steady-state responses. It includes resonance, frequency response, passive and active filters. Three-phase circuits are also investigated, including power factor correction.

Prerequisites: PHY 106 and MAT 162

Attributes: Undergraduate

PHY 380L Engineer Circuit Analysis Lab (1 credit)

This laboratory has to be taken in combination the PHY380 Lecture the student will develop hands-on projects, with professional test equipment. Software tools (e.g., Multisim and Matlab) will be used to troubleshoot and guide design.

Prerequisites: PHY 106 and MAT 162

Attributes: Undergraduate

PHY 390 Physics Seminar (0 credits)

Topics and agenda may include outside speakers, local speakers, and discussion of special topics in physics and related areas. Physics majors are required to attend each semester. Physics minors are also encouraged to attend. Graded on a P/NP basis.

Attributes: Undergraduate

PHY 401 Advanced Mechanics (3 credits)

This course will further develop the Lagrangian and Hamiltonian formulations of classical mechanics. Additional emphasis will be given to such topics as: collision theory, noninertial reference frames, nonlinear mechanics and chaos, continuum mechanics, and topics in special relativity.

Prerequisites: PHY 301

Attributes: Undergraduate

PHY 403 Quantum Mechanics II (3 credits)

A continuation of the development of quantum theory started in PHY 321. Topics to include: identical particles including fundamental molecular quantum theory, time-independent and time dependent perturbation theory, the WKB and adiabatic approximations, scattering, and an introduction to field theory.

Prerequisites: PHY 321

Attributes: Undergraduate

PHY 405 Solid State Physics (3 credits)

A study of matter in its solid state. Topics include crystal structure, electrical conduction in metals and semiconductors, dielectrics, magnetic materials, and superconductivity. Includes applications to solid-state devices.

Prerequisites: PHY 251 and PHY 257

Attributes: Undergraduate

PHY 407 Soft Condensed Matter Physics (3 credits)

This course will study the physics of materials such as fluids, liquid crystal, polymers (including biological polymers such as proteins and DNA), colloids, emulsions, foams, gels, and granular materials.

Prerequisites: PHY 251 and PHY 252 and PHY 257

Attributes: Undergraduate

PHY 408 Advanced Electromagnetism (3 credits)

A selection of advanced topics in electromagnetism such as electrostatics, boundary-value problems, fields, and wave propagation in material media. Other topics include propagation in waveguides and transmission lines, gauge transformations, relativistic theory of electromagnetic fields, and numerical techniques in electromagnetism.

Prerequisites: PHY 307 and MAT 238

Attributes: Undergraduate

PHY 409 Statistical Mechanics (3 credits)

Topics include ensembles and distribution functions, quantum statistics, Bose-Einstein and Fermi-Dirac statistics, and partition functions.

Prerequisites: PHY 251 and PHY 257

Attributes: Undergraduate

PHY 411 Nuclear Physics (3 credits)

The phenomena of natural and artificial radioactivity are investigated.

Various models of nuclear structure are introduced and examined.

Nuclear reactions are studied with emphasis upon fission and fusion.

Some of the apparatus of nuclear physics, such as particle accelerators and radiation detection devices, are analyzed.

Prerequisites: PHY 251 and MAT 213

Attributes: Undergraduate

PHY 412 Medical Instrument & Imaging (3 credits)

An introduction to the basics of radiation physics, radiation therapy, and dosimetry.

Prerequisites: PHY 102 or PHY 106 or PHY 202 or PHY 212

Attributes: Undergraduate

PHY 413 Materials of Electronics (3 credits)

This course will focus on the materials used to conduct electrical charge and spin and hence information from one region in space and time to another. Conduction processes in metals, traditional semiconductors, and in organic conducting and semi-conducting materials will be explored with a particular emphasis on the underlying physics principles employed.

Prerequisites: PHY 251 and PHY 252 and PHY 257

Attributes: Undergraduate

PHY 415 Computational Physics (3 credits)

Introduction to problem solving in physics using mathematical modeling, numerical methods, computer simulations and the fundamentals of programming. Topics may include: numerical solutions of Laplace and Poisson equations for electrostatic boundary-value problems, Monte Carlo simulation techniques, chaos theory.

Prerequisites: PHY 106 and MAT 213

Attributes: Undergraduate

PHY 417 Astrophysics (3 credits)

Application of the principles of classical and modern physics to astronomical phenomena. Topics include the acquisition and analysis of primary astronomical data; stellar energy production, structure, and evolution, including red giants, white dwarfs, neutron stars, and black holes; galactic structure and evolution; and cosmology.

Prerequisites: PHY 251 and PHY 257

Attributes: Undergraduate

PHY 419 Biophysics (3 credits)

Application of physics to biological systems. Topics include: molecular biomechanics, fluids, interaction of photons and charged particles with matter, transport phenomena, electrical properties of membranes and nerves, Fourier techniques and signal analysis, image reconstruction, fundamentals of radiology, and health physics issues.

Prerequisites: PHY 251 and PHY 257

Attributes: Undergraduate

PHY 421 Physics of Fluids (3 credits)

The mechanics of continuous media, including balance laws for mass and momentum. Hydrostatic equilibrium, compressible and incompressible flow, vorticity and circulation. Pressure and shear, viscosity, and an introduction to Newtonian and non-Newtonian fluids. Applications may include geophysical flows.

Prerequisites: PHY 106 and PHY 257

Attributes: Undergraduate

PHY 423 Biomechanics (4 credits)

The role played by physical forces in shaping our natural world can be seen in the morphology, behavior, material composition, and spatial distribution of every organism, whether aquatic or terrestrial, plant or animal. This course exposes students to the role of physics in biological systems at the organismic and super-organismic level. Each week the course will focus on a different sub-discipline of Biomechanics presenting the underlying physical principles and the biological ramifications of those principles. In addition, laboratory exercises will present techniques and experimental approaches available to measure forces relevant to biological systems, as well as the quantitative and analytical skills necessary to work in this field.

Prerequisites: PHY 101 or PHY 105

Attributes: Undergraduate

PHY 423L BioMechanics Lab (0 credits)

A laboratory course to accompany PHY 423.

PHY 425 Biophysics of the Brain (3 credits)

This course introduces biophysical models of the brain and the nervous system functioning. In particular the physics of the neocortex is presented through the analysis of EEG studies. Simulations with software packages are employed to illustrate with various examples the models and their results. Linear electrical analogs and some basics of neural network theory are part of the course content. Elements of Biophysics of consciousness are also presented and a set of case studies is analyzed and discussed.

Prerequisites: (PHY 102 or PY 202) or (PHY 106 or PY 212) or (MAT 161 or MA 122 or MA 110)

Attributes: Undergraduate

PHY 426 Electronics and Photonics (3 credits)

This course will focus on physical principles underlying semiconductor devices: electrons and holes in semiconductors, energies and band gaps, transport properties of electrons and holes, p-n junctions, transistors, light emitting diodes, lasers, solar cells and thermoelectric devices. This course will include a few short laboratory sessions.

Prerequisites: PHY 106 and PHY 213 and MAT 162

Attributes: Undergraduate

PHY 435 General Relativity (3 credits)

An introduction to the general theory of relativity. Topics include special relativity, tensor analysis, curved manifolds, the equivalence principle, Einstein's field equations, spherical static solutions, black holes, and cosmology.

Prerequisites: PHY 251 (may be taken concurrently)

Attributes: Undergraduate

PHY 440 Introduction to Nanoscience (3 credits)

Introduction to broad topics of nanoscience and technology, including micro- and nanofabrication methods, small scale surface modification and characterization, physical and chemical properties of nanomaterials, and quantum phenomena, and their application in natural and engineering sciences. Up-to-date novel experimental and theoretical methods via research-based studies.

Prerequisites: PHY 321

Attributes: Undergraduate

PHY 451 Quantum Mat Sci & Engineer (3 credits)

Introduces students to quantum effects in materials by focusing on the behavior of electrons in atoms, molecules and solids. Topics include superconductivity, magnetism, graphene and nano-materials, topological insulators, charge and spin density waves, classical and quantum phase transitions, and interfaces.

Prerequisites: PHY 321

Attributes: Undergraduate

PHY 463 Physics of Stars & Black Holes (3 credits)

An introduction to the physics and astrophysics of stellar evolution, including stellar birth, nucleosynthesis, main sequence stars, binary systems, white dwarfs, neutron stars, and black holes.

Prerequisites: PHY 251 and PHY 301

Attributes: Undergraduate

PHY 465 Introduction to Cosmology (3 credits)

An introduction to the physical properties and evolution of the universe, including its age, content, dynamics, and fate.

Prerequisites: PHY 251 and PHY 301

Attributes: Undergraduate

PHY 470 Adv Special Topics in Physics (3 credits)

The topics to be discussed are decided upon by agreement between students and teacher. This sequence is designed for Honors and other qualified students.

Attributes: Undergraduate

PHY 480 Intro to Materials Sci & Eng (3 credits)

General introduction to different types of materials: metals, ceramics, polymers, and composite materials. The relationship between structure and properties of materials are studied, along with the illustration of their fundamental differences and their applications.

Prerequisites: (CHM 125 or CHM 126) and (PHY 303 or PHY 409)

Attributes: Undergraduate

PHY 482 Math Meth Physics & Engineer (3 credits)

This course covers a broad spectrum of mathematical techniques which are necessary for analytical calculations and analysis of physics theories and mathematical models in physics and engineering. The course focuses on mastering essential knowledge to solve advanced problems in physics and engineering. Topics include: ordinary differential equations with non-constant coefficients, partial differential equations, special functions, contour integration, complex variables, tabulated integrals, saddle-point methods, linear vector spaces, boundary-value problems, eigenvalue problems, Green's functions, integral transforms and basic group theory. Application of these topics to the solution of problems in physics and engineering is stressed.

Prerequisites: PHY 106 and PHY 213 and MAT 213 and MAT 226 and MAT 238

Attributes: Undergraduate

PHY 488 Senior Design Project (3 credits)

The final term of the program includes a senior design course where students, working in small teams, do a term-long project. These projects are jointly supervised by a faculty member and/ or an individuals from a company.

Prerequisites: PHY 301 and PHY 307 and PHY 313

Attributes: Undergraduate

PHY 492 Internship in Physics (3 credits)

An approved internship in physics.

PHY 493 Research Project in Physics (1-4 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair and Associate Dean in order to register. Honors Research Project (6 credits) Must be elected in junior year to allow adequate research time. Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair, Associate Dean and the Honors Program Director in order to register.

Attributes: Undergraduate

PHY 494 Research Project in Physics (1-4 credits)

Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair and Associate Dean in order to register. Honors Research Project (6 credits) Must be elected in junior year to allow adequate research time. Students need to complete the application form for independent study (available in the Dean's Office) and have the approval of the department chair, Associate Dean and the Honors Program Director in order to register.

Attributes: Undergraduate

PHY 495 Undergrad Research in Physics (2 credits)

Students will engage in a supervised research project related to physics or biophysics.

Attributes: Undergraduate

PHY 496 Advanced Research in Physics (3 credits)

Students will engage in an advanced research project related to physics or biophysics under the close supervision of a faculty member.

Attributes: Undergraduate

PHY 498 Directed Research in Physics (3 credits)

Students will engage in research of an experimental, computational, or theoretical nature in either physics or biophysics under the close supervision of a faculty member.

Attributes: Undergraduate

PHY 700 Graduate Physics Seminar (1 credit)

Reports and seminars on topics of current physics interest presented by students. Depending on the instructor, topic may be one of student's or instructor's choice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 701 Medical Physics (3 credits)

Biomedical applications of physics are covered with emphasis on diagnostic and treatment implications. Problem-solving opportunities and detailed literature review in the areas of physics pertinent to orthopedic and/or neurologic physical therapy practice are included.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 703 Entrepreneurship & Physics (2 credits)

This course provides an overview of the tasks performed by physicists working in the private sector and industry. This includes an introduction of entrepreneurship basics. Students are also involved in projects which may include design, testing, cost feasibility and market analysis of simple products. Professional industrial physicists from the private, public, and government sectors are invited to give presentations and interact with the students.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 710 Advanced Mechanics (3 credits)

Advanced methods for analyzing classical physical systems, making use of Lagrangian, Hamiltonian, and Newtonian techniques. Includes single and multiple particle systems, rigid bodies, symmetry and conservation principles, normal modes of oscillation, continuous systems, and modifications needed for special relativity.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 721 Quantum Mechanics (3 credits)

The course covers the essential theoretical formulation of quantum mechanics and its formal structure. It analyzes kinematics and dynamics of a set of quantum systems in various representations. The course also introduces the path integral formulation of quantum mechanics and quantum mechanics in phase space. Several examples and applications will be used to illustrate the concepts. These include addition of angular momenta, and charged particle in a magnetic field.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 730 Advanced Nonlinear Dynamics (3 credits)

The course covers advanced topics in chaos and nonlinear dynamics including center manifolds, homoclinic and heteroclinic tangles and chaotic transport, topology of chaos-branched manifolds, invariant sets, and universality. Also, the symmetry of chaos, chaos in Hamiltonian and conservative systems, KAM theorem, stochastic layers and diffusion, and chaos in quantum systems. Theory will be applied to various systems in physics, chemistry, biology, and other fields. Numerical and computational techniques will be presented and used in the applications.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 757 Mathematical Methods (3 credits)

Advanced mathematical methods to model systems in physics, physical science and engineering. Integral transforms. Series solutions of ordinary differential equations. Special functions. Solution of partial differential equations, with boundary and initial conditions and their applications. Complex variables, complex integration and their applications. Calculus of variations.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 799 Graduate Research in Physics (3-5 credits)

A research project in the student's chosen track under the direction of a faculty advisor.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 807 Advanced Electromagnetism (3 credits)

Advanced methods to study boundary-value in electrostatics. Electrostatics of macroscopic media. Magnetostatics, Faraday's Law, and quasi-static fields. Maxwell Equations, macroscopic electromagnetism and conservation laws. Electromagnetic waves and wave propagation in different media. The course will cover some applications such as wave guides, resonant cavities, optical fibers, scattering and diffraction.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 809 Statistical Mechanics (3 credits)

Foundations of classical statistical mechanics with applications. Phase transitions, critical phenomena, and renormalization group theory.

Quantum statistics such as Bose-Einstein and Fermi-Dirac distributions and their applications. Advanced topics in non-equilibrium statistical mechanics such as classical and quantum theory of linear response, Langevin and Fokker-Planck equations and their applications.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 817 Quantum Information (3 credits)

Provides a broad survey of the fundamentals and physical implementation of the rapidly-evolving field of quantum information and computation. It discusses the concept of qubits, quantum entanglement, quantum coherence, and quantum gates and algorithms, with a focus on superconductor-based approaches.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 832 Network Theory & Applications (3 credits)

Different types of networks are analyzed. These include random and scale-free networks. Their properties and evolution are studied. Examples of how these networks can model real processes and systems are introduced.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 833 Pattern Formation (3 credits)

This course covers different techniques to explore mechanisms of macroscopic pattern formation in a variety of physical systems such as fluids, materials, chemical and biophysical systems. The course introduces both time- and space-patterns. The concept of self-organization and formation of coherent structures is discussed in depth. The course also introduces basic techniques for digital pattern recognition.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 840 Biophysics Exptl Techniques (3 credits)

Presentation of the available technologies for the research in biophysics, with emphasis on lab-on-a-chip and its interfaces with the atomic force microscopy (AFM) and mass spectrometry. It covers microfluidics techniques, including channel microfluidics and digital microfluidics.

The concept of lab-on-a-chip technology is introduced, showing the possibilities for faster and accurate bio-analytical applications when compared to conventional methods.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 841 Physical Approach to Life Sci. (3 credits)

The course applies physics and mathematics to obtain quantitative information that sheds light on biological processes, particularly at the cellular and molecular level. It includes microfluidics (with lab-on-chip technologies), random walks, diffusion with drift, statistical mechanics and rate equations, with applications to enzyme kinetics, molecular motors, biological electricity, and protein folding. Throughout the course, the student is guided in up-to-date discussion on selected papers and presentations on current platforms in the discipline.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 850 Materials Sci Exptl Techniques (3 credits)

Introduces students to the principles and applications of state-of-the-art experimental techniques for the measurement and analysis of the structure and properties of materials. The course will involve a mixture of lectures, demonstrations and hands-on laboratory exercises. Topics are selected from advanced microscopy, electronic, optical, and thermodynamic methods of probing materials.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 851 Quantum Materials (3 credits)

Introduces students to quantum effects in materials. Topics include superconductivity, magnetism, graphene and nanomaterials, topological insulators, charge and spin density waves, classical and quantum phase transitions, and interfaces.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

PHY 890 Graduate Special Topics (3 credits)

This course is designed to allow in-depth exploration of one of a variety of topics of current interest in physics. The topic will be designated by the instructor.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Political Science (POL)

POL 111 Intro to American Politics (3 credits)

This course is an introduction to American political processes and institutions. The goal of this course is to acquaint the student with the theory and practice of American government. Students will learn about the basic structure, function, and dynamics of American government and the political system within the context of the major political issues of our time. Beyond studying the institutional structures and activities of government, we will also evaluate the relationships between individuals, groups, and institutions in terms of influence, process, and outputs in various domains.

Attributes: American Studies Course, CCC: Social Science, GEP: Social Science, Undergraduate

POL 113 Intro to Comparative Politics (3 credits)

An introduction to the study of comparative political systems, this course focuses attention on the institutions and political cultures of select countries from different world regions. While exploring the varieties of democracy and authoritarianisms, as well as the complexity of democratizing today, this course also introduces students to the comparative method.

Attributes: CCC: Mission: Global Citizenship, CCC: Social Science, GEP: Social Science, GEP: Globalization Course, International Relations Course, Undergraduate

POL 115 Intro to Global Politics (3 credits)

This course is an introductory survey of the major approaches (Realism, Liberalism, and Constructivism), interpretations and problems in the field of Global Politics, with a heavy emphasis on current events. Topics include security (war, peace, terrorism), international political economy (hegemony, development, globalization), and trans boundary issues (migration, human rights).

Attributes: CCC: Social Science, GEP: Social Science, GEP: Globalization Course, International Relations Course, Undergraduate

POL 117 Intro to Political Thought (3 credits)

What does "we the people" mean after the murder of George Floyd? This course traces an idea – that free, rational, and self-interested individuals create a government using a social contract. This idea justified the American Revolution, the abolition of enslavement, women's suffrage, and the civil rights movement in the 1960s. But after the murder of George Floyd, Americans wondered whether the contract was broken? This course interrogates whether these principles of rights and equality apply to all people regardless of gender identity, race, ethnicity, sexual orientation, gender identity, etc. We study people who created these ideas and also people who questioned these ideas: enslaved people who asked how the social contract could support slavery, women who wondered whether the "people" included them, and citizens of color who have asked when the promise of equality in the contract will be fully realized. The course includes all types of theory with a particular emphasis on Black political thought and linking foundational ideas to contemporary issues.

Attributes: CCC: Diversity, Undergraduate

POL 170 Special Topics: Political Sci (3 credits)

Depending on the instructor, these courses will focus on a particular topic of interest in Political Science and Politics (e.g., The Presidential Election, The Arab Spring, Guns and the Supreme Court). Does not count for major credit.

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Undergraduate

POL 190 Strategies for Success (1 credit)

Our class is designed to provide students with the tools needed to thrive and succeed at SJU and in your major. We will focus on the development and application of college-level study skills, personal success strategies, and the use of campus resources that enhance individual student achievement. Topics discussed will include: learning styles, study techniques, note-taking, test-taking, effective writing and reading, time management, career and educational planning, personal wellness and finance, and interpersonal skill development. We will investigate the variety of offices and resources available to students across campus, as well as how to use some of the more common software systems (Canvas, Starfish, Google Applications, etc). Successfully completing POL 190 is required of all incoming Freshmen students majoring in Political Science or International Relations, and grading is based on P/NP.

Restrictions: Enrollment is limited to students with a major in International Relations, Political Science or Public Policy.

Attributes: Undergraduate

POL 195 IDEAL Learning (1 credit)

This course is for students interested in pursuing the IDEAL Learning sequence and who want to explore applying for the IDEAL Scholars program. We will take the skills acquired from POL 190 to the next level by examining various ways for understanding leadership, strengthening our ability to navigate the college environment, exploring multi-level mentoring networks, and developing affinity-based community learning. Chair/Instructor approval required.

Prerequisites: POL 190 (may be taken concurrently)

Attributes: International Relations Course, Undergraduate

POL 196 POL AP (3 credits)**POL 270 Special Topics (3 credits)**

Depending on the instructor, these courses will focus on a particular topic of interest in Political Science and Politics (e.g., The Presidential Election, Guns and the Supreme Court).

Attributes: Undergraduate

POL 290 Career Prep Seminar (1 credit)

What will YOU do with your Political Science or International Relations degree? Learn how to explore the variety of professional options open to you based on your major and on your unique personality and individual traits. This professional development seminar will help you build practical skills through a series of hands on assignments, a detailed self-assessment, goal-planning for a successful future, and multiple points of engagement with alumni. This course meets once a week to provide instruction and support in topics including internship search and application, resume/cover letter prep, post-grad options, professional communication and networking/interviewing. Is an internship right for you? Do you know the best way to search for one? Why do I need to network - how will that help me? Get the answers to these and many other questions and invest in your future! All majors are required to complete this seminar in the Fall semester of their Sophomore year; graded on a P/NP basis. Political Science and International Relations minors are also encouraged to register.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in International Relations, Political Science or Public Policy.

Attributes: Undergraduate

POL 291 IDEAL Scholars (1 credit)

This course is for students who have been accepted into the IDEAL Learning program and will further develop mentoring, leadership, and community-building skills. Students will have the opportunity to practice and share the knowledge they have gained by engaging in hands-on projects, activities, and faculty/student interactions. Chair/Instructor approval required.

Prerequisites: POL 190 (may be taken concurrently) or POL 195 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in International Relations, Political Science or Public Policy.

Attributes: International Relations Course, Undergraduate

POL 292 IDEAL Leaders (1 credit)

This course is for students who have been accepted into the IDEAL Learning program and who want to take on a leadership role within the initiative. IDEAL Leaders will directly apply the skills they have acquired by mentoring, leading, and building community within the program. Chair/Instructor approval required.

Prerequisites: POL 291 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in International Relations, Political Science or Public Policy.

Attributes: International Relations Course, Undergraduate

POL 303 Political Ideology in America (3 credits)

What ideas define Americans? Is there one narrative of citizenship that defines the United States or several versions that "we, the people"? This course links early texts in American Political Thought (e.g. American revolution, constitutional convention, Civil War) to later intellectual and political movements in American thought (e.g. Black civil rights, women's suffrage). We explore whether all these movements share conceptual foundations and whether later movements refuted, amended, or supported concepts that were fundamental to the "founding."

Attributes: American Studies Course, CCC: Diversity, Undergraduate

POL 304 Engaging Communities (3 credits)

How do communities identify and solve problems in partnership with other stakeholders in their local environment? Engaging Communities is an examination of how institutions develop trust and reciprocal partnerships within their neighborhoods and surrounding communities. The class will study the theory and practice of constructing mutually beneficial relationships among and between hospitals, higher education institutions, non-profit organizations, local government, community groups, and residents to improve the quality of life locally in Philadelphia and the surrounding counties. Students will learn about multiple ways to elicit and increase community participation and civic engagement, utilize the fundamentals of project management, and create models for assessment.

Prerequisites: POL 111 or POL 113

Attributes: Undergraduate

POL 305 Politics, Ideology, & Film (3 credits)

Are we responsible for the actions of our leaders? Is it ever ethically or politically acceptable to torture people? How do ideologies – bodies of thought – affect individuals, social movements, nations, institutions, and groups? This course examines major political ideologies through the study of primary texts, scholarly articles, and films. Films from Europe, Asia, Latin America, Africa, the Middle East, and North America place each ideology in historical, political, and/or economic context. We master the complexities of ideologies such as fascism, racism, settler colonialism, communism, and sexism in historical context as well as evaluate ideologies that have shaped national and international politics in the twentieth and twenty-first centuries.

Attributes: CCC: Diversity, GEP: Ethics Intensive, International Relations Course, Undergraduate

POL 306 Political Participation in US (3 credits)

Why do people participate in American politics and civic life? Why don't they? Why should they? This course emphasizes the political science literature on political participation and civic engagement. We will begin by examining the factors that make participation more or less likely including socialization, partisanship, networks, and geography. Demographic and social identities can shape how easily and how often we wish to involve ourselves in democratic processes. From there, we will focus on forms of political participation. Who votes? Who donates money? Who protests? Throughout we will acknowledge the constraints that make forms of participation easier from some than others. Finally, we will address the consequences for political life if individuals opt out of politics. What does isolation and decline in civic life mean for the rise of political and economic inequality, efficacy, and social connectedness?

Attributes: Faith Justice Course, Justice Ethics and the Law , Undergraduate

POL 307 Reproduction and the Court (3 credits)

In the 1970s, Latinx women were coerced into being sterilized when they had caesarean sections - but courts did not see a violation of their rights. Is there a constitutional right to reproduce? Buy birth control? End a pregnancy? This course considers the changing opinions of the U.S. Supreme Court (SCOTUS) with an emphasis on race and gender. It includes a SCOTUS simulation (moot court) in which students act as justices and attorneys. No previous background in judicial politics necessary.

Attributes: American Studies Course, Gender Studies Course, Justice Ethics and the Law , Undergraduate

POL 309 Advising and Advocacy (3 credits)

How do citizens and groups advocate for interests? How do they advise leaders to make changes? And, when are they more likely to influence the policy direction of the nation? This course offers an analysis of modern American "advising and advocacy" styles and models, with a focus on the politics of domestic policymaking. Students will study the use of power and authority, the importance of strategic opportunities, the nature of decision-making in a separated system, and the role that government, interest groups, and public opinion play in those decisions. Based on these perspectives, we will bring our informed insights to address an important question within our current circumstances: how to represent those who were/are marginalized in the political landscape. Thus, students in this class will serve as advocates for those who may not have the strongest voices in political discussions and advise elected officials on how to construct a policy agenda that attends to underserved citizens and historically marginalized communities. Indeed, a primary goal of the class is to study and critically analyze how systems of inequality and disadvantage inform politics and policy from a social justice perspective.

Attributes: American Studies Course, Faith Justice Course, Gender Studies Course, Undergraduate

POL 310 Constitutional Politics (3 credits)

The three branches of American government (legislative, executive, and judiciary) compete for control over American policy and law. The Supreme Court can declare an act of either the legislature or executive unconstitutional (judicial review). Yet the Court relies on the two other branches to enforce its decisions (for example, President Eisenhower bringing in the military to uphold the desegregation of schools). Through the reading of cases and the viewing of documentaries, this course explores how the Supreme Court has shaped American politics for over two centuries. Topics include free speech in wartime, internment of Japanese-Americans during WWII, desegregation, abortion rights, and same-sex marriage.

Attributes: Justice Ethics and the Law , Undergraduate

POL 311 Const Law: Rights & Civil Lib (3 credits)

How do 9 unelected people affect our elections, health insurance, ability to marry, or access to birth control or abortion? This course teaches you to read and analyze the opinions of the Supreme Court of the United States (SCOTUS) – and understand them in the context of contemporary American politics. We read classic Supreme Court decisions (e.g., freedom of speech, press, and association, racial and gender discrimination) as well as cases that are changing our current laws. The course highlight is an exciting moot court simulation of two SCOTUS cases with students playing justices and attorneys.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: American Studies Course, CCC: Writing Intensive, Justice Ethics and the Law , Undergraduate, GEP: Writing Intensive

POL 312 Social Controv & Supreme Court (3 credits)

Some Americans look to the Supreme Court (SCOTUS) to rule on moral and social issues like capital punishment and abortion. Why do citizens rely on nine unelected judges to define their rights in a democracy? This class analyzes how the SCOTUS has changed American law on gun ownership and marriage equality. The class begins by considering the judiciary in our constitutional democracy then turns to the two case studies. Students will examine documents from the Founding (e.g. the Federalist Papers), read modern accounts of both gun and marriage cases, and learn to read and brief Supreme Court decisions.

Attributes: American Studies Course, CCC: Diversity, Justice Ethics and the Law , Undergraduate

POL 313 Public Policy (3 credits)

This course investigates public policymaking within the United States with an emphasis on the social construction of public policy. Students will assess the significance of social, economic, and political factors that influence policymaking and implementation; how problems become a part of the political agenda; and the major political ideological perspectives in the U.S. that impact policy process and content.

The course is a study of policy in practice, as students will evaluate current social problems along with empirical social science research to determine the strengths and weaknesses as well as the intended and unintended effects of a particular social policy at the state and/or national level.

Attributes: American Studies Course, Faith Justice Course, Justice Ethics and the Law , Undergraduate

POL 316 State and Local Government (3 credits)

This upper division course focuses on understanding variation across America's federal system. How can we move from thinking about one American government, to 51 governments (all the states plus the national), or to the significantly larger number of local and municipal governments? What role do the states and localities play in shaping American democracy? In what ways are states hindering democracy or helping it flourish? In this course we will focus on three broad themes in the state politics literature: structural power, interest group activism, and individual political behavior. Throughout we will acknowledge that variation at the subnational level matters for engagement, equality, and the presence of a functioning democracy.

Attributes: American Studies Course, Undergraduate

POL 318 Pennsylvania Politics (3 credits)

This course is a study of the Commonwealth of Pennsylvania, its recent history, its politics, and the way its government is conducted. The course will have distinct, but overlapping emphases: The Political Environment: What are the political forces driving the agenda in this state? The issues: What are the issues that actually matter in this state? The Structure: How do the Governor's Office, the General Assembly, other statewide offices, and other departments of state government actually work? To assist in learning about these matters, several experienced and knowledgeable guest speakers will address the class. In addition, at various points in the semester, the class will be formed into a focus group to discuss various issues confronting the state.

Attributes: American Studies Course, Undergraduate

POL 319 Public Opinion & Media (3 credits)

This course is a brief overview of the role of public opinion and media in American democracy. We hold attitudes about relevant political and social groups, many of which shape our thoughts and actions. Further, if government is to be "by the people," understanding what "the people" want is of major importance to legislators, organized groups, and interested political scientists. The media, a critical source of political information, can inform the public, provide a mirror of public perception, but also shape ideas. In this course, we examine several complex questions: What is public opinion? Where does it come from? How and when does it change? Does everyone's opinion matter equally?

Attributes: American Studies Course, Undergraduate

POL 322 Campaigns & Elections (3 credits)

The Campaigns and Elections course is an examination of modern American political campaigns, with a focus on the dramatic changes that have occurred in electoral politics in recent years. The course will have three distinct, but overlapping emphases: 1. The Strategic Campaign: How are campaigns carried on and managed? How should they be? What are the new technologies that have so drastically changed the nature of political campaigns? 2. Voting Behavior; what are the deep and fundamental changes that have occurred in voting behaviors and attitudes in recent years? What are the implications of these changes for the electoral process? 3. The Media and Campaigns: How do the media influence campaigns and electoral outcomes? What are the implications of the pervasive relationship between politics and the mass media? To assist in learning about the real world of politics, several guest speakers with considerable experience in political campaigns will address the class. In addition, at various points during the semester, the class will be formed into a focus group to discuss various campaign-related issues.

Attributes: American Studies Course, Undergraduate

POL 323 Women and American Politics (3 credits)

This course is designed to provide students with a critical examination of women as political actors in the United States. We will analyze various forms of women's political participation, both in the traditional spheres of what is considered politics – women as voters and politicians – and also in more "non-traditional" spheres of political activism. We will examine how women are mobilized to participate in politics, focusing keenly on the differences among women in their political activism in an effort to understand how the intersection of gender, race, class, sexuality, age, and ability influence women's political activism. The primary goal of this course is to familiarize students with key issues, questions, and debates in the women and politics scholarship, mainly from a U.S. perspective. Students will become acquainted with many of the critical questions and concepts scholars have developed as tools for thinking about the gendered political experience. In this course you will learn to "read" and analyze gender politically, exploring how it impacts our understanding of the political world.

Attributes: American Studies Course, Faith Justice Course, Gender Studies Course, Undergraduate

POL 324 Race & Ethnic Politics in U.S. (3 credits)

From its first days, the United States has faced the dilemma of how to incorporate populations different from the majority population into the polity. This dilemma continues today and appears in discussions of such issues as affirmative action, immigration and naturalization, language policy, and social welfare policy. In this course, we will examine the major theories that attempt to explain the roles of race and ethnicity in U.S. politics and the ways in which individuals use race and ethnicity as resources for political organization. We will examine the phenomenon of ethnicity and race in the political development of the United States. Finally, we will look at the political attitudes and behaviors of ethnic and racial populations in order to measure their contemporary political influence. Among the topics to be covered include the meaning of race and ethnicity, the history of racial and immigration politics, prejudice, group participation and mobilization, political representation, and public opinion.

Attributes: American Studies Course, Faith Justice Course, Gender Studies Course, Undergraduate

POL 325 Intersectionality (3 credits)

Our course is designed to provide students with a critical examination of intersectionality, a term "coined" by Kimberlé Crenshaw to theorize the experiences of Black women in the U.S. Indeed, the intersectionality work we "know" today arose from, and was rooted in, Black women's activism, oppositional knowledge and resistance, and collective action. Yet, as some have recently outlined, the field of intersectional studies has developed in ways that mask that origin, neutralize, and limit the potential of intersectional action. Therefore, to truly understand intersectionality, we must emphasize the canonical works produced and practiced by Black women and women of color activists, academics, and practitioners, and we will center their work in our class. Our study is grounded in the understanding that intersectionality is a political intervention as much as a theoretical lens lived within the tradition(s) of social justice. Throughout, we will study how theory informs practice (a key feminist expectation) and also how both guide what we know our political world. Thus, students will learn to read and analyze intersectionality politically, through the lens of power, and from a social justice perspective.

Attributes: American Studies Course, Faith Justice Course, Gender Studies Course, Undergraduate

POL 326 Protesting Inequality (3 credits)

Through the lens of political science, this course examines the political causes and consequences of inequality in the United States and how citizens have responded to the empirical realities of unequal circumstances. While inequality is an economically, politically, socially, and morally complex phenomenon, this course emphasizes that inequality does not "just happen" but rather is a result of the way our society is structured. Nevertheless, citizens-agents-have protested inequality on various occasions and in many different ways. It is on these citizen protest movements that we will focus most of our attention, including, but not limited to, the "Poor People's Movements" of the 1960s, the Welfare Rights Movement in the 1990s, and the Occupy Movement of the 2010s.

Attributes: American Studies Course, Faith Justice Course, Justice Ethics and the Law , Undergraduate

POL 328 U.S. Immigration (3 credits)

In this course, students will critically engage with the politics of immigration in the United States. While the national narrative broadly celebrates the arrival and incorporation of newcomers, these processes have been highly contested and problematic both in popular discourse and public policy since the country's founding. The question of 'who immigrates' has been, and continues to be, shaped by decisions on how to manage geopolitical and geoeconomic forces, domestic political, economic and social preferences, popular sentiment and humanitarian considerations. Furthermore, understanding how immigrants integrate in society necessarily involves examining 'difference' on a number of axes, including race and ethnicity, language and culture, religion, gender, socioeconomic and educational levels, and legal status. This course provides students with the opportunity to explore key aspects of the discourse and reality of immigration to the U.S., including the American Dream, assimilation, ethnic neighborhoods, transnationalism, borders and security by considering the values, interests and roles of actors at all levels, including civil society organizations, national and sub-national governments, communities, households and individuals in the continuous re-making of the U.S. as a nation of immigrants.

Attributes: American Studies Course, Faith Justice Course, Irish Studies Course, Justice Ethics and the Law , Latin American Studies Course, Undergraduate

POL 331 Latin American Politics (3 credits)

This course addresses the political, economic and social development of modern Latin America. It examines the transformation of traditional authority structures, efforts to promote economic development, and concerns for the consolidation of democracy, adjustment to globalization, and U.S.-Latin American relations.

Attributes: Faith Justice Course, International Relations Course, Justice Ethics and the Law, Latin American Studies Course, GEP. Non-Western Studies, Undergraduate

POL 333 Asian Democ at the Crossroads (3 credits)

This course will examine and discuss the political dynamics and policy behaviors of three successful democracies in Northeast Asia: Japan, South Korea, and Taiwan. While all three countries are successful democracies with economic power, each country also faces a series of critical challenges in their politics, economy, and society. The global implications of their struggles are never trivial and the examination of three countries will provide us with the better grasp of contemporary global issues. The thematic focus of the course lies in the comparative analysis of each country in terms of political system, political economy, state-society relations, and foreign relations. To this end, the course will also explore the intricacies of the cultural, historical, and psychological contexts in which behavioral and policy motivations may be explained.

Attributes: Asian Studies Course, International Relations Course, GEP. Non-Western Studies, Undergraduate

POL 334 Understanding Putin's Russia (3 credits)

Vladimir Putin has dominated Russian politics for more than two decades, and in doing so, has reversed what appeared in the 1990s to be a democratic future for that country. This class investigates how and why the communist legacy and traumatic process of transformation after 1991 created capitalism but not democracy. It examines not only domestic developments and institutions, but the ways that global processes and individual choices have created a new form of brutal and personalized authoritarianism in Russia that for years has appeared to have broad-based support.

Attributes: International Relations Course, GEP. Non-Western Studies, Undergraduate

POL 336 The EU and European Politics (3 credits)

While the European Union is one of the top three world economies and an important player in global politics, few understand how it works and what it does. This class examines the EU – its history, institutions, and achievements, as well as the politics in European countries, since member states exert control over what the Union can accomplish. The course culminates in two simulations, one of a European parliamentary committee and the other of the European Council, where European national leaders meet. Students will take on the identity of a European politician in each venue as they debate proposed legislation (committee) and meet at a summit (Council) to address some major issues of the day.

Attributes: GEP. Globalization Course, International Relations Course, Undergraduate

POL 337 Contemp Cuban Pol & Society (3 credits)

The Cuban revolution is one of the seminal events of Latin American twentieth century history. This course provides the tools to understand the forces that gave rise to the revolution, how 'the Revolution' has evolved over the more than five and a half decades since the Castro government has been in power, and how Cuban society has transformed - politically, economically, socially and culturally. Particular focus is placed on Cuba since the demise of the Soviet Union, the so called "Special Period," in which Cuba transitioned from a 2nd World client state into an isolated underdeveloped country. Political reforms since then have contributed to an aperture toward the outside world, as well as to steps towards greater economic freedom for Cubans. Many other topics, including race, gender, the arts, Cuba's foreign relations with the U.S. and the rest of the world, citizenship, religion, health care and Cuba's future, will be discussed as well.

Attributes: Africana Studies Course, American Studies Course, International Relations Course, Latin American Studies Course, GEP. Non-Western Studies, Undergraduate

POL 339 Asian Dictators (3 credits)

This course will examine and discuss the political dynamics and policy behaviors of two authoritarian communist regimes in East Asia: China and North Korea. What are the natures of Chinese and North Korean societies? What are the guiding principles and norms in their political systems? What are the historical as well as contemporary implications of their economic systems? To this end, this course will explore the intricacies of the cultural, historical, and psychological contexts in which behavioral and policy motivations could be explained. Along with the comparative analysis of each country (political system, political economy, state-society relations, and foreign relations), major contemporary issues and challenges will be also examined. Can Chinese Communist Party keep its authoritarian grip on its people forever? Will China ever be democratized? Has China's long economic boom ended? What are the mechanisms behind North Korea's tight and cruel control of its citizens and their devotion to the Kim dynasty? Can North Korea enter and survive the global economy? More fundamentally, where is China heading? What does North Korea want?

Attributes: Asian Studies Course, International Relations Course, GEP. Non-Western Studies, Undergraduate

POL 340 Political Geography (3 credits)

Political Geography is a course of political and spatial inquiry; it helps students compare and contrast people, places, and processes around the world. This course explores how spatial phenomena including physical geography, borders, and nation-states affect social and political phenomena including domestic, regional and global governance, differences and dynamics of power, and identity, and vice versa. Furthermore, Political Geography focuses on 'scale' - personal, local, regional, national, and global - to understand and explain patterns and processes, as well as conflict and cooperation in international affairs.

Attributes: International Relations Course, Irish Studies Course, Undergraduate

POL 350 Haunted by the Past (3 credits)

War apologies abound. Since the end of the Cold War, what we have been witnessing is a world-wide surge in memory. We are living in the era where collective apologies have become more and more common, and, as in Nigerian writer Wole Soyinka, to reconcile with the past has become critical part of contemporary politics of memory and regret. More concretely, this course will explore the following questions: Can a state apologize? Can the current generations apologize for the past wrongs and /or feel responsible? Or, should they? How do individuals articulate the link between identification with the state (and national pride) and sense of individual responsibility? How do individuals get their information about past wrongs? How much confidence do they have in the various sources (textbooks, mass media, internet, friends and family, etc.) at their disposal? Is reconciliation possible? Can memories go beyond national borders? Can it be something universal? The course will start with the introduction and examination of the role of history and memory in the (re-) formation of communal identity and explores for the possibility of communal reconciliation with past wrongs. Along with the examination of conceptual frameworks such as engagement and denial/avoidance, the ethical dimensions of political reconciliation will be discussed in terms of (1) retributive justice and (2) restorative justice.

Attributes: Asian Studies Course, GEP Ethics Intensive, International Relations Course, GEP Non-Western Studies, Undergraduate

POL 352 Global Political Economy (3 credits)

Global economic relations are international, political and complex; they involve cross border flows of goods, money, services and people, and they reflect and create power. This course focuses on the nature and impact of the movement of goods (trade), capital (money, foreign direct investment, bailouts), services (call centers), people (migration), and even "bads" (pollution and disease) to understand the challenges of and opportunities for development, globalization and international cooperation in today's world. It emphasizes the analysis of historic booms and busts in various national economies as well as current global events and trends.

Prerequisites: POL 115

Attributes: GEP Globalization Course, International Relations Course, Latin American Studies Course, Undergraduate

POL 356 American Foreign Policy (3 credits)

After an overview of the nature and causes of American foreign policy (AFP) from the Founding to the Cold War, this course develops students' policy and scholarly expertise on contemporary AFP. The emphasis is on understanding and explaining U.S. relations from 1990 to the present with Russia, the Middle East, and China, three important and currently highly volatile areas of US diplomatic focus and concern.

Attributes: American Studies Course, International Relations Course, Undergraduate

POL 364 IR of East Asia: War and Peace (3 credits)

The course will examine and discuss the most intriguing dynamics of international relations in East Asia. Along with the historical analysis of international relation in the region since the mid-19th century, the course will engage in the discussion of pressing issues that characterize contemporary international politics in the region, including (1) regional economic development and interactions, (2) Sino-Taiwanese tension and the U.S. involvement, (3) North Korean nuclear crisis, (4) Japan and its post-Cold War security profile, and (5) regional tension over Japan's militaristic past.

Attributes: Asian Studies Course, International Relations Course, GEP Non-Western Studies, Undergraduate

POL 367 Ethics in International Affairs (3 credits)

What is morality in international politics? Is ethical reasoning and action possible in international affairs? If possible, when and how? Proponents of Realism often claim that there is virtually no room for morality in international affairs, and states and state actors are rational thinkers interacting in anarchy. For them, ethics are simply luxury and irrelevant. On the other hand, thinkers under the tradition of IR liberalism/idealism emphasize the ethical dimension of state decision making and state behaviors. On what moral ground or ethical reasoning, are the moral behaviors taking place and observed/unobserved? The primary objective of the course is to help students enhance their analytical ability for the study of international ethics. To this end, the course will explore the main traditions and theories of international ethics with a focus on such topical areas as just war and use of force, universal human rights and humanitarian intervention, and national collective memory and post-conflict reconciliation.

Attributes: GEP Ethics Intensive, International Relations Course, Justice Ethics and the Law , Undergraduate

POL 368 Sex & Power around the World (3 credits)

Gender can seem invisible in politics, but masculinity and femininity and attitudes about the "appropriate" place in society of these two genders and others create power and affect how opportunities and resources are distributed. Learn about the gendered nature of political power in a variety of world settings and how gendered conditions affect war, peace, revolution, development, and democracy.

Attributes: CCC: Mission: Global Citizenship, Faith Justice Course, Gender Studies Course, GEP Globalization Course, International Relations Course, Undergraduate

POL 370 Special Topics (3 credits)

Depending on the instructor, these courses will focus on a particular topic of interest in Political Science and Politics (e.g., The Presidential Election, The Arab Spring, Guns and the Supreme Court).

Attributes: CCC: Mission: Global Citizenship, Undergraduate

POL 390 Minternship 1 (1 credit)

These supervised mini-internships provide students an opportunity to intern in offices, initiatives, projects across the SJU campus that are related to skill-building within Political Science and International Relations. Students will: (1) develop writing, communication, and interpersonal skills; (2) examine various venues through which they can apply their knowledge and skills; and (3) integrate academic learning into professional life. Credit for 390, 391, and 392 can be combined to meet the 3-credit experiential learning requirement for Political Science and International Relations. Registration and placement require the permission of the instructor and/or department chair. Chair/Instructor approval required.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in International Relations, Political Science or Public Policy.

Attributes: International Relations Course, Undergraduate

POL 391 Minternship 2 (1 credit)

These supervised mini-internships provide students an opportunity to intern in offices, initiatives, projects across the SJU campus that are related to skill-building within Political Science and International Relations. Students will: (1) develop writing, communication, and interpersonal skills; (2) examine various venues through which they can apply their knowledge and skills; and (3) integrate academic learning into professional life. Credit for 390, 391, and 392 can be combined to meet the 3-credit experiential learning requirement for Political Science and International Relations. Registration and placement require the permission of the instructor and/or department chair. Chair/Instructor approval required.

Attributes: International Relations Course, Undergraduate

POL 392 Minternship 3 (1 credit)

These supervised mini-internships provide students an opportunity to intern in offices, initiatives, projects across the SJU campus that are related to skill-building within Political Science and International Relations. Students will: (1) develop writing, communication, and interpersonal skills; (2) examine various venues through which they can apply their knowledge and skills; and (3) integrate academic learning into professional life. Credit for 390, 391, and 392 can be combined to meet the 3-credit experiential learning requirement for Political Science and International Relations. Registration and placement require the permission of the instructor and/or department chair. Chair/Instructor approval required.

Attributes: International Relations Course, Undergraduate

POL 402 Capstone: Contentious Pol inUS (3 credits)

Contentious politics consists of many "non-traditional" forms of political action, including social movements, protests, riots, and even political violence. This capstone political science seminar examines contentious politics in the U.S. through the lens of 1960/70s radical social movements, a key moment in U.S. politics in which the New Left imagined, theorized, negotiated, and contested the meaning of democracy and power. Students will examine and analyze the origins, ideologies, claims/grievances, goals, and strategies of radical political groups that roughly fall under the banner of the New Left: anti-war, feminism, black liberation, American Indian Movement, Chicano Movement, and Gay Liberation. We will study the politics of the struggle over rights, democracy, power, and the use/nonuse of violence within the New Left through a careful study of the primary texts (statements, agendas, etc.) produced by these groups. Students will investigate what the New Left helps us understand about power, politics, and violence in a modern democracy and evaluate the effectiveness of protest as a means to forward a political agenda, broadly defined.

Prerequisites: POL 111

Restrictions: Enrollment is limited to students with a major in Political Science.

Attributes: American Studies Course, Justice Ethics and the Law , Undergraduate

POL 403 Capstone: Nations&Nationalism (3 credits)

The primary objective of this seminar is to help students enhance their analytical abilities for the study of contemporary national problematique. In the rapidly changing contemporary global world, why are people still attracted, swayed, and annoyed by what is national? What is so important about being a part of nation? What drives people to develop specific allegiance toward a nation? And, how? More fundamentally, what is a nation?

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Restrictions: Enrollment limited to students with a class of Senior. Enrollment is limited to students with a major in International Relations or Political Science.

Attributes: CCC: Writing Intensive, International Relations Course, Undergraduate, GEP: Writing Intensive

POL 404 Capstone:Transforming Conflict (3 credits)

This seminar will explore the complexity of transforming violent conflict within and between societies so that people can survive and potentially thrive. Students will examine theories of conflict transformation and develop a question and design a study so that they can write an undergraduate research paper and make a presentation to the peers on an instance of conflict transformation of their choice.

Prerequisites: (POL 111 or POL 113 or POL 115)

Restrictions: Enrollment is limited to students with a major in International Relations or Political Science.

Attributes: CCC: Writing Intensive, GEP: Globalization Course, International Relations Course, Undergraduate

POL 405 Capstone: Pol of Labor & Work (3 credits)

Our capstone in political science extends our understanding of democracy by looking within one of the most common political institutions we will experience in our lifetimes: the workplace. Many of you are currently holding jobs, some part-time and others full-, some well-paid and others less well paid, some free (interning), some with inconsistent or too few hours, some with a terrible manager, some within the home (nannying/care work). You may be working in different organizations, or in different geographies. After graduation, the process only continues. This semester we will focus on the politics of work. What avenues do workers have to improve their autonomy, workplace conditions, and compensation? What barriers (employer, legal, political) challenge this process? What roles does organized labor serve? Though our focus is primarily the United States, we will acknowledge that worker conditions are shaped by different legal, geographic, and industrial contexts: country, state, law, industry, and time period. The policies regulating the workplace are political decisions. State repression of labor organizations has not been unusual historically, though what that might look like has shifted over time.

Prerequisites: POL 111

Restrictions: Enrollment is limited to students with a major in Political Science.

Attributes: Undergraduate

POL 407 Capstone: Theories of Justice (3 credits)

What is political justice? We read the books that defined justice in the 20th and 21st centuries including John Rawls' A Theory of Justice. Through the writing of essays, students compare and contrast theories in order to develop a vocabulary of political ideology (liberalism, communitarianism, conservatism, feminism, legalism, utilitarianism, disability theory, queer theory, and postmodernism) as well as an understanding of different types of justice (e.g., distributive v. restorative).

Prerequisites: POL 111 and POL 117 and ENG 101

Restrictions: Enrollment is limited to students with a major in Political Science.

Attributes: GEP. Ethics Intensive, Justice Ethics and the Law , Undergraduate

POL 408 Capstone: The Armed Citizen? (3 credits)

What is the role of firearms in a constitutional democracy? Do guns pose a threat in the form of violence and death, prevent tyranny, or secure rights? Can guns be restricted to protect against domestic abuse or suicide? This seminar interrogates (1) the meaning of the Second Amendment in the context of the creation of the Constitution and current controversies over the relationship between firearms and violence in the U.S. (2) the interpretations of the U.S. Supreme Court in their most recent decisions and (3) the theoretical issues raised by guns in a constitutional democracy (including Stand Your Ground laws). The course demands reading primary and secondary texts in political theory, public law, and history.

Prerequisites: POL 111 and POL 117 and ENG 101

Restrictions: Enrollment is limited to students with a major in Political Science.

Attributes: Justice Ethics and the Law , Undergraduate, GEP. Writing Intensive

POL 409 Capstone: Global Migration (3 credits)

Migration has become a topic of increasing focus and concern in the 21st century, with some arguing that it will be one of the defining issues of our time. This is certainly the case for those tens of millions of individuals who are currently on the move, for the sending communities and societies from which they emigrate and the destinations that receive them, and the nation-states that control their entrance and exit. In this seminar, we will cover the "big" issues of migration in a comparative format through engagement with some of the most important examples of the extensive body of literature in Migration Studies. Concretely, we will critically examine: the demographics of migration in key regions of the world; theories that explain mobility; host-immigrant relations and integration; the role of gender, race, and ethnicity in migration; the growth of transnational ties as an aspect of globalization; security; and the analysis of immigration policies and citizenship. Throughout the course of the semester, we will question continually challenge ourselves to question the approach to migration as a problem to be solved versus as a process to manage. As a capstone seminar, Global Migration as Problem and Process includes reading requirements that are extensive and challenging and approaches learning through a collective approach as we share our individual insights and understandings. We will learn from each other. Students must come to class having read the assignment materials critically so that we can grapple with ideas and engage in debate. Avid participation is required. There will be minimal formal lecturing and most seminar time will consist of open discussion. Furthermore, this capstone will draw upon the knowledge students have gained from many of their other Political Science classes. The course materials will draw heavily from empirical evidence (qualitative and quantitative) to explore the topics discussed above, while applying major theoretical concepts in Political Science. Students should come prepared to integrate the knowledge they have gained over the past four years.

Prerequisites: POL 113 and POL 115 and ENG 101

Restrictions: Enrollment is limited to students with a major in International Relations or Political Science.

Attributes: Faith Justice Course, GEP. Globalization Course, International Relations Course, Justice Ethics and the Law , Undergraduate

POL 413 International Internship I (3 credits)

Some study abroad programs offer internship credit for one or two classes. Please note: subject to administrative approval, students may earn two courses of UD POL credit if their internship is in the 32- hour/ week range.

Attributes: International Relations Course, Undergraduate

POL 414 International Internship II (3 credits)

Some study abroad programs offer internship credit for one or two classes. Please note: subject to administrative approval, students may earn two courses of UD POL credit if their internship is in the 32- hour/ week range.

Attributes: International Relations Course, Undergraduate

POL 415 Applied Research Mixed Methods (3 credits)

Public policy scholars and practitioners have a wide variety of methodological tools at their disposal. Yet, it can be challenging to determine which techniques are best equipped to answer particular research questions, as well as how to fruitfully combine distinct methods. Gaining a familiarity with the discipline's vast methodological "toolkit" is essential to building the knowledge and skills necessary to engage in political and social research—for scholars, policymakers, and practitioners. In this course, students will explore the principle methodological approaches employed in political inquiry—encompassing experimental, quantitative-statistical, and qualitative techniques—and examine how these tools may be productively "mixed" to make descriptive and causal inferences about political phenomena. In addition to learning to evaluate and critique distinct methodological approaches, students will "learn by doing" and gain experience applying various techniques to answer specific research questions. To provide the necessary technical skills for applied research, the course will introduce students to software programs that are commonly used for quantitative and qualitative research. Students will apply the skills and techniques in the context of a semester-long research project, which will include formulating a research question, developing a research design, and engaging in original empirical research (including data collection and data analysis). The project could form the basis of a graduate-level thesis or article manuscript prepared for submission to a peer-reviewed publication.

Prerequisites: POL 111 or POL 113

Restrictions: Enrollment is limited to students with a major, minor, or concentration in International Relations, Political Science or Public Policy.

Attributes: International Relations Course, Undergraduate

POL 470 Research in the Discipline (3 credits)

This course is designated for an independent study project in consultation with and approval from a specific faculty member. Depending on the faculty member, the project will focus on a particular topic of interest in Political Science or International Relations.

Attributes: Undergraduate

POL 490 Global Smarts Internship (3 credits)

Global Smarts is a service-learning internship offered every spring in partnership with the World Affairs Council of Philadelphia (WACP). For the semester, SJU students serve as mentors of middle-school children from under-resourced Philadelphia-area schools who are participating in the WACP's annual Junior Model UN (J MUN) conference. WACP prepares SJU mentors to teach their mentees to act as national diplomats in a mock General Assembly session. At SJU, mentors learn about the UN, its constraints and accomplishments in global politics, and the complexity of constructing peace globally and locally. Because this is a Faith-Justice Service-Learning internship, we consistently process mentors' experiences using key concepts (violence, peace, charity, justice, solidarity, and power) while also developing professional and personal skills.

Attributes: CCC: Mission: Global Citizenship, Faith Justice Course, International Relations Course, Service Learning Course, Undergraduate

POL 491 Philadelphia-Area Internship (3 credits)

The Philadelphia Area Internship Program supports student internships in the public sector, private sector, or in a non-governmental organization (NGO) in the Philadelphia area. Students will complete a total of 130 hours of work, write a resume and sample cover letter, keep a journal, and attend and write about an SJU Career Development Center event. Students who complete the requirements will receive 3 credits for one upper-division course in History, Political Science, or International Relations. Course is open to ALL majors.

Attributes: International Relations Course, Undergraduate

POL 493 Honors Research in Pol Sci I (3 credits)

Majors with a minimum GPA of 3.5 in Political Science courses may apply to the Honors Program to earn College Honors. Applications are due in Spring of the junior year for the right to perform a year-long research project under the supervision of a Political Science Department member. To succeed in the application, the student should be in conversation with that faculty member early on in the junior year. Then, the student works closely with her/his mentor over the course of the senior year to prepare and present a thesis that passes the scrutiny of the mentor, an outside faculty reader with complementary expertise, and a member of the Honors Committee. Specific requirements for the College Honors thesis may be found under "Honors Program". Prior approval from the Honors Program and Department is necessary. Students who complete Departmental Honors are not required to take a POL Capstone Course. One semester of HON research counts for the Capstone Course and the other for an upper division POL course.

Attributes: Undergraduate

POL 494 Honors Research in Pol Sci II (3 credits)

Majors with a minimum GPA of 3.5 in Political Science courses may apply to the Honors Program to earn College Honors. Applications are due in Spring of the junior year for the right to perform a year-long research project under the supervision of a Political Science Department member. To succeed in the application, the student should be in conversation with that faculty member early on in the junior year. Then, the student works closely with her/his mentor over the course of the senior year to prepare and present a thesis that passes the scrutiny of the mentor, an outside faculty reader with complementary expertise, and a member of the Honors Committee. Specific requirements for the College Honors thesis may be found under "Honors Program". Prior approval from the Honors Program and Department is necessary. Students who complete Departmental Honors are not required to take a POL Capstone Course. One semester of HON research counts for the Capstone Course and the other for an upper division POL course.

Attributes: Undergraduate

Psychology (PSY)

PSY 100 Introductory Psychology (3 credits)

This course introduces the student to the research problems, methods, findings, and basic theory that constitute the scientific investigation of human and animal behavior.

Attributes: CCC: Social Science, GEP: Social Science, Undergraduate

PSY 101 Intro Psychology Seminar (3 credits)

This course introduces the student to the research problems, methods, findings, and basic theory that constitute the scientific investigation of human and animal behavior.

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: CCC: Social Science, GEP: Social Science, Undergraduate

PSY 105 Peer Health Education (3 credits)

This course provides an introduction to health education, health promotion, and peer education. Students will develop communication, leadership, facilitation, and presentation skills while exploring topics relevant to the health and well-being of college students. Upon completion of the course, students will be prepared to serve as peer educators in one or more health domains/topics. Students will also be eligible to take the BACCHUS/NASPA Certified Peer Educator (CPE) certifying exam. Upon successful completion of the exam, students will receive the CPE designation. Note: this course does not count toward the psychology major.

Attributes: Undergraduate

PSY 120 Lifespan Development (3 credits)

This course examines the changes that take place in our lives: in our bodies, personalities, ways of thinking, feelings, behavior, relationships, and the roles we play. We will describe these changes and seek to explain why they occur and the influences of heredity and environment. NOTE: Students who take this class cannot have taken, be currently enrolled in, or in the future enroll in PSY 231.

Restrictions: Students cannot enroll who have a major in Psychology.

Attributes: Undergraduate

PSY 122 Psychological Disorders (3 credits)

How do we decide what behaviors constitute a psychological disorder? This course will provide an overview to the study of psychopathology. As an introductory course, it will focus primarily on the description of various psychological disorders, their clinical course, and the current understanding of their causes. NOTE: Students who take this class cannot have taken, be currently enrolled in, or in the future enroll in PSY 232.

Restrictions: Students cannot enroll who have a major in Psychology.

Attributes: Undergraduate

PSY 123 Psychology of Men and Women (3 credits)

Stop being part of the problem and try becoming part of the solution!! Find out what the battle between the sexes, sometimes referred to as "The Longest War," is really about. Explore the nature of the psychological experiences unique to growing up male and female in contemporary society and its effects on behavior and relationships. Current non-technical readings drawn from diverse disciplines (Biology, Sociology, History, as well as Psychology) will serve as the basis of classroom discussions. These will be supplemented by lectures summarizing the latest psychological research on gender similarities and differences.

Attributes: Undergraduate

PSY 124 Human Sexuality (3 credits)

The human sexual experience will be examined openly and objectively from physical, social, and psychological perspectives. Issues of current concern such as pornography, homosexuality, and sexuality and the handicapped will be explored in depth. Lectures and discussions may be supplemented by audio-visual materials and guest speakers.

Attributes: Undergraduate

PSY 125 Forensic Psychology (3 credits)

This course will provide a broad overview of the field of forensic psychology and the numerous ways that the discipline of psychology may be applied to the practice of the law. Forensic psychology focuses on the application of psychological research, methods, and expertise to issues that come before the legal system. The mental disorders that are encountered in forensic evaluations will be considered, along with the manner in which forensic psychologists assist judges and juries in determining criminal responsibility and punishment. Students will learn about the psychological underpinnings of crime; issues around competency to stand trial; issues around the insanity defense, capital murder and the death penalty; issues around child custody matters; jury selection; and interrogation procedures.

Attributes: Undergraduate

PSY 126 Psychology of Culture (3 credits)

How does culture affect human behavior? The aim of this course is to use psychological theory and research to examine culture's effects on people cross-culturally. This course will examine how people are influenced by their culture and how people consider culture in the way they think about and treat others. This course will also focus on facets of cultures, including gender, race, ethnicity, and poverty. In addition, the course will examine how interactions among these facets influence people across-cultures.

Attributes: Undergraduate

PSY 127 Behavioral Economics (3 credits)

This course will explore recent discoveries in human psychology that have transformed our understanding of economics and created the influential new field of behavioral economics. Classical economics assumes that people make rational decisions based on all available information to optimize their well-being. However psychologists have shown that people take mental shortcuts that lead to predictable errors. This class will provide examples of how social scientists apply human decision making theory in a broad array of fields, such as personal finance, governmental programs, and business.

Attributes: Undergraduate

PSY 128 Psychology and Architecture (3 credits)

This course explores the relationships between psychology, architecture, and urban planning. A primary focus will be how the intersection of these disciplines can influence the future of communities and the communities of the future. Students will gain an understanding of how psychological theory can inform the development of successful spaces, buildings, and cities, and thriving and sustainable communities. Current research topics and theories to be covered include environmental psychology, psychology of architecture, and urban anthropology.

Attributes: Undergraduate

PSY 129 Industrial/Organizational Psyc (3 credits)

Industrial/Organizational Psychology is the scientific study of human behavior in organizations and workplaces. The focus of I/O Psychology is both individual and group performance, satisfaction, safety, health and well-being through a variety of quantitative and qualitative methods. By studying worker attitudes and behaviors, I/O psychologists are able to recommend or create improved hiring practices, training programs, feedback systems and management techniques to boost company performance.

Attributes: Undergraduate

PSY 130 Art Therapy (3 credits)

Art therapy uses different forms of creative expression to help people explore and transform feelings, thoughts, and ideas. It can help to process and cope with emotional issues, as well as facilitate self-awareness, understanding, healing, and well-being. Art therapy can be especially useful for people who find it difficult to talk about their thoughts and emotions. In this course, students will examine theories and models of art therapy. Through discussion of readings, sharing of experiences, group work, and art therapy activities, students will increase their understanding of the history, theory, practice, and applications of art therapy in various settings.

Attributes: ARTS Major ILC Courses, CCC: F&P Arts, Design & Creative, GEP: Art/Literature, Undergraduate

PSY 131 Controversies in Psychology (3 credits)

This course will examine major controversial issues throughout the history of psychology. From ancient Greeks arguing about where the mind is to 20th century disputes about how the brain works and beyond, we will address the many philosophical, historical, and biological inputs leading to modern psychology. Colorful characters include: Frankenstein, Mesmer, Darwin, Pavlov, Freud, James, Watson, Binet, Piaget, Skinner, Maslow, and many more. Controversies about eugenics and the treatment of women and minorities in psychology will be addressed as well.

Attributes: Undergraduate

PSY 170 Special Topics in Psychology (1-3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

PSY 190 Intro Research Method Soc Sci (3 credits)

This introductory course in research methods prepares students to understand and apply the techniques and methods of descriptive and inferential research as they are applied to the social sciences. Topics include the scientific method, ethical issues in research, survey design, research design, and basic analysis of data. This foundational course of study will take the student through the various steps of a traditional research design.

Prerequisites: (PSY 100 or PSY 101 or SOC 101) and ENG 101

Attributes: Undergraduate, GEP: Writing Intensive

PSY 191 Applied Stats for Social Sci (3 credits)

This course is an introduction to the basic principles of statistical analyses. Topics will include basic probability theory, types of data, and statistical reasoning. Students will learn common statistical analyses involving differences between means, correlation, and regression.

Prerequisites: PSY 100 or PSY 101

Attributes: Undergraduate

PSY 201 Biological Bases of Behavior (3 credits)

This is an introductory-level course exploring the relationship between human behavior and the functioning of the brain. Topics to be covered include research techniques in neuroscience, the structure and function of the peripheral and central nervous systems, the structure and function of nerve cells, the chemistry of the nervous system, and drug effects in the nervous system.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Attributes: Undergraduate

PSY 205 Neuroscience Foundations (3 credits)

This course will introduce students to the diverse disciplines of the neurosciences, with an emphasis on methodologies and historical research and perspectives. Students will obtain an understanding of the anatomy of the central and peripheral nervous systems, with a specific focus on electrical and chemical cellular transmission, and the pharmacology of synaptic transmission.

Prerequisites: (BIO 102 or BIO 119 or BIO 133 or BS 110 or BS 134 or BS 136 or PSY 201)

Attributes: Undergraduate

PSY 206 Behavioral Neuroscience (3 credits)

In this advanced course, students will explore the neural and hormonal regulation of social behavior. Topics to be covered will include: sleep and other biological rhythms, neurological and psychiatric disorders, emotion, learning and memory, behavioral endocrinology, ingestive behavior, and reproductive behavior.

Prerequisites: PSY 205 or BIO 412

Restrictions: Enrollment is limited to students with a minor in Behavioral Neuroscience.

Attributes: Undergraduate

PSY 207 Cognitive Neuroscience (3 credits)

This course will introduce students to the emerging interdisciplinary field of cognitive neuroscience. Students will learn methodological and investigative techniques and strategies used in research in cognitive neuroscience. Students will be also exposed to current research in psychophysiology and neuroradiology that further understanding of behaviors such as attention, perception, learning and memory, language, reasoning, and consciousness.

Prerequisites: PSY 205 or BIO 412

Attributes: Undergraduate

PSY 208 Human/Animal Relations (3 credits)

Non-human animals play an integral part in lives of humans. This course will explore the important relationship between human and non-human animals. Topics to be covered include: the history of animal domestication, and the influence of animals on human culture and religion. Moreover, the ethical implications of human interactions with animals in the laboratory, in captivity, as livestock, and in the wild will be considered.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Animal Studies or Psychology.

Attributes: Undergraduate

PSY 209 Autism:Co-Occurring Conditions (3 credits)

Autism Spectrum Disorder (ASD) is a developmental and psychiatric disorder characterized by significant difficulties with social interaction, communication, and repetitive behaviors, which is estimated to affect approximately 1 in 68 individuals. This course is designed to examine and review a range of medical, psychiatric, and other conditions which commonly co-occur with ASD. These include genetic disorders, seizure disorders, attention deficit hyperactivity disorder, anxiety disorders, depression, obsessive compulsive disorder, sleep disturbances, gastrointestinal problems, eating disorders, overweight and obesity, and lowered quality of life. We will review and discuss the nature, time-course, impact, assessment, and treatment for each co-occurring condition, as time permits. The ultimate goal of this course is to broaden understanding of the critical role that co-occurring conditions play in the lives of individuals with ASD and their families, as well as in helping us to better understand the causes and characteristics of ASD.

Prerequisites: PSY 100 or PSY 101

Attributes: Undergraduate

PSY 210 Research Methods (3 credits)

This course is an introduction to the techniques and methods of descriptive and inferential research as they are applied to psychological science. Topics include archival research, naturalistic observation, participant-observer research, clinical-case studies, correlational research, quasi-experimental designs, between- and within-subject experimental designs, and factorial-design research. Particular emphasis on ethical issues in psychological research is given.

Prerequisites: (PSY 101 or PSY 100) and (ENG 101 or ENG 100 or WR 101 or WR 101H)

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: CCC: Writing Intensive, Undergraduate, GEP: Writing Intensive

PSY 211 Stats for the Social Sciences (4 credits)

This course is an introduction to the basic principles of statistical analyses, descriptive and inferential, that are used in the social sciences. Topics include measures of central tendency, variability, correlational analyses, regression, estimation, hypothesis testing, and selected parametric and non-parametric tests. Laboratory work will include the use of computer-based statistical packages to aid in analysis and interpretation of discipline-appropriate research data.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 212 Multicultural Psychology (3 credits)

We live in a multicultural society that requires an appropriate understanding of cultural diversity. This course will provide students with a theoretical and practical understanding of the effects of culture on human thinking and behavior. The course considers current theories and research on culture, gender, race and ethnicity with the goal of better understanding the ways in which the multicultural context influences psychological processes. The aim of the course is to achieve a better appreciation of cultural groups and consideration of cultural issues in interpreting social experiences.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: CCC: Diversity, GEP: Diversity Course, Gender Studies Course, Undergraduate

PSY 220 Sensation and Perception (3 credits)

The world around us abounds with all manner of sensory stimuli-visual, olfactory, auditory, tactile, and gustatory. This course will explore the manner in which we internalize this information and use it as knowledge about what is going on around us. Each of the senses will be considered from biological and phenomenological perspectives, and the process by which we derive meaning from sensory activity will be examined. Topics to be covered include object perception, visual attention, music and speech perception, somatosensory processing, taste preferences, and smell recognition.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 221 Animal Learning and Memory (3 credits)

Other than that which is genetically coded, everything we know is derived from and reflects memory for information that we have learned in the past. This course introduces the student to the scientific investigation of the basic processes of learning and memory. Topics of discussion will include the traditional theories, methodologies, and empirical findings of habituation and sensitization, classical conditioning, and instrumental conditioning. In addition, mechanisms of retention, sources of forgetting, and the biological basis of learning and memory processes will be considered.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Animal Studies or Psychology.

Attributes: Undergraduate

PSY 222 Neuropsychology (3 credits)

Neuropsychology will introduce students to understanding human brain/behavior relationships. Emphasis will be placed on commonly used approaches in assessing and measuring human behavior and how the human brain is responsible for cognition, language, memory, spatial processing, emotion, and personality. Students will gain an understanding of principles of brain organization, individual differences, and professional and clinical issues in neuropsychology.

Prerequisites: (PSY 100 or PSY 101 or PS 101 or PS 111) and (BIO 102 or BS 119 or BS 133 or PSY 201)

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 223 Health Psychology (3 credits)

Health psychology is a field that incorporates many sub-disciplines of psychology with modern medicine. This course seeks to provide the student with an understanding of how social, psychological, and biological variables combine to cause illness, and how behavior and environments can be changed to promote health. One important focus of the course concerns understanding the nature of stress and the impact stress has on health.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 224 Drugs, the Brain, & Behavior (3 credits)

How do drugs affect consciousness and behavior? This course will examine the action of many different drugs, both medicinal and illicit, from biological, behavioral, and social perspectives. The relationship between alterations in behavior produced by drug administration and the changes that the drug produces in the functioning of the nervous system will be emphasized. Topics to be covered include routes of drug administration, drug absorption, transport and elimination, mechanisms of drug action, the histories of miscellaneous drugs, and the behavioral and biological activity of alcohol, nicotine, caffeine, the opiates, the hallucinogens, the antipsychotics, amphetamines, and cocaine.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 225 Comparative Animal Behavior (3 credits)

This course examines the evolution and development of animal behavior. Students will gain an understanding of the behavioral diversity and commonalities among animal species. An emphasis will be placed on comparing the characteristics of human behavior with those of other species, with special attention given to the cognitive capabilities of non-human animals.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Animal Studies or Psychology.

Attributes: Undergraduate

PSY 226 Psychology of Emotion (3 credits)

This course will introduce students to major theories and topics of the psychology and biology of emotion. Areas explored include the role of the brain and peripheral physiology in emotion, how emotion is expressed, the role of cognition, cultural differences, social aspects of emotion, development of emotions, and the role of emotion in health and psychopathology.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 227 Cognitive Psychology (3 credits)

Cognitive psychology is the study of how the human mind processes information. Learning and organizing new information, remembering facts and events, recognizing objects, reading, using language, and problem solving are examples of cognitive tasks people perform every day. In this course you will learn about the mental processes underlying these tasks. Particular emphasis will be given to mental representations of information, computational models of mental processes, and applications of cognitive psychology.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 228 Science of Creativity (3 credits)

This course introduces undergraduate students to the scientific exploration of what it means to "be creative." Students will evaluate the evidence that supports the definitions, approaches, assessments, models, and recommendations offered in support of cultivating creativity. The course will emphasize cognitive neuroscience approaches and include critical analysis of major domains of creativity, including musical, visual-artistic, and scientific.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 230 Social Psychology (3 credits)

The discipline of social psychology can be described as the study of the "power of the situation." Although we like to think that our behavior and our attitudes are freely chosen by us, this course illuminates how powerful outside situational forces can be in shaping both. It involves the understanding of how people influence, and are influenced by, others around them; how we form impressions of others and of ourselves; what determines our attraction to others (or lack thereof); why we help one another, and why we hurt one another. In addition to a basic understanding of these phenomena, an equally important goal is to develop critical and integrative ways of thinking about theories and research in social psychology.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Organizational Psychology or Psychology.

Attributes: Undergraduate

PSY 231 Developmental Psychology (3 credits)

This course examines the mechanisms that contribute to psychological growth and change throughout life. The goal of this course is to provide students with an understanding of the influence of biological, cognitive, emotional, social and cultural factors on development from infancy into adulthood. Theories of development and applications to real-world problems will provide a context for understanding how humans change during the life cycle. Lectures and discussions will interweave theory, methodology and research findings about how we develop and demonstrate our abilities to perceive, think, feel, remember, plan, and ultimately realize our potential as human beings. Note: Enrollment is limited to students with a major in Psychology. Students who take this class cannot have taken, be currently enrolled in, or in the future enroll in PSY 120.

Prerequisites: PS 101 or PSY 100 or PS 111 or PSY 101

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 232 Adv. Psychological Disorders (3 credits)

This course will provide an overview to the study of psychological disorders or abnormal behavior. Our current understanding of psychological disorders from biological, behavioral, cognitive, and psychodynamic perspectives will be presented. Attention will be given to the nature, causes, and course of various psychological disorders as well as treatment for specific disorders. Note: Enrollment is limited to students with a major in Psychology. Students who take this class cannot have taken, be currently enrolled in, or in the future enroll in PSY 122.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 233 Adulthood and Aging (3 credits)

Continuing demographic changes occurring globally as well as nationally have accelerated research in and theorizing about heretofore-neglected periods of human development. The 'graying' of the human population has accelerated interest in the topic of adulthood and aging at both the theoretical and empirical levels. This course will explore the adult experience using a life-span perspective and a contextual analysis including contributions from the fields of anthropology, biology, psychology, and sociology.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 234 Psychology of the Self (3 credits)

This course has been designed to provide in-depth considerations of both classic and current issues regarding the self. As a concept, the self is consistently referred to in many fields of psychology. But what is the self and how is it represented? This course will consider the self from a social psychological perspective. Special focus will be on defining the self and identifying the influences that various aspects of the self have on our perceptions, emotions, and behavior.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 235 Psychology of Gender (3 credits)

This course will examine a wide variety of psychological issues concerning gender. Topics will include gender bias in research, theories of gender, gender typing, cultural emphases on gender differences, gender and the self-concept, and psychological phenomena unique to women's and men's experiences.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 236 Ethics in Psychology (3 credits)

Ethics and professional issues in clinical psychology will be addressed in this course. The focus will be on ethical principles as applied to psychological assessment and diagnosis, psychotherapy and clinical judgment, clinical research, and client-patient and student-teacher relationships. Case studies will be used to illustrate ethical and professional issues, as well as examples from clinical practice and modern media.

Prerequisites: (PSY 100 or PSY 101)

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Justice Ethics and the Law , Undergraduate

PSY 237 Child Psychological Disorders (3 credits)

This course will provide a comprehensive introduction to abnormal child psychology. Assessment, diagnosis, and treatment of children and adolescents will be discussed. Specific disorders covered will include attention-deficit/hyperactivity disorder, anxiety disorders of childhood, affective (mood) disorders, conduct disorder and other disruptive behavior disorders, learning disabilities, autism spectrum disorders, and sleep disorders.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 238 Social Development (3 credits)

Social development involves the ways that children grow and interact with others, including parents, peers, siblings and authority figures. This course will cover social development from infancy through adolescence. The course will cover the major theories of social development, as well as issues such as parenting styles, gender development, moral development, aggression and motivation.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 239 Psychology of Media (3 credits)

Every one of us is exposed to, and thus influenced by, some aspect of the media. This course will examine some of the major aspects of the media, including 1) media content, with emphasis upon depictions of gender, age, race, sexuality, violence, advertising, and news, 2) effects of exposure to that content, and 3) who owns and thus controls the content of what we see, hear, and play. As a laboratory course, students will also engage in the full research process, from reviewing the scholarly work of others, formulating an original research hypothesis, testing that hypothesis, and drawing logical conclusions from the data.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 240 Sports Psychology (3 credits)

This course examines the application of psychological theories and research to sports and exercise behaviors. It will provide students with knowledge about psychological factors that affect performance in sports such as motivation, concentration, focus, confidence, anxiety, and relaxation. Students will also be introduced to mental skills that will enhance performance, make athletic participation more enjoyable, and learn skills that can be transferred to other aspects of their lives. Skills to be covered in this class will include: how to set measurable goals and strategies to achieve them, visualization and imagery techniques, leadership, team-building, and how to best cope and recover from injuries.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 241 Brain Injury and Concussion (3 credits)

Brain Injury and Concussion will immerse students in specific areas within the field of neuropsychology, the study of human brain-behavior relationships. Emphasis will be placed on traumatic brain injury (TBI), including moderate-to-severe injuries, as well as mild TBI or concussion. The course will focus on research related to how individuals sustain and recover from moderate-to-severe TBI as well as mild TBI/concussion in youth, collegiate, and professional athletes, with an emphasis on how athletes sustain concussions, how concussions are assessed, treated, and managed, and how return-to-play decision are made. This course will introduce students to research in the field of neuropsychology through primary source material in the form of book chapters and journal articles.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 244 Psychology in Film (3 credits)

This course will develop students' understanding of foundational knowledge in Psychology through a consideration of classic and contemporary films. It will examine current issues and theories in Psychology through the process of film analysis. It will also explore the effects popular cinema has on the attitudes and perceptions of foundational concepts and theories in Psychology.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 250 Adolescent Development (3 credits)

This course emphasizes the physical, social, emotional, and cognitive developmental changes that occur during adolescence. Topics relevant to adolescent development in various contexts, including families and the parent-adolescent relationship, self and identity development, the increasingly important role of peers, school adjustment, and the nature and implications of psychosocial problems will be covered.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 251 Psychology of Prejudice (3 credits)

Given that relations between social groups are an integral part of society, it is important to investigate how and why prejudice can affect interactions between these groups. This course will introduce students to various social psychological frameworks for understanding the origins and consequences of prejudice, and ways to improve relationships between people who come from different social groups. Topics discussed will be applied to a variety of groups (e.g., race, gender, weight, sexual orientation, etc.) and have implications for various settings (e.g., educational, organization, clinical, etc.).

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 252 Behavioral Medicine (3 credits)

Behavioral medicine is the application of behavioral health techniques to the prevention and treatment of health conditions and illness.

Topics covered will include assessment and intervention strategies in healthcare settings, psychologist's role in affecting lifestyle changes (e.g., smoking, obesity), and psychological interventions for medical and psychophysiological disorders (e.g., cardiovascular, cancer, chronic illnesses).

Prerequisites: PSY 100 or PSY 101

Attributes: Undergraduate

PSY 253 Positive Psychology (3 credits)

This course covers the science of positive psychology, focusing on strategies, habits, and characteristics that promote happiness and well-being. Students will examine topics such as positive emotions, resilience, motivation, mindfulness, gratitude, self-control, optimism, and healthy relationships. The course also addresses common misconceptions and misapplications of positive psychology, along with their potential side effects. By the end, students will understand how to use positive psychology to cultivate a more fulfilling, meaningful life, both personally and in their communities.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 260 Primate Psychology (3 credits)

Humans are primates and this course is designed to introduce students to the field of primatology. The three main themes of the course are 1) Humans as primates and the current understanding of human evolution, 2) life history and social behavior of the major groups of primates (prosimians, New World & Old World monkeys, and apes), and, 3) a special emphasis on primate cognition. How does understanding nonhuman primates help us understand humans? Behaviors covered include, social organization, affiliation, dominance and aggression, and communication. Cognition discussed will include problem-solving, tool-use, counting, social cognition (and theory of mind), intention, and other related mental processes.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 261 Psycholinguistics (3 credits)

This course is an introduction to the study of how language is represented in the human mind and what processes are involved in language use, including producing, comprehending, and storing both spoken and written language. Together, we will explore questions such as the following: How do humans store and recognize words? How do we analyze speech? What processes are involved when we speak and read? We will study spontaneously-occurring speech errors and misperceptions and carry out experimental investigations on language production and comprehension. This course is open to students from all academic majors.

Attributes: Undergraduate

PSY 262 First Language Acquisition (3 credits)

Starting before they are even born, most children acquire language with tremendous ease in a very short period of time. It is a remarkable achievement, usually taken for granted unless something goes awry. This course focuses on the acquisition of a first language in infancy and childhood by highlighting issues in various areas of linguistic analysis: sounds, word and sentence meaning, word order and language use in various communicative contexts. We will also focus on different theories that try to account for the cognitive and linguistic processes that together result in first language acquisition as well as atypical language development from which much is learned about the process of first language acquisition. Of benefit and interest to all academic majors, this course is particularly relevant to students in the areas of linguistics, education, autism studies, psychology and health-related areas including speech therapy/speech language pathology.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: CCC: Social Science, Undergraduate

PSY 270 Special Topics in Psychology (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 290 Professional Prep Seminar (1 credit)

What can you do with a degree in Psychology Major? Do you know how to search for an internship or a job? Are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance your knowledge about internships and careers within your major and help you build practical skills through class instruction, assignments, and alumni exposure throughout the semester. This one-credit course meets once a week through the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication, and networking/interviewing.

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 300 Clinical Psychology (3 credits)

This is an advanced course that provides an overview of the field of clinical psychology. Students are expected to have taken Abnormal Psychology and are familiar with the various psychological disorders covered in that course. The primary goals of the Clinical Psychology course are to familiarize students with the history of clinical psychology as a field, including the roles in which clinical psychologists serve and settings in which they work, as well as current issues and debates in the field; provide a foundation in student's understanding of the various theoretical orientations that guide how clinical psychologists approach their work; orient the student to the various types of assessments that are employed to aid in the treatment conceptualization; and help students clarify their own interests and approaches in the mental health field and mapping them to the client populations and presenting problems of interests and the appropriate graduate programs to suit their goals.

Prerequisites: PSY 100 or PSY 101 and PSY 232

Restrictions: Enrollment is limited to students with a concentration in Psychology Clinical.

Attributes: Undergraduate

PSY 301 Psychological Assessment (3 credits)

This course covers the theory, construction, use, and interpretation of the wide range of available psychological, neuropsychological, and educational tests. Tests of intellectual ability, academic achievement, industrial aptitude, and personality and clinical variables will be reviewed. Specific emphasis will be placed on reliability, validity, ethics, the utility of test measures, test administration, and interpretation and communication of test results.

Prerequisites: PSY 232 and PSY 211

Restrictions: Enrollment is limited to students with a concentration in Psychology Clinical.

Attributes: Undergraduate

PSY 302 Counseling Skills (3 credits)

This course provides an in-depth exploration into the theories, techniques, and ethical considerations underpinning effective helping relationships, with a particular emphasis on their applications in counseling and psychotherapy contexts. Students will delve into the fundamental principles and empirical research surrounding helping skills, equipping them with the necessary tools to assist individuals in exploring issues, gaining insight, and taking meaningful action towards personal growth and change. Students will engage in experiential learning activities and role-play exercises aimed at honing their practical skills in helping others. Emphasis will be placed on cultivating self-awareness, empathy, and active listening techniques essential for building rapport and fostering trust in helping relationships. An integral aspect of the course involves critically examining personal biases, beliefs, and societal stigmas surrounding mental health counseling.

Prerequisites: PSY 232

Attributes: Undergraduate

PSY 370 Advanced Topics: Nat Sci I (1-4 credits)

This course will focus on a different topic in psychology from the perspective of the natural sciences each semester that it is scheduled.

Prerequisites: PSY 100 or PSY 101

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 371 Advanced Topics: Nat Sci II (3 credits)

This course will focus on a different topic in psychology from the perspective of the natural sciences each semester that it is scheduled.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 372 Advanced Topics: Soc Sci I (3 credits)

This course will focus on a different topic in psychology from the perspective of the social sciences each semester that it is scheduled.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 373 Advanced Topics: Soc Sci II (3 credits)

This course will focus on a different topic in psychology from the perspective of the social sciences each semester that it is scheduled.

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 374 Independent Study I (3 credits)

The content of the Independent Study is negotiated between student and faculty mentor. The content cannot be that of an existing course in the curriculum unless that course will not be offered during the time that the student completes their program of study. Permission of instructor required.

Prerequisites: PSY 210

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 375 Independent Study II (3 credits)

The content of the Independent Study is negotiated between student and faculty mentor. The content cannot be that of an existing course in the curriculum unless that course will not be offered during the time that the student completes their program of study. Permission of instructor required.

Prerequisites: PSY 210

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 390 Internship I (3 credits)

Internship entails spending eight hours each week (for a total of 112 hours) at a site in which students' work will be supervised and evaluated. Settings include clinical, clinical research, counseling, hospital, educational research, special education, correctional, and industrial facilities. Permission of instructor required.

Prerequisites: PSY 100 or PSY 101 or PS 101 or PS 111

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 391 Internship II (3 credits)

Internship entails spending eight hours each week (for a total of 112 hours) at a site in which students' work will be supervised and evaluated. Settings include clinical, clinical research, counseling, hospital, educational research, special education, correctional, and industrial facilities. Permission of instructor required.

Restrictions: Enrollment limited to students with a class of Junior or Senior. Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 392 Independent Research I (3 credits)

Students are responsible for designing and conducting an original research project under the direction of a faculty mentor. Permission of instructor required.

Prerequisites: PSY 210

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 393 Independent Research II (3 credits)

Students are responsible for designing and conducting an original research project under the direction of a faculty mentor. Permission of instructor required.

Prerequisites: PSY 210

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 470 Special Topics in Psychology (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Students cannot enroll who have a major, minor, or concentration in Psychology.

Attributes: Undergraduate

PSY 491 Research Seminar: Nat Sci I (3 credits)

This course will focus on a different topic in psychology from the perspective of the natural sciences each semester that it is scheduled.

The semester's topic will be treated in depth in a seminar format.

Students will become familiar with research and theory in the area under study using primary source material. Students may also become involved in research projects in the area under study.

Prerequisites: PSY 210 and PSY 211

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 492 Research Seminar: Nat Sci II (3 credits)

This course will focus on a different topic in psychology from the perspective of the natural sciences each semester that it is scheduled.

The semester's topic will be treated in depth in a seminar format.

Students will become familiar with research and theory in the area under study using primary source material. Students may also become involved in research projects in the area under study.

Prerequisites: PSY 210 and PSY 211

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

PSY 493 Research Seminar: Soc Sci I (3 credits)

This course will focus on a different topic in psychology from the perspective of the social sciences each semester that it is scheduled.

The semester's topic will be treated in depth in a seminar format. Students will become familiar with research and theory in the area under study using primary source material. Students may also become involved in research projects in the area under study.

Prerequisites: PSY 210 and PSY 211

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

Attributes: Undergraduate

PSY 494 Research Seminar: Soc Sci II (3 credits)

This course will focus on a different topic in psychology from the perspective of the social sciences each semester that it is scheduled.

The semester's topic will be treated in depth in a seminar format. Students will become familiar with research and theory in the area under study using primary source material. Students may also become involved in research projects in the area under study.

Prerequisites: PSY 210 and PSY 211

Restrictions: Enrollment is limited to students with a major in Psychology.

Attributes: Undergraduate

Radiography (RAD)

RAD 101 Radiographic Procedures I (4 credits)

This is an introductory radiography course which includes fundamentals such as patient positioning, equipment manipulation, terminology and radiographic image review. Students will also be introduced to the requirements of the profession.

RAD 104C Clinical Practice II Clinical (3 credits)

This clinical course is designed to reinforce the fundamentals of performing radiographic procedures. In addition, contrast agents used to enhance anatomical structures will be introduced.

Prerequisites: (RAD 122 or RAD 122C) and RAD 123

Attributes: Undergraduate

RAD 104L Clinical Practice II Lab (0 credits)

This clinical course is designed to reinforce the fundamentals of performing radiographic procedures. In addition, contrast agents used to enhance anatomical structures will be introduced. Students who register for RAD 104 must also register for a RAD 104 lab. For example, if you register for RAD 104 you must, at the same time, register for a section of RAD 104L.

Attributes: Undergraduate

RAD 122C Clinical Practice I Clinical (0 credits)

This clinical course is designed to introduce the student to the fundamentals of radiographic positioning. Basic terminology and radiographic examinations will be emphasized. Students who register for RAD 122 must also register for a RAD 122 clinical. For example, if you register for RAD 122 you must, at the same time, register for a section of RAD 122C.

Attributes: Undergraduate

RAD 122L Clinical Practice I Lab (3 credits)

This clinical course is designed to introduce the student to the fundamentals of radiographic positioning. Basic terminology and radiographic examinations will be emphasized.

Attributes: Undergraduate

RAD 123 Radiographic Procedures II (3-4 credits)

This course is a continued study of radiographic procedures to include appendicular skeleton, axial skeleton, and digestive system anatomy and positioning.

Prerequisites: RAD 101 and RAD 122

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 131 Radiologic Science I (2 credits)

This course will cover basic radiation physics and the radiographic imaging system. The image production process will also be introduced.

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 132 Radiologic Science II (3 credits)

Instruction on the image production process is continued. Establish knowledge of image components and quality. Discuss digital imaging and the principles of radiation protection.

Prerequisites: RAD 131

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 201 Radiographic Procedures III (3 credits)

This course is a study of radiographic anatomy, procedures and equipment manipulation. Trauma, surgical and portable radiography will be presented. Radiographic ethics, pediatrics, and geriatrics will be discussed.

Prerequisites: RAD 123 and RAD 104

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 221 Adv Radiographic Procedures I (4 credits)

This course emphasizes specialized positioning and more advanced imaging procedures. Imaging contrast and pharmacology will be discussed.

Prerequisites: RAD 201

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 222C Clinical Practice III Clinical (0 credits)

This clinical course is designed to allow students to gain proficiency when performing fundamental radiographic procedures. Imaging modifications when performing a non-routine examination and/or contrast administration will be emphasized. Students who register for RAD 222 must also register for a RAD 222 clinical. For example, if you register for RAD 222 you must, at the same time, register for a section of RAD 222C.

Attributes: Undergraduate

RAD 222L Clinical Practice III Lab (5 credits)

This clinical course is designed to allow students to gain proficiency when performing fundamental radiographic procedures. Imaging modifications when performing a non-routine examination and/or contrast administration will be emphasized.

Prerequisites: (RAD 104 or RAD 104L) and RAD 132

Attributes: Undergraduate

RAD 223 Adv Radiographic Procedures II (4 credits)

This course is the study of radiographic pathology and image analysis. Intravenous pyelograms and barium enema procedures will also be presented. In addition, radiographic procedural and science content is reviewed to prepare the student for the American Registry of Radiologic Technologist (ARRT) registry examination.

Prerequisites: RAD 131

RAD 224C Clinical Practice IV (5 credits)

This course is designed for the student to gain proficiency in the imaging examinations taught throughout the radiography curriculum. Image critique and radiographic pathology will be emphasized.

Prerequisites: (RAD 222 or RAD 222L) and RAD 223 (may be taken concurrently) and RAD 240 (may be taken concurrently)

Attributes: Undergraduate

RAD 224L Clinical Practice IV Lab (0 credits)

This course is designed for the student to gain proficiency in the imaging examinations taught throughout the radiography curriculum. Image critique and radiographic pathology will be emphasized. Students who register for RAD 224 must also register for a RAD 224 lab. For example, if you register for RAD 224 you must, at the same time, register for a section of RAD 224L.

Attributes: Undergraduate

RAD 233 Radiologic Science III (1 credit)

Continuation of digital imaging and factors affecting image quality. Introduction to specialized radiographic imaging and equipment. Quality control and quality assurance in radiography are presented.

Prerequisites: RAD 132

Restrictions: Enrollment is limited to students with a major in Radiography.

Attributes: Undergraduate

RAD 240 Radiation Biology (1 credit)

This course includes an overview of cell biology and the damage electromagnetic radiation causes to the cell. In addition, early and late radiation effects on the organ systems are presented.

Prerequisites: RAD 233

RAD 301 Computed Tomography Prin (3 credits)

The course includes in-depth instruction and guidance in the study of the principles of computerized tomography (CT). Successful students will be prepared to take the ARRT CT examination and will also be prepared for entry level practice as a CT technologist. Areas of instruction include imaging processes and procedures, CT physics, patient care and radiation protection processes.

RAD 302 Computed Tomography Clinical (1-5 credits)

This course is designed to provide the technologist with the clinical experience to apply for the ARRT advanced certification CT scan examination. Instruction will emphasize radiation protection, pathology, CT protocols, patient care and contrast media use and preparation explicit to CT scanning.

Prerequisites: RAD 301

RAD 311 Mag Resonance Imaging Theory (3 credits)

The course provides an introduction to magnetic resonance imaging (MRI). Areas of instruction include patient care, imaging procedures and physics, instrumentation, and ARRT MRI registry preparation.

RAD 360 Mammography (3 credits)

This course is designed to provide radiologic technologists with specific education required for advanced certification in mammography. This course includes breast anatomy and physiology, fundamental mammography positioning, pathology and treatment of breast disease and interventional procedures. Additionally, the foundational concepts of both analog and digital mammographic equipment, quality assurance and quality control equipment and film critique will be discussed.

RAD 361C Mammography Clinical (1 credit)

Instruction in this course is designed to provide the radiologic technologist with the clinical experience required for advance certification in mammography. Students will engage in mammography exams, quality control tests, patient education, interventional and special examinations of the breast and radiographic image analysis.

Prerequisites: RAD 360

Attributes: Undergraduate

Real Estate Finance (REF)

REF 170 Special Topics Real Estate Fin (3 credits)

These courses are upper division courses designed to give in-depth coverage to real estate subjects that are not covered in great detail in other courses. The prerequisites and topics selected are at the discretion of the instructor.

Attributes: Undergraduate

REF 270 Special Topics Real Estate Fin (3 credits)

These courses are upper division courses designed to give in-depth coverage to real estate subjects that are not covered in great detail in other courses. The prerequisites and topics selected are at the discretion of the instructor.

Attributes: Undergraduate

REF 301 Commc Real Estate Valuation (3 credits)

This course is designed to allow students to apply their existing Finance skills to commercial real estate analysis and decision-making. Topics covered will include legal issues, appraisal techniques, and leasing. Students will develop and analyze the cash flows and economic returns of commercial real estate properties including office, industrial, retail, multifamily, hotel and land development. Students will also analyze forms of real estate finance ranging from fully amortized constant payment loans, to price-level adjusted mortgages, to bullet loans, to participating mortgages.

Prerequisites: FIN 200 or FIN 225

Attributes: Undergraduate

REF 303 Residential Loans& Investments (3 credits)

This course will allow students to understand the legal, regulatory and economic principles behind residential real estate financing, including its history and importance to the U.S. economy. The course will examine the spectrum of loan products and pricing, and will review the roles of different retail and wholesale originators including banks, mortgage bankers, brokers, and servicers. Students will also learn the roles of all of the parties to a residential real estate transaction. The course will examine the secondary markets, including the structuring, securitization, valuation, distribution, and investors of mortgage backed securities (MBS).

Prerequisites: FIN 200 or FIN 225

Attributes: Undergraduate

REF 370 Spec Topics: Real Estate Fin (3 credits)

These courses are designed to give in-depth coverage to real estate subjects that are not covered in great detail in other courses. The topics selected are at the discretion of the instructor.

Attributes: Undergraduate

REF 400 Commercial Real Estate Dev (3 credits)

This course introduces commercial real estate as an industry comprised of many sectors and property types. Developers are the unifying factor that bring these elements together to create facilities that contribute to their communities and local economies. The course presents the development process from concept, planning, financing, construction, completion, occupancy, management and exit strategy. Students will learn the analysis and critical thinking necessary for a developer to obtain financing, raise investment capital, secure government approvals to complete a successful project.

Prerequisites: REF 301

Attributes: Undergraduate

REF 470 Adv Topics: Real Estate Fin (3 credits)

These courses are upper division courses designed to give in-depth coverage to real estate subjects that are not covered in great detail in other courses. The topics selected are at the discretion of the instructor.

Prerequisites: REF 301

Attributes: Undergraduate

REF 605 Comm. Real Estate Valuation (3 credits)

This course introduces the basic concepts, methods, and tools used in the valuation of commercial real estate, and covers the full spectrum of real estate valuation methods, including appraisal, income capitalization, and discounted cash flow valuation. At the completion of this course, students will be able to apply their existing finance skills to a variety of real estate valuation problems. Students will become familiar with the most common forms of real estate finance including fully amortized constant payment loans, price-level adjusted mortgages, bullet loans, and participating mortgages. Students will also develop and analyze the cash flows and economic returns of commercial real estate properties. Finally, students will gain an understanding of the basic functions of the real estate capital markets.

Prerequisites: FIN 550 (may be taken concurrently)

Attributes: Graduate

REF 606 Real Estate Market Analysis (3 credits)

This course, which is organized into three modules, provides an overview of the Real Estate Market Analysis process. The first module focuses on identifying and understanding local, regional, and national commercial real estate market trends. The second module familiarizes students with the various databases and techniques that are used in commercial real estate market analysis. The final module provides students with an understanding of how competition across the various commercial real estate product types complicates Real Estate Market Analysis. The course identifies the common sources of data used in research studies analyzing trends in sales, lending, and leasing activity.

Prerequisites: FIN 550 (may be taken concurrently)

Attributes: Graduate

REF 610 Real Estate Appraisal (3 credits)

This course introduces three approaches appraisers use to value real property. The course is designed to familiarize students with basic real estate concepts such as property rights, the nature of value, market analysis, and highest and best use. A final project requires students to write an appraisal report for a real income-producing property.

Prerequisites: FIN 550 (may be taken concurrently)

Attributes: Graduate

REF 615 Real Estate Investment Finance (3 credits)

The primary objectives of this course are to: (1) conduct an income property investment analysis on an after tax basis; (2) develop the technical acumen necessary to structure and understand real estate transactions; (3) understand the financial assets securitized by real estate and their risks; and (4) to understand the basics of real estate portfolios and portfolio management. To accomplish these objectives, the course examines techniques for structuring real estate transactions such as lender participations, sale-leasebacks, joint ventures, and real estate syndications. The course also examines the secondary market for mortgages, single-family mortgage backed securities (MBSs), commercial property mortgage backed securities (CMBSSs), and real estate investment trusts (REITs).

Prerequisites: REF 605

Attributes: Graduate

REF 770 Special Topics in Real Estate (3 credits)

This course covers issues and developments of current interest in the field of Real Estate. Specific topics will be announced in the course schedule.

Prerequisites: REF 605

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Religious Studies (REL)

REL 101 Comparative Religion (3 credits)

An Introduction to the comparative study of religion which examines the historical evolution of religions, nature and diversity of religious experience, the concept of a religious world and the diverse types of religious worldviews, the role of myth and ritual in the maintenance of religious worlds, the problem of religious change and the concept of transcendence.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Theology Level 2, Undergraduate

REL 170 Special Topics (3 credits)

Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Certifications differ by section.

Attributes: CCC: Religious Studies, Undergraduate

REL 211 Hebrew Bible (3 credits)

This course will examine the biblical traditions and texts of the Hebrew Scriptures as products of particular historical and cultural communities, and as literary and theological documents.

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 220 Religious Song and Poetry (3 credits)

How do we express love, loyalty, and devotion to people, saints, and God/gods? This class will explore poetry, hymns, pop music, and visual arts that praise various divine beings and religious figures. Our study will include diverse expressions and acts of devotion, the lives of the artists who created them, and their religious and historical contexts. Examples will be taken from Hinduism, Islam, Christianity, Sikhism, Buddhism, and American pop culture (be prepared to share your playlist!).

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 221 Sacred Stuff & Material Religi (3 credits)

Sacred Stuff approaches the study of religious experience through the material world, objects, feelings, and sensations. What does religion feel like? How does it taste or smell? We will explore varieties of religion through our senses and study sacred objects crafted by artists inspired by the divine.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 229 Indigenous Ecologies & Religion (3 credits)

This course offers case studies in relationships between indigenous traditions and their environments. Sample cultures may include African foragers, Pacific islanders, tribes of the Amazon rainforests, Mesoamerican farmers, and First Nations communities in North America. The approach is anthropological and historical. Typical themes are the paleohistory of religion; Traditional Ecological Knowledge; gender roles in food systems; relations between medicinal plants, animals, and shamans; adapting to climate change and colonialism; and ways that environments shape rituals and beliefs. These reveal alternatives to western assumptions that distinguish "natural" from "supernatural" and "science" from "religion." Implications for environmental policy will be explored.

Attributes: CCC: Diversity, CCC: Religious Studies, GEP: Diversity Course, GEP: Religious Difference, Undergraduate

REL 231 Judaism (3 credits)

A comprehensive survey of the development of Judaism from its pre-exilic roots to the present, to include the evolution of its theology, ethics, and traditions. The impact of the modern world upon traditional Judaism; major movements within Judaism today and their beliefs about God, Torah, and Israel.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Theology Level 2, Undergraduate

REL 232 Topics in Ancient Judaism (3 credits)

Study of a selected topic in Judaism in the Persian, Hellenistic, and Roman periods. Sample topics include collections of texts, such as the Dead Sea Scrolls or works of Josephus; regions or cities, such as Judaism in Egypt or Jerusalem; a series of events, such as the Maccabean Revolt; an individual or group, such as the Herodian dynasty; or a theme, such as Judean interactions with imperial powers. Course may be taken more than once for credit as topic changes.

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 233 Sabbath Judaism & Christianity (3 credits)

In our modern lives, it is hard to imagine 'shutting off'. However, the observance of a Sabbath is valued in Judaism and Christianity. This course considers the Sabbath as not just abstention from work but entry into sacred time. It covers the biblical period through the present, and includes diverse forms of observance and claims for its significance. We will study the Sabbath primarily in the Jewish tradition, and explore the tensions between adherence to biblical models and adaptation to new circumstances. We will focus on biblical interpretation as context within which the Sabbath evolved and was (re)defined, and consider the Sabbath as mythological time, as a marker of social identity, and as a practice governed by religious law. We will also consider the Sabbath in the Christian tradition, especially where Christian observance diverges from Jewish observance, such as the shift from Saturday to Sunday.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 234 Jew&Christian Resps Holocaust (3 credits)

The Jewish Holocaust represents the classic negative event of our age, a manifestation of evil transcending the human imagination. This course will examine how Jews and Christians have responded to this event and why it caused changes in both Jewish and Christian self-understandings. The course will introduce students to the personages, issues and events of the Holocaust, before turning to religious and moral issues such as suffering and guilt.

Attributes: CCC: Religious Studies, European Studies Course, Faith Justice Course, GEP: Religious Difference, Theology Level 3, Undergraduate

REL 235 Jerusalem: History & Holiness (3 credits)

The city of Jerusalem has had a nearly unsurpassed historical and religious prominence for three millennia, right up through the present. In this course we will explore Jerusalem from multiple, complementary perspectives. We will consider the history of the city as well as religious developments within the Jewish, Christian, and Muslim traditions. We will begin with biblical Jerusalem and then move forward in time, highlighting periods, events, and ideas that have lasting influence through close studies and discussions of selected topics. We will draw on theoretical approaches to the study of sacred space using tools from the field of comparative religion.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 236 Jews & Christians New Test (3 credits)

In the year 70 AD, Roman legions destroyed Jerusalem. In its aftermath, two distinct religions emerged, Rabbinic Judaism and Christianity, both laying claim to the same biblical tradition. By studying the literature of Jews and Christians in this period, this course explores the process of differentiation and separation between them that in subsequent centuries resulted in their estrangement and hostile relations.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 241 Islam (3 credits)

An introduction to the historical development of Islam together with its basic beliefs and practices, from the time of Muhammad to the modern period. The prophet Muhammad, the Qur'an and Hadith, the Shari'ah, Kalam, Shiism, Sufism, and Islamic modernism will be examined.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Religious Studies, Medieval, Ren & Reform Studies, GEP: Non-Western Studies, GEP: Religious Difference, Theology Level 2, Undergraduate

REL 242 The Quran & Its Interpreters (3 credits)

This course will explore a basic source of Islamic faith and practice, the Quran and its interpretation. We will examine compilation of the Quran, its major themes, and samples from its reception history, both classical and modern. We shall investigate how this 1400-years old text has been interpreted in many different ways, by analyzing legal, theological, mystical, existential, feminist and critical perspectives on it. We shall also make occasional comparisons with the bible and its interpretation. The course will enable the student to have better insight not only on the Quran, but also on the process of interpretation of sacred texts.

Attributes: Africana Studies Course, Asian Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 251 Introduction to Buddhism (3 credits)

As a religion named after the title of its ancient Indian founder, the "Buddha" or the "awakened one," for over two millennia Buddhism has offer numerous paths to spiritual awakening for committed seekers while at the same time adapting itself to a variety of different cultures and addressing the local needs of ordinary people, from kings and emperors to merchants and peasants. Buddhism grew into a pan-Asian religious tradition, developing initially in India but spreading to Southeast Asia, to China, Korea, Japan, Tibet and most recently to the West. This course will be an introduction to the history, teachings and practices of Buddhism with an emphasis on its development in South Asia, its original homeland, but with attention as well as to selected developments in other cultural contexts in Asia and the West. Attention will be given to Buddhist meditation in its various forms, both ancient and modern.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 252 East Asian Buddhism (3 credits)

The focus of this course will be on the form of Buddhism that has been dominant in East Asia, a form known as "Great Vehicle" or Mahayana Buddhism. After quickly examining the origin and development of Buddhism in India this course will examine its development in China in some depth, as well as its spread to Korea and Japan.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 261 Hinduism (3 credits)

A survey of the Hindu religious traditions on the Indian subcontinent with a focus on the period from the Epic (c. 200 BCE-200 CE) until modern times. The major forms of Hindu belief and practice will be covered: Vaishnavism, Shaivism, traditions of the Goddess, and popular village traditions.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 262 Modern Hinduism (3 credits)

This course explores the ideas, beliefs, and practices of lived Hinduism. We will compare and contrast diverse Hindu cultures that are found in rural and urban India, in the United States, and here on campus. Our study will include a variety of examples taken from the expressive arts and architecture, literature, rituals and festivals, fashion and film, current events, online communities and bloggers.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 265 Daoism (3 credits)

In an effort to see and experience Daoist thought and practice on its own terms, approximating the worldview of its practitioners, this course takes an interdisciplinary approach, examining three distinct kinds of religious phenomena: 1) ritual performance, 2) sacred scripture, and 3) art and material culture. Through this interdisciplinary approach, students will learn how to investigate these phenomena according to corresponding sets of methodologies, namely 1) ethnography; 2) translation and hermeneutics; and 3) art-historical and visual and material analyses. Because both scripture and art cannot be removed from liturgy in the Daoist tradition, students will also learn to engage with and employ frameworks from the field of ritual theory, specifically anthropological approaches to ritual practice.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Religious Studies, CCC: Writing Intensive, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 270 Special Topics in Relig Stud (3 credits)

Concentrated focus on a selected theme in theology or religion at an advanced level. Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Certifications differ by section.

Attributes: CCC: Religious Studies, Undergraduate

REL 271 African & Caribbean Religions (3 credits)

An examination of selected indigenous African religious traditions in their native contexts and/or religious traditions of indigenous African origin that have developed in the Caribbean and related contexts outside of Africa. Topics may vary, but representative samples may include a focus on individual systems (such as Haitian Vodou) or phenomena found in a number of systems (such as rites of passage).

Attributes: Africana Studies Course, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Theology Level 2, Undergraduate

REL 272 Indigenous Religions S America (3 credits)

This class will explore the central religious beliefs and practices of diverse indigenous communities in South America both before and after European colonization. Students will discuss such themes as the nature and structure of the created world (cosmology) including communal origin myths, the nature of the gods, spirits and divine figures worshipped and revered, and the form and function of rituals and ritual spaces. Along the way, the class will wrestle with broader questions in the study of religion, such as what exactly can be learned from the archaeological record or from colonial accounts of indigenous belief and practice, religious syncretism, the authenticity of drug induced religious experience, and the relationship between religious authority and social or political power. International Business course.

Attributes: CCC: Religious Studies, GEP: Diversity Course, GEP: Globalization Course, International Business Course, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 275 Religion, Violence & Terrorism (3 credits)

This course will explore when, why, and how religion devolves into justifying violence and terrorism. The course will focus on the following issues: 1) an understanding of the fundamental elements of religion; 2) what constitutes "terrorism"; 3) historical and social catalysts for religious violence; 4) historic and contemporary manifestations of religiously oriented violence and terrorism, both domestic and foreign.

Attributes: CCC: Religious Studies, GEP: Globalization Course, Irish Studies Course, GEP: Religious Difference, Undergraduate

REL 280 Ancient Greek Religions (3 credits)

This course will be an introduction to the world of thought and practice that contemporary scholars call ancient Greek religion. The main materials of the course will be drawn from the ancient Greeks themselves—from poets, artists, playwrights, and mythographers. Emphasis will be placed on the myths and festivals that formed the fabric of ancient Greek religious practice and outlook. Ancient perspectives on cosmos (universe), polis (city and its society), psyche (self) and theos (gods) will be explored.

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 290 Viking Era Ritual & Religion (3 credits)

An examination of the pre-Christian religious beliefs and practices of the diverse Scandinavian peoples of the Viking Age (circa 700 to 1050 CE). With a focus on the surviving myths about Odinn and Frigg, Thor and Sif, Freya, Loki and others, the course will reflect upon Norse perceptions of deity, cosmology (the creation and final destruction of the world), the inner structure of the human person, the role of fate in the lives of the gods and humans, the practice of divination/magic, ritual sacrifice, and communal ethical norms. These ideas and practices will be placed within the context of a rapidly evolving cultural, social and religious context very different from our own, enabling the class to think about questions of religious diversity, truth, and the evolution of religious ideas and practices.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 300 What is Religion (3 credits)

This course is an opportunity for students to be initiated into the critical study of religion. Best described as intensive and experimental, this class offers students an opportunity to analyze classical and contemporary theories of religion. We will challenge attempts to classify an experience as mythic, mystical, magical, functional, or numinous. All readings, evaluations, and discussions will address the contested question, what is religion?

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 310 Welcoming the Stranger (3 credits)

This course will examine how ancient communities grappled with welcoming the stranger and how various communities negotiated interpersonal relations. In addition, the course will focus on how to articulate an ethical response to the issue of migration in light of the diverse theological and philosophical ethical perspectives on the topic. Key themes in the historical and religious traditions will include: the biblical representation of the ger (stranger); ancient comparative hospitality rituals; and legal discourse in rabbinic and contemporary Jewish sources. Key topics in the theological and philosophical ethical traditions will include: distinctions between forced migrants in theory and law— including internally displaced people, asylum seekers, refugees, economic migrants, and ecological/environmental migrants. These distinctions will be explored through both an empirical/legal lens as well as an ethical lens informed by the overlapping consensus of the post-war Universal Declaration of Human Rights tradition and Catholic Social Teaching.

Attributes: CCC: Religious Studies, GEP: Ethics Intensive, GEP: Religious Difference, Undergraduate

REL 321 Religion&Law in the Anc World (3 credits)

This course looks at the world's earliest known law: the law of ancient Sumer, Babylon, Egypt, and other ancient Near Eastern societies. The course goes on to examine the relationship between these legal systems and the legal texts of ancient Israel and Judah found in the Hebrew Bible, as well as other issues related to the study of biblical law. Finally, the course considers the legacy of ancient Near Eastern law and its impact on the development of modern legal institutions and systems.

Attributes: Ancient Studies Course, Classical Studies Course, GEP: Religious Difference, Undergraduate

REL 322 Myth and History in the Bible (3 credits)

This course examines a range of narratives from the Bible and considers how they functioned in the ancient communities from which they come. It looks at the role of myth and the nature of history writing in the ancient world and explores ways to identify both genres in biblical texts. It also examines current debates over what should count as history in the Bible and the impact of archaeological and extra-biblical literary evidence on these debates. The course will focus primarily on narratives from the Hebrew Bible (e.g., creation myths, ancestral and royal legends, political-historical narratives), though some stories from the New Testament may be considered as well. Please note: This course can be used to satisfy the GEP Religious Difference requirement or the GEP Faith and Reason requirement, but not both.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Faith-Reason Course, GEP: Religious Difference, Undergraduate

REL 323 Psalms (3 credits)

The most influential of all Old Testament books for Christian spirituality, the Psalms offer a special glimpse into the religious life of ancient Israel. Placed within their larger historical background, psalms of various types (laments, hymns, royal and wisdom psalms, etc.) will be studied for their literary and religious character. The question of the Psalter's theology as a whole will be addressed as well.

Attributes: Ancient Studies Course, CCC: Religious Studies, Undergraduate

REL 324 Israelite Religion (3 credits)

Combining the evidence of biblical texts and ancient Near Eastern texts, this course analyzes the historical and social context of religion in ancient Israel. Special topics include the worship of different deities; the priesthood and the system of sacrifices in the Temple; the relationship between politics and religion, and some specific religious practices maintained by kings David, Solomon and their successors (such as prophecy, holy war and child sacrifice); popular religious practices (such as devotion to the dead and magic); and the origins and development of monotheism, the concept of the messiah and other ideas central to the origins of Judaism and Christianity.

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Religious Difference

REL 327 Religion & Race in Phila (3 credits)

This course examines the co-constitution of religious beliefs, racial identities, and regional cultures from an historical perspective primarily in the urban Northeast. We will examine how transatlantic and transnational African and European religious traditions (real, imagined, historical, invented) shaped that history. Because this is a religious studies course, we will think about religions as institutions that profoundly influence individual's epistemologies and actions, as well as the communities, societies, and nations, in which they are located. We will understand race as a social construction that emerged in recent centuries in concert with religious (and scientific) ideas about human origins and anthropologies. Most importantly, we will see how these two constructs - "race" and "religion" - developed and evolved in a particular region of the United States to make visible place-based distinctions and geo-cultural histories. A complicated, multi-scalar picture will emerge of the varied ways in which beliefs, identities, and places influence and are implicated by one another.

Prerequisites: ENG 101

Attributes: Africana Studies Course, American Studies Course, CCC: Religious Studies, GEP: Diversity Course, Undergraduate

REL 342 Women in Muslim Tradition (3 credits)

This course will seek to comprehend and explain some of the major aspects of the life and culture of Muslim women. Women are and have always been an integral part of the Muslim society, contrary to what might be generally portrayed and perceived. Far from being a monolithic culture or society, the Muslim world comprises many diverse cultural tendencies, which makes it difficult to generalize. Thus in order to study Muslim women and their status, role and situation, we will touch upon the difference historical, political, and economic forces that have shaped the culture of the Muslim world as a whole. We will be exploring the religious and social issues that have been central during the modern transformation of Muslims societies and will touch upon how Muslim women are portrayed in the media and the ramification of such portrayal.

Attributes: Africana Studies Course, Asian Studies Course, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 343 Reason Science&Faith in Islam (3 credits)

This course has three major parts. In the first part, we shall look at primary sources of Islam tradition, that of Qur'an and hadith, which will give us a starting point as we turn to the ways in which miracles have been discussed in the tradition. In the second part, we shall look at two classical Muslim thinkers, Ghazali and Ibn Rushd, who differed on miracles as well as on the relation between reason and faith. Analyzing their disagreement will offer us critical insights about common sense, science, rationality and dynamics of Quranic interpretation. In the third part, we shall look at contemporary interpretation of miracles as well as the relation between faith and reason by looking at a crucial Muslim thinker, Bediuzzaman Said Nursi, as well as some of the other approaches to science in modern era. In this part we shall also engage with the epistemological and scientific implications of Islamic understandings of miracles with the help of two Western thinkers, David Hume and Charles S. Peirce. In the final portion of the course, students will present their research on the issue of the relation between reason, science and faith in Muslim context. Please note: This course can be used to satisfy the GEP Religious Difference requirement or the GEP Faith and Reason requirement, but not both.

Prerequisites: PHL 154 and (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Faith-Reason Course, Medieval, Ren & Reform Studies, GEP: Religious Difference, Undergraduate

REL 356 Death & Afterlife Chinese Rel (3 credits)

Across regions and millennia, human beings have pondered the perennial question of what happens when we die. This class takes a close look at the fascinating ways this question has been answered in the part of the world now called China. From the very outset, we enter into a world of tombs and transcendence, exploring some of China's earliest burial sites. As the course progresses, we turn to the Daoist quest for immortality, the Buddhist conception of reincarnation, and the Confucian practice of ancestor worship. The class considers points where these worldviews diverge, but takes a more interested look at the places where they have harmonized throughout China's long history. Upon completion of the course, students will have a map of China's afterlife, and an introduction to the beings who preside there, from the Supreme Gods of its Heavens, to the Ten Kings of its Hells.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 358 Yoga: Ancient & Modern Paths to Freedom (3 credits)

In this course we will explore the fascinating world of yoga as it has evolved in South Asia (the Indian subcontinent), where it has for millennia been associated with a pronounced South Asian interest in both "world renunciation," and "Axial Age" value that has significantly shaped the worldviews of at least three religions of South Asian origin: Hinduism, Buddhism and Jainism, as well as in the acquisition of power, both "worldly" and "supernatural." We will also examine how yoga traditions were transformed by India's encounter with the West both during colonial times and during the second half of the 20th century. Issues of particular concern, as we trace these developments, will be the historical and cultural contexts of yoga in South Asia, the relationship between yoga practice and South Asian religious beliefs, in particular traditions of religious renunciation, the role of South Asian constructions of concepts of the role of "body" and "mind" in spiritual practice (and the relationships of health, spirituality and religion), the role of yoga as a symbol of the "spiritual East" in the contexts of colonialism and post-colonial nationalism in India as well as its commodification in the contemporary global environment. We will also be examining yoga's "journey to the West" and its status in contemporary American life by examining the genesis of "modern postural yoga," the form of yoga with which most people are familiar (the form of yoga that focuses on the performance of various yoga postures or asana, such as triangle pose, head stand, etc.) While the focus will be on the specific traditions labeled "yoga," the course will also serve as an introduction of the religious of South Asia, since historically yoga and all its varieties has been embedded in specific South Asian religious worldviews. While some attention will be given to Buddhist forms of yoga, the principal focus will be on the traditions associated with the Vedic and Hindu religious traditions, and their modern transformations.

Attributes: Asian Studies Course, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 359 Meditation, Yoga, and the Dao (3 credits)

Asian Spiritual Practices and their Modern Concepts: What is the purpose of life, and how is this purpose to be realized? This course will examine four influential Asian spiritual traditions that offer a variety of answers to these questions, two of which originated in ancient India (Buddhism and that component of the Hindu religious traditions known as yoga) and two in China (Confucian and Daoist traditions of self-cultivation). Each of these traditions in its own way argues that the true potential of a human being is realized only through a process of transformation, which leads from a condition of deficiency (characterized variously as suffering, ignorance, lack of vitality, imbalance, and ultimately mortality) to a condition of true freedom and happiness. The course will examine these traditions both in their original Asian contexts and in the adaptations in Western culture, paying particular attention to research that provides scientific models for thinking about the value of such transformative practices.

Attributes: CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 360 Religion & Art in East Asia (3 credits)

Vision and Visualization: This class is about ways of seeing in East Asian religions, with an emphasis on the Buddhist and Daoist traditions. It investigates the visual arts of these religious traditions with special attention to how these materials function in the context of ritual practice. Specific topics include the production of mandalas (or sacred circles) and their uses in the visualization practices of China, Tibet, and Japan; the uses of maps, charts, diagrams, and talismans in the Daoist ritual traditions of China and Taiwan; the relationship between sacred texts and ritual visualizations in late imperial Daoism; the religious and ritual dimensions of Chinese landscape painting; and the practices surrounding sacred icons in the Buddhist and Shinto traditions of Japan. In addition to providing a comprehensive introduction to the visual culture of several East Asian religions, this class also asks students to consider the implications these diverse practices have for how we ourselves perceive, understand, and engage with the visual world around us.

Attributes: Asian Studies Course, CCC: Mission: Global Citizenship, CCC: Religious Studies, GEP: Non-Western Studies, GEP: Religious Difference, Undergraduate

REL 370 Spec Topics in Relig Studies (3 credits)

Concentrated focus on a selected theme in theology or religion at an advanced level. Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Certifications vary by section.

Attributes: CCC: Religious Studies, Undergraduate

REL 380 Prophecy in the Ancient World (3 credits)

Who were the ancient prophets, both biblical and non-biblical? When do gods speak directly to humans via prophets, and when is a third-party human intermediary necessary to mediate between that prophet and the ruler? This course will probe the scope of political authority in Mesopotamia, Ancient Israel, and Ancient Greece with a particular focus on the role of prophets and diviners in society. Through critical analysis of a spectrum of ancient sources from Mari (modern-day Syria), Ancient Israel and Judah, and Delphi and Claros (Greece), we will investigate the system of mediation among prophets, intermediaries, and kings to undertake an interdisciplinary study of ancient prophecy.

Attributes: Ancient Studies Course, Classical Studies Course, CCC: Religious Studies, GEP: Religious Difference, Undergraduate

REL 382 Women & Religion in Anc Wrlld (3 credits)

An investigation of issues related to women and gender through case studies from the Ancient Near East and Ancient Israel through Late Antiquity. In addition to literary sources, students will also consider the importance of archaeology in the discussion of ancient religions and women's ritual practices. Primary sources will illustrate issues such as gender identity, difference, sameness, subordination, privilege, cultural dynamics, marginalization, oppression, resistance, and the role of women in historical and social change. Emphasis will be placed on developing epistemological theoretical, and methodological awareness and critical understanding of the implications for the broader study of religion, gender, and human diversity.

Attributes: Ancient Studies Course, CCC: Religious Studies, CCC: Writing Intensive, GEP: Diversity Course, Gender Studies Course, GEP: Religious Difference, Theology Level 3, Undergraduate

REL 384 Jewish & Christian Theologies (3 credits)

The course studies fundamental religious questions as understood from various Jewish and Christian perspectives. Christian and Jewish students will gain an understanding of the other religious community while also deepening their understanding of their own. Other students will encounter the two traditions through a comparative lens. Topics to be discussed include the experience of God; the Bible; how Christians and Jews understand their relationship to God and the world; worship and prayer; and the destiny of the created universe.

Attributes: CCC: Mission: Faith Reason, CCC: Religious Studies, Undergraduate

REL 385 Jesus the Jew in History (3 credits)

For centuries Jesus' Jewish identity was ignored. To understand him and the movement that emerged after him it is essential to study him as a first century Jew. In this course we will engage scholarly research into the historical Jesus and the ancient Jewish context in which he lived. We will consider how he is presented in early Christian writings and analyze how his Jewishness was perceived in later Jewish and Christian thought. Finally, we will consider the important implications of this issue for Jewish-Christian relations.

Attributes: CCC: Religious Studies, Undergraduate

REL 387 Jews&Christians Entwined Histry (3 credits)

Why has the relationship between Christians and Jews been frequently hostile? How have the two communities influenced each other, for good and for ill? Is there a relationship between the Nazi genocide and historical church teaching? Has there been improvement in the two traditions' relationship in recent decades? What are today's pressing challenges? This course will examine all these questions.

Attributes: CCC: Religious Studies, Undergraduate

REL 388 Jewish&Christian Intrprt Bible (3 credits)

Although Jews and Christians share many of the same scriptural books, their respective collections are differently organized and named. Christians refer to their collection as the "Old Testament," while Jews call their texts the "Tanakh" (an acronym for the Hebrew words for Teaching, Prophets, and Writings). Despite, or because of this commonality, Christians and Jews have often battled over these scriptures' meanings. This course explores the ways that Jews and Christians have interpreted key texts, separately and together, over two millennia of learning from and disputing with each other. It also examines why the Bible has been a source of conflict between the two groups, with a focus on certain key passages, and why that is currently changing - as evidenced in recent official Catholic instructions.

Attributes: CCC: Mission: Faith Reason, CCC: Religious Studies, Undergraduate

REL 392 Directed Readings in Religion (3 credits)

A study of significant themes or issues in Theology or Religious Studies under the direction of faculty in the department. Frequent consultations and written reports are required. Prior written permission of the instructor and approval from the chair is required.

Attributes: CCC: Religious Studies, Undergraduate

REL 395 Approaches toStudy of Religion (3 credits)

A selected survey of the variety of theories and methodological approaches employed in the modern academic study of religion. Approaches to be examined in class include the psychological, sociological, anthropological, archeological, theological, feminist, and socio-biological. Classic thinkers may be included, but most of the course will focus on authors who represent recent developments, such as the new evolutionary approaches to religion. Course work will emphasize direct engagement with the writings of the major theorists themselves (reading and analysis of primary texts).

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Religious Studies, GEP: Faith-Reason Course, Undergraduate

REL 470 Spec Topics in Religs Studies (3 credits)

Concentrated focus on a selected theme in theology or religion at a highly-advanced level. Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Certifications vary by section.

Attributes: CCC: Religious Studies, Undergraduate

REL 491 Intern in Religious Studies I (3 credits)

This course is an experiential learning experience in which students work 10 hours per week (total 130 hours) in an organization related to the Religious Studies. The internship is a way to see how different areas of religious studies are used "on the ground" in public, private, non-profit, community, and church-related organizations. In addition to their hours, students must keep a journal, meet regularly with their faculty adviser, and complete a final essay that connects their learning experience in the internship to their other coursework and the goals of the major. For the required application, please see the department chair.

Attributes: CCC: Religious Studies, Undergraduate

REL 492 Intern in Religious Studies II (3 credits)

This course is an experiential learning experience in which students work 10 hours per week (total 130 hours) in an organization related to the Religious Studies. The internship is a way to see how different areas of religious studies are used "on the ground" in public, private, non-profit, community, and church-related organizations. In addition to their hours, students must keep a journal, meet regularly with their faculty adviser, and complete a final essay that connects their learning experience in the internship to their other coursework and the goals of the major. For the required application, please see the department chair.

Attributes: CCC: Religious Studies, Undergraduate

REL 493 Ind Research in Religion (3 credits)

Directed independent reading and research supported by discussion with other students and instructors. Open to senior theology majors and minors and other senior students by permission of the Chair.

Attributes: CCC: Religious Studies, Undergraduate

REL 494 Ind Research in Religion (3 credits)

Directed independent reading and research supported by discussion with other students and instructors. Open to senior theology majors and minors and other senior students by permission of the Chair.

Attributes: CCC: Religious Studies, Undergraduate

REL 495 Theory & Method Study Religion (3 credits)

A survey of a wide array of theories and methods employed in the modern study of religion, such as psychological, sociological, anthropological, phenomenological, feminist, socio-biological, and other approaches. Both classic and recent theoretical models will be discussed, with special interest in current methodological developments in the academic study of religion. Emphasis will be placed on direct engagement with the writings of the major theorists themselves. Open to junior and senior theology majors and minors and other junior and senior students by permission of the Chair.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Religious Studies, GEP: Faith-Reason Course, Undergraduate

Respiratory Care (RCP)

RCP 110 Respiratory Care Proc I (3 credits)

Basic bedside respiratory care procedures, medications, and the role of the respiratory therapist in the care of the patient will be presented in this course.

Attributes: Undergraduate

RCP 110L Respiratory Care Lab I (3 credits)

This course will provide an opportunity for students to demonstrate competency in basic respiratory procedures and medications administered in the lab and clinical setting. Students who register for RCP 110 must also register for a RCP 110 laboratory. For example, if you register for RCP 110 you must, at the same time, register for a section of RCP 110L.

Attributes: Undergraduate

RCP 130 Respiratory Care Theory I (2 credits)

This course focuses on the broader concepts and diseases which involve the respiratory therapist. It will cover gas laws and application to the pulmonary system, gas safety and storage systems, oximetry and arterial blood gas sampling and assessment, obstructive lung diseases, infectious diseases and application of microbiology.

Attributes: Undergraduate

RCP 140 Respiratory Care Proc II (2 credits)

This is a continuation of bedside respiratory care procedure concepts. Students will be introduced to advanced respiratory procedures and assessment.

Prerequisites: RCP 110 and (RCP 120 or RCP 110L) and RCP 130

RCP 140L Respiratory Care Lab II (1 credit)

This course will require the student to demonstrate competency in the procedural concepts of arterial blood gas sampling, airway insertion, suctioning and non-invasive ventilation. The student will have directed instruction at the bedside with their instructor. Students who register for RCP 140 must also register for a RCP 140 laboratory. For example, if you register for RCP 140 you must, at the same time, register for a section of RCP 140L.

Prerequisites: RCP 130

RCP 160 Respiratory Care Theory II (2 credits)

This course covers the cardiopulmonary physiology and concepts of spontaneous ventilation, non-invasive and invasive mechanical ventilation

Prerequisites: RCP 130

RCP 201 Entry Level Review (2 credits)

This course will focus on the students' preparation for the entry-level Respiratory Therapist Exam. Respiratory care in non-hospital sites will be discussed.

Prerequisites: RCP 140 and RCP 150 and RCP 160

RCP 210 Respiratory Care Proc III (3 credits)

This course will discuss the procedures used in pulmonary diagnostic measurements from bedside to PFT lab. Various diagnostic and other respiratory care procedures used in critical care and with mechanical ventilators will be reviewed.

Prerequisites: RCP 140

RCP 210L Respiratory Care Lab III (2 credits)

This course will require the student to demonstrate competency in the procedural concepts including bedside weaning measurements; PFT calibration and measurement; and ventilator initiation, set up, circuit change and monitoring. Students will practice procedures in the clinical simulation laboratory and at the bedside. Students who register for RCP 210 must also register for a RCP 210 laboratory. For example, if you register for RCP 210 you must, at the same time, register for a section of RCP 210L.

Prerequisites: RCP 140 and RCP 150 and RCP 160

RCP 230 Respiratory Care Theory III (2 credits)

This course will cover adult non-infectious diseases and application of mechanical ventilation to patients with chronic lung disease. Pediatric and neonatal diseases will be covered as they apply to respiratory care.

Prerequisites: RCP 140 and RCP 150 and RCP 160

RCP 240C RC Clinical Level I (2 credits)

This clinical will require the student to apply entry-level theory and procedures in the delivery of respiratory care at the bedside on the medical/surgical units.

Prerequisites: RCP 140 and RCP 150 and RCP 160

Attributes: Undergraduate

RCP 251 RC Proc & Diagnostics IV (3 credits)

Advanced pulmonary diagnostics and interpretation will be addressed. Additionally, mechanical ventilation and respiratory care of neonatal and pediatric patients will be discussed.

Prerequisites: RCP 210 and RCP 260 (may be taken concurrently)

RCP 260C Resp Care Lab IV Clinical (0 credits)

Clinical Portion of RCP 260L

Attributes: Undergraduate

RCP 260L Respiratory Care Lab IV (3 credits)

Students will develop competency in the procedural concepts of neonatal and pediatric respiratory care. Additionally, students will apply this knowledge in neonatal/adult critical care clinical settings.

Prerequisites: RCP 220 and RCP 240 and RCP 251 (may be taken concurrently)

RCP 271 RC Theory & Applic IV (3 credits)

Students will explore topics in neonatal care, critical care pharmacology, hemodynamics, cardiology, and hyperbaric oxygen therapy.

Prerequisites: RCP 230 and RCP 260

RCP 280 Adv Level Resp Care Review (2 credits)

This course will include a review of the basic respiratory therapist exam and prepare the student for the advanced respiratory therapist exams. Students must pass simulated credential exams.

Prerequisites: RCP 271

RCP 290 RC Clinical Level II (4 credits)

Students will have extensive clinical experience in adult critical care, neonatal and pediatrics.

Prerequisites: RCP 271 and RCP 251 and RCP 260

Risk Management & Insurance (RMI)

RMI 150 Nat Disast & Com Recov (3 credits)

The goal of this course is to empower students to use primary and secondary sources to investigate community recovery from natural disasters. The research will highlight the economics and social impact of insurance. Specifically, students will compare and contrast community recovery from different types of natural disasters while evaluating the successes and/or struggle of insurance products in aiding community recovery from natural disasters. Does not satisfy any major or minor Risk Management & Insurance requirement. Does not satisfy any free elective credit.

Attributes: First-Year Seminar, Undergraduate

RMI 170 Special Topics (3 credits)

Topic and content varies from semester to semester.

Attributes: Undergraduate

RMI 200 Introduction to Insurance (3 credits)

This course is the introductory course of the risk management and insurance program. It also covers the insurance component of the financial planning track. The focus of the course is to introduce the students to the terminology of insurance. To understand insurance, students need to review contract law and agency relationships. Also provided is an overview of the financial services industry. Once these areas have been covered, the course will examine personal property and liability insurance, commercial property and general liability insurance. In addition, there will be a discussion of employee benefits, medical plans, and social insurance programs. This course is also approved under The Institutes Collegiate Studies for CPCU program for CPCU 500.

Attributes: Undergraduate

RMI 270 Special Topics (3 credits)

Topic and content varies from semester to semester.

Attributes: Undergraduate

RMI 300 Property and Casualty (3 credits)

This course addresses the property and casualty insurance business, markets, and types of companies. The course provides a review of the commercial property and casualty insurance products with a particular focus on the underlying exposure to loss, insurance policy coverage, and exclusions. In addition this course analyzes the Property/Casualty market and explores current issues in the Property/Casualty insurance industry. This course is closely aligned with the industry designation exam, CPCU 557. This course is also approved under The Institutes Collegiate Studies for CPCU program.

Prerequisites: RMI 200

Attributes: GEP. Ethics Intensive, Undergraduate

RMI 301 Corporate Risk Management (3 credits)

This course provides a survey of risk management theory and practice as it relates to corporate risk management. The course then takes a detailed examination of the value proposition for corporate risk management (for individuals as well as corporations). The course then has students apply the risk management process to a publicly-traded corporation. The course guides students through a risk financing simulation exercise, optimizing hedges given practical constraints for individual risks as well as for collections of risks. The course explores disaster recovery strategies by working through real-world examples. The course concludes with motivating the principles of enterprise risk management by examining both the advantages and potential pitfalls associated with developing portfolio models of the firm's risks. This course is aligned with the industry designation exam, ARM 54.

Prerequisites: (FIN 200 or FIN 225) and (DSS 210 or MAT 118 or MAT 128 or MAT 321 or MAT 322)

Attributes: Undergraduate

RMI 306 Intro to Probability in Insura (3 credits)

This course and RMI 307, Applied Probability and Statistics in Insurance, provide a two semester study of probability and statistics used in insurance and risk management. RMI 306 covers basic probability theory, Bayes Theorem and discrete random variables. Applications of Binomial, Hypergeometric, Poisson, Geometric, Negative Binomial, and Uniform distributions will be used to solve problems in insurance and risk management.

Prerequisites: MAT 161 and MAT 162 and DSS 210

Attributes: Undergraduate

RMI 307 Applied Prob & Stats in Insura (3 credits)

This is the second course covering probability and statistics used in insurance and risk management. RMI 307 covers continuous random variables, multivariate distributions and density functions representing an insurance loss. Students will be able to apply continuous distributions such as uniform, exponential, Gamma, Normal, and lognormal to generate expected frequency of loss and predict claim probability. Moment generating functions with continuous random variables, simulation of continuous distributions and mixed distributions will be used to solve problems in risk management and insurance.

Prerequisites: RMI 306

Attributes: Undergraduate

RMI 310 Insurance Company Operations (3 credits)

The course covers how property-casualty insurance functions work together to create and deliver products. The various functions covered include: Underwriting; Marketing and Distribution; Risk Control and Premium Auditing; Claims; Actuarial Operations; Information Technology; Reinsurance; and Regulation. This course is closely aligned with the industry designation exam, CPCU 520. This course is also approved under The Institutes Collegiate Studies for CPCU program.

Prerequisites: RMI 200

Attributes: Undergraduate

RMI 321 Insurance Law & Cyber Liability (3 credits)

This course will focus on Insurance Law and Managing Cyber Risk from an Enterprise Risk Management perspective. The goal is for students to understand the best practices embraced by leaders in handling Cyber Risk and understanding the legal obligations associated with Insurance Law.

Prerequisites: RMI 200 or (FIN 200 and DSS 210)

Attributes: Undergraduate

RMI 330 Insurance Data & Analytics (3 credits)

This course explores the evolving role of data and analytics in the insurance industry, providing foundational knowledge for data-driven decision-making. Topics include big data, predictive analytics, and modeling techniques in underwriting, claims, and risk management. Through a team-based project using real industry data, students will gain hands-on experience in assessing data quality, interpreting analytical results, and effectively communicating data-driven conclusions to support business decision-making.

Prerequisites: DSS 210 and RMI 200

Attributes: Undergraduate

RMI 340 Employee Benefits (3 credits)

This course will provide an overview of employee benefits including retirement plans such as 401(k) and profit sharing plans, group life and health plans, disability insurance, and flexible benefit programs. Individual life and health products will also be discussed.

Prerequisites: RMI 200 and (FIN 200 or FIN 225)

Attributes: Undergraduate

RMI 370 Topics in Risk Mgt & Insurance (3 credits)

This course is designed to give greater coverage to those risk management and insurance topics that are not covered in great detail in other courses. The topics selected are at the discretion of the instructor.

Prerequisites: RMI 200 or (FIN 200 and DSS 210)

Attributes: Undergraduate

RMI 400 Underwriting (3 credits)

This course covers property and casualty underwriting through the principles of underwriting; strategic underwriting techniques; the insurance production environment; and insurance agency management tools and processes. Students will learn to assess whether to accept insurance risks (or groups of risks) and at what price. Prerequisite may be taken concurrently.

Prerequisites: RMI 300 (may be taken concurrently)

Attributes: Undergraduate

RMI 406 Adv Insurance Financial Models (3 credits)

This course covers advanced topics from finance (derivative securities and corporate financial models) from a quantitative perspective. RMI 406 covers the topics in actuarial exam IFM.

Prerequisites: (FIN 225 and RMI 307)

Attributes: Undergraduate

RMI 410 Enterprise Risk Management (3 credits)

This course will cover the latest methodologies in enterprise risk management (ERM) and how they are implemented in practice. Enterprise risk management (ERM) is a significant advancement in the field of risk management, addressing limitations with the traditional, "siloed" approach to risk management. ERM provides a better framework for fundamental risk-return decision-making at the highest levels of the organization. This course will address extracting information from risk experts; converting information from risk experts into quantitative ERM information; and quantifying risks using a value-based ERM model. RMI 301 prerequisite may be taken concurrently upon Instructor's or Department Chair's approval.

Prerequisites: RMI 301

Attributes: Undergraduate

RMI 415 Strategic Transformation RMI (3 credits)

This case-based course will introduce students to analytical frameworks in which insurance organizations can develop business strategies and innovations to remain competitive in response to changing business conditions. Students will apply their knowledge through a team-based project that will evaluate real-world insurance applications.

Prerequisites: FIN 200 and DSS 210 and (RMI 300 or RMI 310)

Attributes: Undergraduate

RMI 420 Alternative Risk Financing (3 credits)

The course focuses on evaluating the value impact of risk financing options. The course covers developing risk financing strategies, evaluating risk financing options (after-tax, NPV), offshore financing, role of reinsurance, history of alternative risk financing, forecasting risk loss, capital market functions, forming captive insurance companies. The course's projects rely heavily on Excel as a tool to evaluate and model risk financing options - using both simulated and real-world data. This course is closely aligned with the risk management industry designation exam, ARM 56. This course is also approved under The Institutes Collegiate Studies for CPCU program.

Prerequisites: RMI 301

Attributes: Undergraduate

RMI 470 Adv Topics: Risk Mgmt & Insura (3 credits)

These courses are upper division courses designed to give greater coverage to those risk management and insurance topics that are not covered in great detail in other courses. The topics selected are at the discretion of the instructor.

Prerequisites: RMI 200 and FIN 200 and (DSS 210 or MAT 118 or MAT 128 or MAT 322)

Restrictions: Enrollment limited to students in the Finance department.

Attributes: Undergraduate

RMI 493 Individual Research in RMI (3 credits)

Independent study may be approved to allow a student to pursue an in-depth study of an RMI topic. Acceptable Independent Study topics include traditional research/reading programs as well as rigorous pre-approved internship programs with an appropriate academic component, as defined by the Department chair.

Prerequisites: RMI 200 and FIN 200 and DSS 210

Restrictions: Enrollment limited to students with a class of Junior or Senior.

Attributes: Undergraduate

Social Work (SWK)

SWK 510 Human Development & Diversity (3 credits)

This course implements a generalist framework to prepare students for practice with individuals across the lifespan. Culturally-responsive theories explaining the influence of societal interactions and the impact of broader social systems will be discussed in relation to social work practice.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 540 Ethics & Generalist Practice (3 credits)

This course is designed to provide foundational knowledge and practice skills for generalist level social work practitioners. Legal and ethical issues will be discussed as guiding factors for practice with individuals, families, groups, communities, and organizations. Students will engage in self-reflective processes and gain insight about the importance of supervision and consultation to guide professional decision-making in on-site and virtual settings.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 541 Individuals Families & Groups (3 credits)

This course will prepare students with culturally-responsive social work practice skills to support the well-being of individuals, families, and small groups. Students will learn cultural humility skills to manage biases such as critical reflection. Culturally- responsive engagement skills and acknowledging clients as experts in their own lived experiences will be emphasized.

Prerequisites: SWK 510 and SWK 540 and SWK 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 550 Clinical Assessment I (3 credits)

This course is designed to introduce students to the purpose and development of clinical assessment and diagnostic tools in social service settings. The role of human behavior and person-in-environment theories, and strengths-based approaches will be discussed in relation to assessment tools. The concepts of bias, personal values and beliefs will be explored in relation to diagnostic processes.

Prerequisites: SWK 510 and SWK 540 and SWK 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 560 Human Rights & Social Justice (3 credits)

This course introduces students to social work practice and the intersections of diversity and forms of injustice in a global context. Intersections of diversity are discussed in relation to human rights, social justice, historical and contemporary forms of oppression. Theoretical perspectives and practice strategies for addressing factors including social, financial, and environmental justice and promoting human rights will be emphasized.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 561 Organizations & Community I (3 credits)

This course highlights the processes and functions of communities and capacity building, organizational development, interprofessional conceptual frameworks, and culturally-responsive practice with organizations and communities. Concepts of bias, power, privilege, and professional self-reflection will be discussed.

Prerequisites: SWK 510 and SWK 540 and SWK 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 565 Data Equity (3 credits)

This course explores the role of social workers as consumers of research to inform practice decisions. Introductory research concepts pertaining to knowledge development and scientific methods will be discussed. Descriptive and inferential statistics concepts will be practiced and interpreted. Students will learn to critically examine research reports from an ethics-based and culturally-inclusive lens.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 570 Special Topics in Social Work (3 credits)

Topics will vary according to the semester in which the class is offered.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 580 Practicum Seminar I (3 credits)

Practicum is defined as the signature pedagogy or primary method of teaching social work knowledge, skills, and abilities in social work education. The generalist practicum integrates your theoretical and conceptual knowledge from courses and provides the opportunity for you to apply it within a community setting. The integration of theory, knowledge, and practice within a community setting exemplifies the competency-based framework designed for social work education. Graduate-level social work students are required to complete 400 structured practicum hours across two semesters while successfully demonstrating generalist-level practice competencies. The practicum experience includes 200 hours of experience in a community setting per semester (SWK 580 and SWK 581) and weekly seminars facilitated by the instructor. Practicum seminars are used to process field experiences, promote reflection and growth, apply ethical standards, and engage in consultation with your Seminar Instructor and MSW program peers in a group setting. The practicum experience must take place in a community setting that meets the social work education standards and is coordinated by the MSW Practicum Director.

Prerequisites: SWK 510 and SWK 540 and SWK 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 581 Practicum Seminar II (3 credits)

Practicum is defined as the signature pedagogy or primary method of teaching social work knowledge, skills, and abilities in social work education. The generalist practicum integrates your theoretical and conceptual knowledge from courses and provides the opportunity for you to apply it within a community setting. The integration of theory, knowledge, and practice within a community setting exemplifies the competency-based framework designed for social work education. Graduate-level social work students are required to complete 400 structured practicum hours across two semesters while successfully demonstrating generalist-level practice competencies. The practicum experience includes 200 hours of experience in a community setting per semester (SWK 580 and SWK 581) and weekly seminars facilitated by the instructor. Practicum seminars are used to process field experiences, promote reflection and growth, apply ethical standards, and engage in consultation with your Seminar Instructor and MSW program peers in a group setting. The practicum experience must take place in a community setting that meets the social work education standards and is coordinated by the MSW Practicum Director.

Prerequisites: SWK 580

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 591 Social Policy & Change (3 credits)

This course provides an overview of the history, structure, functions, and impact of social programs and policies from a contemporary perspective. Students will examine the intricacies and influences of comparable policies across the global environment from a cultural lens. Issues of social justice are discussed in relation to social work practice, policy development and analysis, and social change.

Prerequisites: SWK 510 and SWK 540 and SWK 560

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 600 Integrative Seminar (3 credits)

This integrative seminar course is designed to prepare newly admitted Advanced Standing students for the advanced generalist year of study. This course synthesizes the generalist curriculum and presents it through the lens of evidence-based practice with culturally diverse populations. Students will critically examine research reports from an ethics-based and culturally-inclusive lens, connect them with biopsychosocial-spiritual assessments, and situate them within the client and practitioner's cultural, community, organizational, and policy context. Content including ethical standards, anti-racist and anti-oppressive frameworks in social work, and practicum preparation for advanced generalist practice will be addressed.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 620 Small Groups II (3 credits)

This clinical course builds upon generalist human behavior and social environment theories and introductory group practice skills through the use of assessment and diagnostic screening procedures for therapy groups. Clinical intervention theories and strategies in group practice will be discussed and applied in relation to group stages, termination, and post-group maintenance. Diversity considerations will be emphasized in group screening, facilitation, and evaluation processes. Group evaluation procedures will be applied to improve group practice effectiveness in clinical settings.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 641 Leadership & Supervision (3 credits)

This course is designed to examine leadership strategies, clinical supervision theories, and entrepreneurship skills in the development of for-profit and nonprofit organizations. Key management functions and staff development strategies will be discussed. Core leadership skills for promoting diversity, equity, and inclusion in the work setting will be emphasized.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 642 Clinical Assessment II (3 credits)

This clinical course builds upon the generalist curriculum through the integration of theory, assessment, diagnosis, and advanced practice skills. In-depth analysis of symptoms and etiology of mental health diagnoses through case analyses will take place. Students will learn the harmful impact of upcoding and downcoding in relation to diagnoses, the role of third party providers, and the various uses of clinical assessment beyond diagnostic procedures. Evidence-based and evidence-informed treatment procedures will be emphasized. Culturally-inclusive assessment methods, the role of spirituality in relation to human behavior, mental health and well-being will be discussed. Concepts including self-care, compassion fatigue, and vicarious trauma in relation to social worker well-being will be addressed.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 660 Individuals & Families II (3 credits)

This clinical course builds upon and extends the generalist framework through the development of advanced knowledge and skills for intervening with individuals and families. Evidence-based and evidence-informed practice models are implemented from a culturally-responsive perspective. The fundamentals of trauma-informed practice, brief intervention approaches, and advanced clinical skills are emphasized.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 661 Organizations & Community II (3 credits)

This course is designed for skill development including grant writing, building community and organizational program sustainability strategies. Culturally responsive, evidence-informed interventions to achieve community and organizational goals will be addressed. Interprofessional strategies for advocacy on behalf of constituencies will be emphasized.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 670 School-Based Practice (3 credits)

This course aims to integrate an analytic understanding of the role of school social workers, an appreciation of school social workers' current and historical contributions to K-12 education, societal values underlying their role and an understanding of intervention in the school using a variety of modalities. It incorporates antiracist and anti-oppressive principles of practice. It focuses on situating social work practice in the school setting, the policies that intersect with social work in the school context, and the steps involved in creating a system of care that includes direct service, consultation, advocacy, program development, evaluation, and the social worker's role in the special education process. This course also addresses the relationship of social workers with stakeholders in the school, family and community systems.

Attributes: Graduate

SWK 671 Disability Justice & Practice (3 credits)

This course is designed to deepen your understanding of disability and its relevance to social work. We will discuss disability's recent socio-political history, models of disability, and current policy issues at the national, state, and local level. Emphasis will be placed on how those policies and their implications for practice affect peoples' daily lives. This course will engage a broad range of topics that are foundational to social work practice with people with disabilities, including activism for policy change, person-centered practice, employment, housing and home and community based services, institutional and sexual violence, education and transition to adulthood. We will discuss the disability rights framework as well as a disability justice framework and learn from a diverse group of visiting practitioners, scholars, and advocates about the connections between current policy issues and social services in practice. This course will facilitate critical reflection on your own professional stance in relation to these contemporary issues and trends.

Attributes: Graduate

SWK 672 Drug Use & Abuse (3 credits)

This course is designed to develop social work practice competency with people who use drugs. Using a critical and ecosystemic perspective, the course will interrogate the role of incarceration and center the importance of humility and compassion in treatment of problematic substance use. Students will develop capacity in assessing for substance use disorders, using evidence-based interventions, and treatment planning for diverse groups.

Attributes: Graduate

SWK 674 Trauma-Informed & Liberatory Prac (3 credits)

This course offers an in-depth exploration of trauma, extending beyond individual diagnoses to examine collective and psychosocial dimensions within historical and cultural contexts. This course will review a spectrum of traumatic experiences, covering their prevalence, factors influencing risk and protection, their impacts, and the pathways to recovery. Drawing upon liberation frameworks, students analyze how structural violence, racism, colonialism, and globalization intersect to impact marginalized communities. Through the perspectives of scholars such as Fanon, Freire, hooks, Hill-Collins, and Martín-Baró, students will explore multiple epistemic points of view to deepen their understanding of trauma and empower them to effect positive societal change.

Prerequisites: SWK 580 or SWK 600

Attributes: Graduate

SWK 680 Practicum Seminar III (4 credits)

The advanced generalist practicum is designed to build upon and extend the knowledge and skills learned during the generalist curriculum. Advanced year social work students are required to complete 500 structured practicum hours across two semesters while successfully demonstrating advanced generalist-level practice behaviors. The practicum experience includes 250 hours of experience in a community setting per semester (SWK 680 and SWK 681) and weekly seminars facilitated by the instructor. Practicum seminars are used to process practice experiences, promote reflection and growth, apply ethical standards, and engage in consultation with your Seminar Instructor and MSW program peers in a group setting. The advanced practicum experience must take place in a community setting that meets the social work education standards for advanced generalist practice and is coordinated by the MSW Practicum Director.

Prerequisites: SWK 581 or SWK 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 681 Practicum Seminar IV (4 credits)

The advanced generalist practicum is designed to build upon and extend the knowledge and skills learned during the generalist curriculum. Advanced year social work students are required to complete 500 structured practicum hours across two semesters while successfully demonstrating advanced generalist-level practice behaviors. The practicum experience includes 250 hours of experience in a community setting per semester (SWK 680 and SWK 681) and weekly seminars facilitated by the instructor. Practicum seminars are used to process practice experiences, promote reflection and growth, apply ethical standards, and engage in consultation with your Seminar Instructor and MSW program peers in a group setting. The advanced practicum experience must take place in a community setting that meets the social work education standards for advanced generalist practice and is coordinated by the MSW Practicum Director.

Prerequisites: SWK 680

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SWK 695 Program & Practice Evaluation (3 credits)

This course is designed to engage students in the application of research skills to inform and improve social work practice and programs. Program evaluation methods will be used to analyze practice and program outcomes to advance social work approaches and enhance organizational policies. Anti-racist and anti-oppressive practices in research procedures will be emphasized.

Prerequisites: SWK 680

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Sociology (SOC)

SOC 101 Intro to Sociology (3 credits)

Introduction to the scientific approach to the study of society, including the study of social structures; studies such topics as how we acquire self-identity, gender, our behavior in groups, bureaucracies, stereotyping, the role of the state, survey research, culture, and collective behavior. This course can count towards public policy and health equity & social justice minors.

Attributes: CCC: Diversity, CCC: Social Science, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 102 Social Problems (3 credits)

A sociological analysis of contemporary social issues including economic crises, concentration of wealth, poverty, crime, sexism, race and ethnic relations, mental illness, population growth, war and peace, and relations with other countries. This course can count towards public policy minor.

Attributes: American Studies Course, CCC: Diversity, CCC: Social Science, GEP: Diversity Course, Faith Justice Course, Gender Studies Course, GEP: Social Science, Undergraduate

SOC 103 Intro to Anthropology (3 credits)

This is an introductory course in anthropology, which can be defined as the holistic study of the human species. We will spend time examining the four fields of anthropology: archaeology, physical/biological anthropology, linguistic and cultural anthropology, and their various contributions to understanding the human condition. This course can count towards health equity & social justice minor.

Attributes: CCC: Diversity, CCC: Social Science, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 118 Statistics in Social Sciences (3 credits)

This course teaches students how to choose, use, and interpret statistical tools. Topics include measuring continuous and categorical data, examining central tendency and dispersion, describing distributions, presenting visual trends, estimating associations between variables, and testing hypotheses. We will use Excel software to manage data, conduct statistical analyses, and report results. Labs and exams will emphasize application of methods to social science research.

Attributes: Undergraduate

SOC 170 Special Topics in Sociology (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

SOC 190 Strategies for Success (1 credit)

Our class is designed to provide students with the tools needed to thrive and succeed at SJU and in your major. We will focus on the development and application of college-level study skills, personal success strategies, and the use of campus resources that enhance individual student achievement. Topics discussed will include: learning styles, study techniques, note-taking, test-taking, effective writing and reading, time management, career and educational planning, personal wellness and finance, and interpersonal skill development. We will investigate the variety of offices and resources available to students across campus, as well as how to use some of the more common software systems (Canvas, Starfish, Google Applications, etc). Successfully completing SOC 190 is required of all incoming Freshmen students majoring in Sociology or Criminal Justice.

Attributes: Undergraduate

SOC 202 Advanced Social Problems (3 credits)

This is the second course of a two-course service-learning sequence that explores contemporary social problems in society—their inception, consequences, and methods of modification and eradication. In comprehending the social and philosophical background concerning contemporary social problems, students will acquire an appreciation of the complexity involved in defining social problems and a greater understanding of the social structure itself. Students will strive to understand how social problems are identified and the social systems which are involved. Some of the issues we will address include-binge drinking, addiction, hate crimes, intimate partner violence, and “hooking up.” To obtain a full understanding of each issue, we will continually ask several questions: How was this identified as a social problem? What is the history of this issue? What are the structural causes of this problem? How can it be eradicated? Which social groups or institutions are affected by this problem? What groups benefit by the existence of this problem? What are the most popular arguments surrounding this issue? By answering these questions, we will develop a greater understanding of the social problems facing American society.

Attributes: American Studies Course, CCC: Diversity, GEP: Diversity Course, Faith Justice Course, Gender Studies Course, Service Learning Course, Undergraduate

SOC 204 Cultural Diversity (3 credits)

This course will focus on cultural competence and cultural humility. We will examine how race, ethnicity, gender, class, and other dominant-minority relations, impact people's lived experiences in the US. Students will identify skills that lead to effective interactions with people from different backgrounds, and engage in self-reflection and personal growth.

Attributes: CCC: Diversity, Undergraduate

SOC 205 Ethnic & Minority Relations (3 credits)

This course provides a systemic analysis of relationships between dominant and minority groups. While a significant portion of the course focuses on ethnic and racial stratification in the U.S., it also provides a cross-national examination. Our analysis will highlight the universality of human interaction and its range of consequences, including the creation, facilitation, and maintenance of systems of privilege and oppression, as well as resistance to systemic inequities. As part of our discussion, we will focus on the importance of an intersectional lens in examining and working to address ethnoracial stratification, as individuals carry multiple identities; these identities shape individual and social group experiences and outcomes, including their interactions with each other and social institutions. We will conclude the course with a debrief about the content discussed throughout the semester.

Attributes: CCC: Diversity, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 206 Theories of Crime (3 credits)

The goal of this course is to examine the current state of criminological theory. It examines the efforts of criminologists in various academic disciplines to explain the cause of crime. Traditional theories will also be discussed.

Prerequisites: SOC 101 or SOC 102

Attributes: Criminal Justice Course, Justice Ethics and the Law , Undergraduate

SOC 207 Juvenile Justice (3 credits)

A study of delinquency and its causes, with attention to both social-psychological and structural-theoretical frameworks.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Criminal Justice Course, Justice Ethics and the Law , Undergraduate

SOC 208 Sociology of Gender (3 credits)

The study of the learned patterns of behavior of males and females in the United States and cross-culturally; topics include hormonal and sex differences, gender socialization, the contemporary women's movement; special emphasis is placed upon the connection of sexism, racism, and class inequality.

Attributes: American Studies Course, CCC: Diversity, GEP: Diversity Course, Gender Studies Course, GEP: Social Science, Undergraduate

SOC 209 Intimate Relations (3 credits)

Examines family life in the United States, its cross-cultural and historical antecedents; current changes and family process, including courtship and marriage in contemporary society.

Attributes: CCC: Diversity, Criminal Justice Course, Gender Studies Course, GEP: Social Science, Undergraduate

SOC 210 Criminal Law (3 credits)

This course addresses substantive criminal law, focusing on its origins and goals, the various categories of crimes, including the elements required to prove individuals' culpability, the available defenses to criminal charges, and the applicable punishments for those who commit offenses.

Attributes: Criminal Justice Course, Undergraduate

SOC 211 Classical Sociological Theory (3 credits)

This course examines the scholars who shaped the field of sociology. The class examines the background of classical sociological thinkers and the social forces that shaped their writing. It looks at how the industrial revolution, the decreasing power of religious organizations, the rise of science, and the growth of capitalism all influenced the founding of sociology. The class also examines the tensions between structures and agency that shape human behavior and will look at how cultural and economic forces increase, perpetuate, and challenge social inequalities.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Undergraduate

SOC 215 Gender, Race, and Justice (3 credits)

Using insights from the disciplines of anthropology, sociology, and history, this course will examine how race, class, and gender shape our lived experiences related to justice. The course will also explore the ways in which theoretical and academic knowledge can be integrated with personal and political action in our communities. This course can count towards health equity & social justice minor.

SOC 216 Alcohol, Drugs & Society (3 credits)

This course explores a sociological approach to substance use and its impact on contemporary American society. What social factors such as gender, race, and class shape substance use? How do major social institutions such as criminal justice, education, and health care deal with substance use? What public policies and programs exist to regulate substance use, and how well do they work? Examples of topics discussed include women and substance use, college student binge drinking, substance use on the national agenda, and the community impact of crack cocaine.

Attributes: Criminal Justice Course, GEP: Social Science, Undergraduate

SOC 217 Mental Health & Society (3 credits)

This course examines the connections between mental health and society. What are the major forms of mental and behavioral health and illness? How widespread are mental disorders and what predicts their occurrence? What impact do they have on society and institutions such as health care and criminal justice? What professions and organizations treat mental disorders? This course can count towards health equity & social justice minor.

Attributes: American Studies Course, Criminal Justice Course, GEP. Social Science, Undergraduate

SOC 219 Social Deviance (3 credits)

This course examines examples of deviance, e.g., the Holocaust, state terror and torture, and mental illness. It explores how laypersons and experts conceptualize deviance, how definitions of deviance change, who labels behavior deviant, and the consequences for those labeled deviant.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Criminal Justice Course, Undergraduate

SOC 225 Intro to American CJ (3 credits)

This course provides an introduction to the criminal justice system in the U.S. The primary goal of this course is to foster a general understanding of the functions and impact of the 3 components of the criminal justice system: police, courts, and corrections. In addressing these components, we will examine each component from the due process and crime control perspectives of criminal justice. Due process stresses individual rights while crime control stresses the protection of the society at large. Some of the topics that we will cover include policing, the courts, incarceration and alternative sanctions, the War on Drugs, and the War on Terrorism. The course will conclude with a discussion of the future of criminal justice.

Attributes: American Studies Course, GEP. Social Science, Justice Ethics and the Law , Undergraduate

SOC 232 Sociology of Human Sexuality (3 credits)

This course examines anthropological and sociological perspectives on human sexuality. Among the topics to be covered: reproductive ritual; deviant patterns of sexual behavior; ideologies of sexuality; legal shaping of sexual behavior; and the methods by which we obtain good information on sexual behavior. This course can count towards health equity & social justice minor.

Attributes: Gender Studies Course, Undergraduate

SOC 233 Queer Studies (3 credits)

This course examines contemporary LGBTQ++ life through a sociological lens. Gender and sexuality are deeply personal facets of our lives, and also profoundly related to our experiences, social position, and outcomes in society, functioning both as a source of stratification and a source of community. Drawing on both theoretical and empirical works, we will discuss definitional and language issues (for example, who and what is queer?) and patterns in American society related to LGBTQ++ people, including health outcomes, socioeconomic outcomes, family formation, and educational experiences. Readings will draw primarily from sociological studies but will include some interdisciplinary work. This course is open to all students; the course takes as given the worth of identity locations across gender and sexuality spectrums.

Attributes: Undergraduate

SOC 252 Media & Popular Culture (3 credits)

This course will examine the organization of contemporary media and popular culture from a variety of sociological perspectives. Particular attention will be paid to the production and consumption of popular music, talk shows, and sporting events. There will be discussion on how fads spread through society, how our identities are shaped by and mediated through popular culture, and why the media focuses so much attention on seemingly mundane events. This class will examine how recent technological changes influence how we consume popular culture. We will utilize discussions of Nike, Netflix, Starbucks, videogames, nightlife in Philadelphia, Shakespeare, and digital gambling to understand how popular culture is organized.

Attributes: GEP. Social Science, Undergraduate

SOC 253 Race and Social Justice (3 credits)

In this course we will examine the issue of social justice as it pertains to race and ethnicity. The course will address the social and cultural constructions of race and ethnicity and their effects on social institutions, interpersonal relationships, and quality of life primarily in the U.S., but also abroad. Specifically, we will focus on how advantages and disadvantages are distributed among individuals and societies, why this process occurs, and how we can work to achieve balance and equality. As part of our discussions, we will focus on the contributions of racial and ethnic minorities in our changing social, economic, political, and legal institutions by examining controversial topics central to debates on racial justice and policy. This course can count towards public policy and health equity & social justice minors.

Attributes: Africana Studies Course, Criminal Justice Course, GEP. Diversity Course, GEP. Social Science, Undergraduate

SOC 260 Language and the Law (3 credits)

This course is an introduction to linguistic issues that influence interaction in a variety of legal contexts. It explores the role of language used in court cases and police investigations while paying special attention to particular discourse contexts such as courtroom talk, interpreter interactions and police interrogations/ interviews. Particular emphasis will be placed on recognizing and understanding ethical issues related to linguistic sources of disadvantage before the law for both educated and uneducated native speakers, minority speakers and non-native speakers of a given language. This course will help prepare students for careers in which a particular sensitivity to, and understanding of, the use of language is vital. By looking closely at areas studied by linguists, we will seek to uncover the role and the ethical nature of oral and written interactions that take place in the legal field. These linguistic issues affect the concept of justice as well as its application in the legal system and also influence how humans are perceived and, in turn, treated by those who apply the law (police officers, lawyers, judges, etc.). This course fulfills a requirement in the Sociology and Criminal Justice majors/minors

Attributes: CCC: Mission: Ethics Social Justice, Criminal Justice Course, GEP. Ethics Intensive, Justice Ethics and the Law , Undergraduate

SOC 262 White Collar Crime (3 credits)

This course is designed to give the student an understanding of the meaning of white collar crime and the types of activities in which white collar criminals engage. Initially, the lectures focus on the development of a comprehensive definition of white collar crime and then, having established this foundation, turn to the variety of white collar crimes in the U.S. today.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Criminal Justice Course, GEP. Social Science, Undergraduate

SOC 264 Criminal Courts & Procedures (3 credits)

An analysis of the legal and practice problems presented in the administration of criminal justice from investigation to post-conviction review. Subjects include right to counsel, law of arrest, search and seizure, police interrogation and confessions, prosecutorial discretion, plea bargaining, bail, and juries. Case method used. Suggested for pre-law students.

Attributes: Criminal Justice Course, GEP: Social Science, Justice Ethics and the Law , Undergraduate

SOC 265 Sociology of Education (3 credits)

Schools are the center of major contemporary social questions: Who benefits come from going to college, and is it worth the high cost? Are standardized tests helpful for measuring accomplishment or potential? Are students from particular schools, states, or family backgrounds doing better than others? Sociology of education tackles these kinds of questions by examining the many roles that schools and school actors play, from socializing individuals to reproducing status over generations. This class provides an introduction to American education. Readings focus on primary and secondary education, with a focus on education's role in stratification, namely the way that schools provide advantages or disadvantages to individuals according to particular characteristics, most commonly race/ethnicity, class, and gender.

Attributes: CCC: Diversity, Criminal Justice Course, GEP: Social Science, Undergraduate

SOC 267 Introduction to Corrections (3 credits)

An analysis of the history and development of modern correctional systems. The focus will be on the corrections process as experienced by both offender and official. Special topics will include prisoner rights, litigation, women and corrections, and juveniles and the correctional process. Cross-cultural perspectives and recent correctional innovations will also be examined in order to give the student a comprehensive view.

Prerequisites: SOC 101 or SOC 102

Attributes: Criminal Justice Course, GEP: Social Science, Justice Ethics and the Law , Undergraduate

SOC 270 Special Topics (3 credits)

Course content determined by instructor. This course number/title will be given to new courses being offered within the academic year that are not listed in the catalog. The course will explore some topic related to sociology or criminal justice, focusing on the role of institutions in explaining human behavior.

Attributes: Undergraduate

SOC 271 Police Procedures (3 credits)

Introduce principles and concepts of police operations and procedures.

Attributes: Criminal Justice Course, Undergraduate

SOC 285 Sociology of Medicine (3 credits)

This course is designed to give the student a general introduction to the myriad ways culture, society, and organizations impact medicine and health care. This course is designed to give the student a general introduction to the material and there are no prerequisites for the course. Students will cover topics as diverse as the institution and profession of medicine, the practice of medical care, and the social factors that contribute to sickness and well-being. While we will not cover everything, we will attempt to cover as much of the field as possible through four central thematic units: (1) the organization of development of the profession of medicine, (2) the delivery of health-care, (3) social cultural factors in defining health, and (4) the social causes of illness. Throughout the course, our discussions will be designed to understand the social science and policy implications for the field of medicine and encourage the application of such ideas and concepts to a variety of contemporary healthcare issues. This course can count towards health equity & social justice minor.

Attributes: Undergraduate

SOC 290 Professional Prep Seminar (1 credit)

What can you do with a degree in sociology or criminal justice? Do you know how to search for an internship or a job? Are you ready to apply for a position should the opportunity arise? This professional development seminar will enhance your knowledge about internships and careers within your major and help you build practical skills through class instruction, assignments, and alumni exposure throughout the semester. This one-credit course meets once a week throughout the semester to provide practical instruction and skills in areas that include internship search and application, resume/cover letter prep, professional communication, and networking/interviewing.

Restrictions: Enrollment is limited to Undergraduate Division level students.

SOC 291 IDEAL Scholarship (3 credits)

This course is designed for students who have been accepted into the IDEAL learning program and will provide a framework for thinking about college broadly and the sociology and criminal justice majors specifically. Students will learn key concepts and skill sets that support their academic and life goals. The course also supports the development of community among department majors.

Attributes: Undergraduate

SOC 292 IDEAL Leadership and Purpose (1 credit)

This course is designed for students who have been accepted into the IDEAL learning program. It brings together skills training in leadership with vision- and goal-setting for purpose. A college education offers many opportunities and resources. Accordingly, each person has strengths to contribute to the campus community, but figuring out what strengths and how to do so takes reflective work and honing of skills. In this course, students will engage in reflective practices to develop a vision of their college purpose and how to contribute to the college community, building skills in leadership and knowledge about related opportunities through SJU and beyond.

Attributes: Undergraduate

SOC 301 Community Organizing for Just. (3 credits)

How should one respond in the face of social injustice? What strategies should groups adopt in organizing to make positive social change? What kind of foundation is useful and prophetic for promoting justice? This course will consider the framework, methods, and practices of faith-based community organizing for responding to social injustice. Students will examine theological and sociological roots of faith-based community organizing as a response to injustice. Students will also integrate course learning with a community organizing action project.

Attributes: Faith Justice Course, Undergraduate

SOC 305 Social Epidemiology (3 credits)

Social epidemiology examines the social determinants of health at the individual, community, and population levels. In this seminar, we will discuss the theories that explain how society influences individuals and the research studies that show social patterns in health outcomes. We will learn how research on social factors and health is done, primarily through observational data and statistical analyses. We will consider how social epidemiology can influence health services and health policies. Throughout the course, you will apply these tools and perspectives to current issues that are important to you. This course can count towards health equity & social justice minor.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Social Science, Undergraduate

SOC 306 Medical Anthropology (3 credits)

The course surveys the field of medical anthropology, which is commonly viewed as a branch of socio-cultural anthropology that intersects with the concerns of biological (physical) anthropology, medicine, and public health. The course also explores how medical anthropology addresses social issues such as health disparities and culturally competent healthcare. This course can count towards health equity & social justice minor.

Attributes: GEP: Diversity Course, Undergraduate

SOC 307 Death and Dying (3 credits)

The study of the phases of death and dying, and the social reactions and social implications, to examine the dominant approach to death, dying, and loss in the United States today, and in Western cultures in general, in relation to approaches taken by people in other cultures, subcultures, and in other places or times. This course can count towards health equity & social justice minor.

Attributes: GEP: Social Science, Undergraduate

SOC 312 Research Methods (3 credits)

Presents the main ways of gathering social scientific information, e.g., questionnaires, interviews, observation, experiments, content analysis, etc.; Specific emphasis placed on the ethical considerations when conducting social science research. This course can count towards public policy minor.

Prerequisites: SOC 101 or SOC 102

Attributes: Undergraduate

SOC 313 Data Analysis (3 credits)

This course introduces students to the Statistical Package for the Social Sciences (SPSS) for conducting quantitative data analysis. Using the General Social Survey and other publicly available data sets, we will learn about transforming variables, conducting univariate and bivariate analysis, requesting descriptive and inferential statistics, and learning how to interpret these statistics. Emphasis is on doing the analysis and presenting the analysis for research projects. This course is a prerequisite for Seminar, SOC 495. This course can count towards public policy minor.

Prerequisites: ENG 101 or ENG 100 or WR 101 or WR 101H

Attributes: CCC: Writing Intensive, Undergraduate

SOC 314 Cultures of Latin America (3 credits)

This course is an anthropological introduction to the history, culture, and people of Latin America. We will begin the semester by examining three major pre-Hispanic civilizations: The Aztecs, the Incas and the Mayas, which will include a tour of the Meso-American collection at the Penn Museum. The lectures, films, readings, museum exhibits and field trips will explore issues such as politics, indigenous identities, human rights, health, healing, migration, and artistic expression in the culturally and geographically diverse region known as Latin America.

Attributes: Latin American Studies Course, Undergraduate

SOC 315 Comparative Cultures-Ecuador (3 credits)

The purpose of this course is for students to learn about, be exposed to, and become immersed in a culture different from their own. During the semester, students will explore a variety of topics and texts related to Ecuadorian culture and society, as well as prepare for the study tour departure. The majority of the study tour will be spent in Cuenca, Ecuador where students will experience Ecuador's culture, history, indigeneity, language, literature, and environment through classroom instruction, a homestay with a local family, visits to local museums and institutions, as well as day trips to Incan ruins, a national park, and an indigenous community. Students will apply a sociological perspective and theoretical frameworks to understand Ecuadorian culture and daily routines as they compare and contrast them to their own.

Attributes: Undergraduate

SOC 316 Fair Trade Coffee: Study Tour (3 credits)

This course is designed to trace the path of fair trade coffee beans as they are grown in a cooperative in Nicaragua or Costa Rica until they reach a consumers' cup in the United States. In this class, we will examine the labor-intensive activities that go into producing a cup of coffee, the environmental impacts of producing shade grown and organic coffees, and the economic benefits that farmers receive for growing coffee in Central America. We will travel to Central America and live alongside coffee farmers who are growing fair trade coffee.

Attributes: Faith Justice Course, GEP: Social Science, Latin American Studies Course, Undergraduate

SOC 317 Sociolinguistics (3 credits)

(Please see LIN 317 for description)

Attributes: CCC: Diversity, Communication Studies ILC Crs, CCC: Social Science, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 323 Health and Society (3 credits)

An overview of health care in the United States with attention to its historical antecedents; definitions of illnesses; examines the effect of social factors on the occurrence of illness and its treatment; studies the organization of health facilities. Satisfies Gender Studies Minor requirement. This course can count towards health equity & social justice minor.

Attributes: CCC: Diversity, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 325 Women and Health (3 credits)

This course will look at the health industry from a feminist perspective. We will examine the role of women in providing health care, gender differences in the care given to patients, and health care issues specific to women. The course will also consider race and class differences among women working in and served by the health care industry. This course can count towards health equity & social justice minor.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Undergraduate

SOC 330 Sociology of Cities (3 credits)

What makes some neighborhoods in cities great places to live? Why do other neighborhoods struggle? In this course, we will learn how sociologists study cities, what social policies have affected cities, how inequalities along the lines of race/ethnicity and social class have shaped cities, how cities might fit into a sustainable vision for the future, and what we can learn from cities in other countries. By the end of the course, students will understand what can be done to improve the quality of life for families in urban neighborhoods.

Attributes: CCC: Diversity, CCC: Social Science, GEP: Diversity Course, Undergraduate

SOC 334 Miscarriages of Justice (3 credits)

As a social institution created and staffed by humans, the legal system makes mistakes. From eyewitness misidentification to false confessions, prosecutorial misconduct to wrongful convictions, errors both large and small, intentional or not, happen with alarming frequency in the American legal system. This course will examine the breadth of the injustices across the system and what, if anything, can be done about them.

Attributes: Criminal Justice Course, Faith Justice Course, Undergraduate

SOC 335 Classes and Power in US (3 credits)

Examines the social, economic, and political inequalities in the United States; analyzes causes of social stratification; studies social mobility and the existence of a power elite.

Attributes: CCC: Diversity, Criminal Justice Course, GEP: Social Science, Undergraduate

SOC 338 Police and the Community (3 credits)

This course will examine factors contributing to cooperation or friction between law enforcement personnel and the community. Emphasis will be placed on political, social and economic forces which influence this. Policies addressing this problem will be reviewed.

Prerequisites: SOC 101 or SOC 102 or SOC 202

Attributes: Criminal Justice Course, Undergraduate

SOC 340 The Ethical Consumer (3 credits)

The recent "ethical turn" in markets has led to a growing number of products that give proceeds to a charitable or altruistic cause. We see Pink Ribbons when we shop for a car, fair trade coffee at Wal-Mart, and product (RED) clothing at the GAP. Many of these products and brands are creating significant social change; others are "greenwashing" or "fairwashing" markets by making false promises. In this course we will read research from sociology, marketing, and psychology to understand the consumer behavior of individuals trying to change the world through shopping; we will examine the strengths and weaknesses of these "consumer-dependent" social movements; and we will examine the social forces that led "shopping for a cause" to become a modern means for creating social change. This course will conclude with an attempt to put our ideas into practice through group-projects designed to raise funds for local mission-driven businesses such as Cal's Cupcakes, Alex's Lemonade, or Fair Trade retailers.

Attributes: American Studies Course, GEP: Ethics Intensive, GEP: Social Science, Undergraduate

SOC 345 Law and Social Policy (3 credits)

An exploration of various dimensions of the relationship between law and social policy in contemporary U.S. society. In assessing how judicial opinions and legislative efforts affect social relations and institutional arrangements, inquiry is focused upon: (1) the ways in which social problems become defined as legal issues; (2) the forces which shape the initiation and ultimate formulation of legislative acts designed to affect public policy; (3) the role which cultural values and assumptions play in framing legal arguments and influencing judicial opinions and remedial programs; (4) the issue of compliance and the ways in which it is measured and enforced, and (5) the strengths and limitations of the law as a means of achieving specific social policy objectives.

Attributes: Criminal Justice Course, GEP: Social Science, Justice Ethics and the Law, Undergraduate

SOC 349 Poverty Ethics & Social Policy (3 credits)

This course offers an overview of poverty in the United States, explores the ethical principles surrounding poverty and our response to it, and examines social policies that seek to ameliorate poverty. Students will work on a semester-long academic assignment which will engage them in one aspect of poverty and social policy. This course can count towards public policy minor.

Prerequisites: PHL 154 and (SOC 101 or SOC 102)

Attributes: CCC: Mission: Ethics Social Justice, CCC: Social Science, GEP: Ethics Intensive, Undergraduate

SOC 353 Restorative Justice (3 credits)

This course places restorative justice theory into practice. Students will learn and become proficient in several restorative practices including peacemaking circles, sentencing circles, restorative conferencing, reparative boards, youth aid panels and victim offender mediation. As an experiential course, students will participate in all of the practices throughout the semester. Some of these practices are hundreds of years old. Many criminal justice agencies see potential widespread application. The skills taught in this course can be used in any situation involving conflict.

Attributes: Criminal Justice Course, Undergraduate

SOC 355 Race, Crime & CJ (3 credits)

This course examines the topic of race and ethnicity in relation to crime and criminal justice processing. More specifically, we focus on several issues: 1) the role of privilege and marginalization in the context of race and ethnicity and the criminal justice system; 2) the impact of these factors on intergroup relationships generally and the responses of the criminal justice system to criminal behavior, victimization, and employment within the criminal justice field; 3) how the responses of the criminal justice system affect the lives of offenders, victims, and agents of the criminal justice system for various racial/ethnic groups; 4) the current patterns of crime and victimization in relation to race/ethnicity? In addressing these questions, it is important to note that this is an upper-level sociology/criminal justice course, so do not expect it to be lecture driven, although some lectures will be presented. Much of the course work will revolve around class discussions and written analysis of the readings. This course can count towards public policy minor.

Attributes: Criminal Justice Course, GEP: Diversity Course, GEP: Social Science, Undergraduate

SOC 356 Gender, Crime & CJ (3 credits)

An examination of the gendered nature of criminal victimization, offending, and criminal justice processing from a feminist sociological perspective. Students will read and critically evaluate in a seminar format feminist criminologists' analyses of topics such as fear of crime, gangs, prostitution, corporate violence against women, policing, and corrections. Special emphasis will be given to the intersections of gender, racial/ethnic and social class inequalities.

Attributes: Criminal Justice Course, GEP. Diversity Course, Gender Studies Course, GEP. Social Science, Undergraduate

SOC 360 Sociology of Law (3 credits)

An analysis of contemporary theories of law; examines the statements of the main exponents of the consensus, pluralist, elitist, and dialectical models of law creation; focus also on the tie between the models and the social context in which they emerged and developed.

Attributes: Criminal Justice Course, GEP. Social Science, Justice Ethics and the Law , Undergraduate

SOC 363 Race Relations in Philadelphia (3 credits)

The purpose of this course is to explore the topic of race relations with reference to a case study of Philadelphia. It is a unique course insofar as it directly addresses the issue of race in a multidisciplinary way, and it offers a unique opportunity to explore a topic and a city that are only dealt with indirectly in other courses. This course will explore the impact of race on social, economic, and political life in Philadelphia. Utilizing a socio-historical approach, it will focus on the work of W.E.B. DuBois and other social scientists who have documented the effects of race on Philadelphians in such diverse areas as housing, health care, employment, and family life.

Attributes: Criminal Justice Course, GEP. Diversity Course, GEP. Social Science, Undergraduate

SOC 365 Crime and Cities (3 credits)

From the beginning of the study of sociology in the United States, sociologists have studied life within a community context, documenting how space matters. The physical and social aspects of neighborhoods affect how likely crime is to occur in them and how residents can fight this crime. In addition to learning how space affects crime, we will learn key theories and concepts which sociologists use in studying crime in city neighborhoods, we will discuss current major issues related to crime, and we will study crime-fighting strategies.

Attributes: Criminal Justice Course, Faith Justice Course, GEP. Social Science, Undergraduate

SOC 368 Cults as Social Movements (3 credits)

This course looks at the social psychology and the social movement aspect of selected cults. Questions that the course examines: What is a cult? Who joins cults? Why do people stay in cults? What is daily life in a cult like? What should we as a society do about cults? How do we study cults?

Attributes: Criminal Justice Course, GEP. Social Science, Undergraduate

SOC 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

SOC 377 Inside-Out (3 credits)

This class offers a unique opportunity to have meaningful discussions about a range of topics from inside a correctional facility. Inside-Out classes bring together students from Saint Joseph's University and adult students who are incarcerated to learn about and discuss topics such as the causes of crime, racism, literature, philosophy, and restorative justice. Through the readings and dialogue, inside and outside students will be able to integrate their theoretical knowledge with lived experiences. It is through this exchange that we hope to critically analyze and challenge the current system in the U.S. that has resulted in a higher incarceration rate than other similar countries.

Attributes: CCC: Diversity, Criminal Justice Course, Faith Justice Course, Justice Ethics and the Law , Service Learning Course, Undergraduate

SOC 378 Urban and Public Policy (3 credits)

This course will offer a foundation in how sociologists study cities and public policy. We will examine assets of cities and key areas of need that cities face (such as education, poverty, housing, and crime), and we will study policy options to improve cities and their larger metropolitan areas. This course can count towards public policy minor.

Attributes: Criminal Justice Course, GEP. Social Science, Undergraduate

SOC 386 Violence in Intimate Relations (3 credits)

Women and children have a higher probability of being seriously injured or killed by someone with whom they are intimately associated rather than by a stranger. This course will examine questions such as: What factors contribute to the prevalence of intimate violence in the U.S.? How does intimate violence differ across groups (e.g., by race/ethnicity, social class)? How are 456 various forms of intimate violence (i.e., partner abuse, child abuse, elder abuse) interrelated?

Attributes: Criminal Justice Course, Undergraduate

SOC 401 Higher Education Policy (3 credits)

What should students gain from college? How should higher education be funded? How is college connected to inequalities along racial, gender, class, and other lines, and what role should individual campuses play in mitigating those inequalities? Policy decisions shape each of these questions and their potential answers. In this course, we will examine contemporary higher education policy and connections to inequality. Topics will include financial aid, diversity, access to college, different types of college settings, and funding. This course can count towards public policy minor.

Attributes: GEP. Social Science, Undergraduate

SOC 470 Special Topics (3 credits)

Course content determined by instructor. Past topics include: Extremist Movements, The Ethical Consumer, Feeding Philadelphia, Family Violence, and Interrogation.

Restrictions: Enrollment limited to students with a class of Senior.

Enrollment is limited to students with a major in Criminal Justice or Sociology.

Attributes: Undergraduate

SOC 490 Internship (3 credits)

The student is placed according to his/her interests in a criminal justice, social service, or health care setting for a semester. In this way, he/she may apply classroom-acquired skills and knowledge while gaining practical work experience. Permission of internship director required.

Attributes: Criminal Justice Course, Undergraduate

SOC 491 Internship (1-6 credits)

The student is placed according to his/her interests in a criminal justice, social service, or health care setting for a semester. In this way, he/she may apply classroom-acquired skills and knowledge while gaining practical work experience. Permission of internship director required.

Attributes: Undergraduate

SOC 495 Senior Thesis (3 credits)

This course is where students complete the required senior thesis. An Honors section is available for those students completing College Honors.

Prerequisites: SOC 313 and ENG 101

Attributes: Undergraduate, GEP: Writing Intensive

SOC 497 College Hon. Independent Study (3 credits)

College Honors candidates in Sociology will complete a second honors course during the Spring of the senior year (SOC 497) which includes research, extending the senior capstone experience beyond what non-Honor students complete.

Spanish (SPA)

SPA 101 Beginning Spanish I (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is reserved for beginning students with no experience with the Spanish language. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement.

Prerequisites: Spanish 101 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the Spanish 102 Placement, Spanish 201 Placement, Spanish 202 Placement or Spanish 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

SPA 102 Beginning Spanish II (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement.

Prerequisites: SPA 101 or Spanish 102 Placement with a score of 1

Restrictions: Enrollment is limited to Undergraduate Division level students. Students with the Spanish 201 Placement, Spanish 202 Placement or Spanish 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Undergraduate

SPA 105 Beginning Span for Healthcare (4 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension, with a focus on language related to healthcare. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is reserved for beginning students with no experience with the Spanish language and who are planning to enter healthcare fields such as nursing, physician's assistant, physical therapy, occupational therapy, or pre-med studies. This course is not open to native or heritage speakers of Spanish.

Prerequisites: Language Placement with a score of SP101 or Language Placement with a score of SP105

Attributes: CCC: Non-native Language, Undergraduate

SPA 111 Adult Learner Begin Spa I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is reserved for PLS students with no experience with the Spanish language. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement.

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

SPA 112 Adult Learner Begin Spa II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is reserved for PLS students with no experience with the Spanish language.. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement.

Prerequisites: SPA 111 or SPA 101

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

SPA 121 Intro to Medical Spanish (3 credits)

Students learn basic written/oral Spanish communication skills and gain cultural competence from real-world situations to further develop appropriate interactions with Spanish-speaking patients in healthcare settings. No previous Spanish experience required.

Attributes: Undergraduate

SPA 170 Special Topics in Spanish (3 credits)

Topic and content varies from semester to semester.

Attributes: Undergraduate

SPA 201 Intermediate Spanish I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement.

Prerequisites: SPA 102 or Spanish 201 Placement with a score of 1

Restrictions: Students with the Spanish 202 Placement or Spanish 301 Placement attributes may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Latin American Studies Course, Undergraduate

SPA 202 Intermediate Spanish II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar, pronunciation, and writing will accompany active student participation in task-oriented group work in the classroom. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement. With some limitations, this course may count toward the Latin American Studies minor.

Prerequisites: SPA 201 or Spanish 202 Placement with a score of 1

Restrictions: Students with the Spanish 301 Placement attribute may **not** enroll.

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Latin American Studies Course, Undergraduate

SPA 210 Adult Learner Inter Spa I (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. Fulfills the non-native language requirement.

Prerequisites: SPA 102 or SPA 112

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

SPA 211 Adult Learner Inter Spa II (3 credits)

Proficiency-based instruction will encourage the development of speaking, reading, writing and listening comprehension. Instruction of basic grammar and pronunciation will accompany active student participation in task-oriented group work in the classroom. Fulfills the non-native language requirement.

Prerequisites: SPA 201 or SPA 210

Restrictions: Enrollment is limited to PLS/HDC level students.

Attributes: Undergraduate

SPA 270 Special Topics in Spanish (3 credits)

Topic and content varies from semester to semester.

Prerequisites: SPA 202

Attributes: Undergraduate

SPA 301 Spanish Conversation (3 credits)

This course is designed to help students improve their oral communication skills in Spanish through participation in interactive tasks. Much attention will be paid to the practice of new vocabulary. Discussion of grammar and communicative strategies will be integrated as needed in order to facilitate students' attempts at various rhetorical functions, such as describing, narrating, explaining, defining, expressing and supporting opinions. This course is not open to native or heritage speakers of Spanish. Fulfills the non-native language requirement. With some limitations, this course may count toward the Latin American Studies minor.

Prerequisites: SPA 202 or Spanish 301 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Latin American Studies Course, Undergraduate

SPA 302 Spanish Composition (3 credits)

This course is designed to improve students' ability to communicate in written Spanish and to develop the writing skills they will need to succeed in advanced Spanish courses. Skills are developed through a process-oriented approach to writing, including steps related to vocabulary generation, organizing an outline, writing a draft, editing and revising, and writing a final version. This course is not open to native or heritage speakers of Spanish. With some limitations, this course may count toward the Latin American Studies minor.

Prerequisites: (SPA 301 or Spanish 302 Placement with a score of 1) and (ENG 101 or ENG 100 or WR 101 or WR 101H)

Attributes: CCC: Writing Intensive, Latin American Studies Course, Undergraduate, GEP: Writing Intensive

SPA 303 Spanish for Heritage Speakers (3 credits)

This course is designed for students with familial connections to Spanish and therefore is open only to heritage speakers. The course aims to build vocabulary and develop oral and writing skills through the study of culture and topics of current interest from the United States and throughout the Spanish-speaking world. Fulfills the non-native language requirement. This course may count toward the Latin American and Latinx Studies minor.

Prerequisites: Spanish 303 Placement with a score of 1

Attributes: CCC: Mission: Global Citizenship, CCC: Non-native Language, Latin American Studies Course, Undergraduate

SPA 310 Intro to Latin American Lit (3 credits)

The purpose of this course is to introduce students to the reading and discussion of literature in Spanish. We will read selections in prose and verse from a variety of Spanish-speaking countries in Latin America. We will interpret works in terms of their literary attributes and in relation to the sociocultural and historical contexts in which they were created. Through these readings we will not only come to know others' cultures and experiences, but will also contemplate some of the universal themes and struggles that unite us. The language of instruction is Spanish. This course counts toward the major and minor in Spanish and the minor in Latin American and Latinx Studies.

Prerequisites: SPA 302 or SPA 303 or Language Placement with a score of SP310

Attributes: CCC: Literature, GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 311 Introduc to Spanish Literature (3 credits)

This course introduces students to major literary works and also "non-canonical" texts of Spain's literature. Through a representative sampling of short stories, poems, essays, and plays, students are introduced to the analysis of the principal literary movements from medieval times to contemporary Spain. The course also examines non-canonical genres like comic, graphic novel, and flash fiction.

Prerequisites: SPA 302 or SPA 303

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

SPA 315 Animals in Literature (3 credits)

This course studies how animals are represented in twentieth-century Latin American literature. Students will analyze some of the works of the most representative Latin American authors, for instance, Horacio Quiroga, Leopoldo Lugones, Rubén Darío, and Luis Sepúlveda. The readings of these texts will focus on topics addressed by animal ethics, such as nonhuman sentience, idealization and objectification of animals, animal exploitation, relationships between human and nonhuman animals, and care for the animal species. Through the study of these topics, students will also analyze how these writers directly or indirectly have advocated animal conservation.

Prerequisites: SPA 302 or SPA 303

Attributes: CCC: Literature, CCC: Writing Intensive, GEP: Art/Literature, Undergraduate

SPA 320 Cur Evnts in the Sp-Lang Media (3 credits)

Students will develop communication skills in Spanish as they research and discuss current events and issues in Latin America as reported in Spanish-language news media. Students will research in a variety of online news outlets publishing in text, audio and video. The reading and discussion will be driven largely by students' areas of interest and may venture into a wide range of areas, such as health, ecology and the environment, social issues, international and domestic politics, culture, business, economics, science and/or technology. Students will also follow issues suggested by their classmates and instructor. Through class discussion and written and oral reflection, students will develop critical thinking skills: analyzing source material, comparing differing perspectives, and situating the issues discussed within a broader context. Students will also conduct research to deepen their understanding of a current issue of their choosing, as it relates to Latin America. The class will discuss vocabulary and language structures as they arise in daily readings and discussions, and students will keep glossaries of new vocabulary. The primary objective of this course is to help students advance their Spanish language proficiency while learning about the Spanish-speaking world. The language of instruction is Spanish. This course counts toward the major and minor in Spanish and the minor in Latin American and Latinx Studies.

Prerequisites: SPA 302 or SPA 303

Attributes: Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 322 Environ Challenges LatAmerica (3 credits)

Latin America is one of the regions with the highest biodiversity on the planet, and this condition has been essential for its economic development. From the colonial era to the present, Latin America has depended on exploiting its natural resources. However, the use of these has not always been reflected in the well-being of the human and non-human communities in the region. This course aims to introduce students to the environmental characteristics of Latin America, the problems the region faces, and the different proposals that communities have made to defend and preserve the environment.

Prerequisites: SPA 301 or SPA 303

Attributes: Latin American Studies Course, Undergraduate

SPA 330 Spanish for Business (3 credits)

This course will acquaint the student with business terminology and phraseology used in Spain and Latin America. Business letters will be composed and answered in Spanish. Special information on such fields as advertising, foreign trade, transportation, money, banking, and finance will be presented and studied in Spanish. Problems of grammar and style will be studied as the need arises.

Prerequisites: SPA 301 or SPA 303

Attributes: Undergraduate

SPA 331 Span for Internatnl Business (3 credits)

This class will assist students in a career in Business or International Relations. Comparisons will be made among the business practices of different Spanish speaking countries in the areas of marketing, advertising, import and export and sales. The political and economic risks of opening a business abroad will be analyzed.

Prerequisites: SPA 301 or SPA 303

Attributes: Undergraduate

SPA 335 Span Healthcare Professions I (3 credits)

Spanish for Healthcare Professions I is a course designed to help intermediate-level students gain Spanish language proficiency and cultural competencies that will facilitate their future interactions with Spanish speakers in situations related to health care. The course aims to increase students' healthcare-related vocabulary, communication skills, health literacy, and cultural competence. Students will practice oral communication through role-plays, presentations, and class discussions. They will read, write, and speak about a variety of healthcare-related topics.

Prerequisites: SPA 301 or SPA 303

Attributes: Undergraduate

SPA 336 Span Healthcare Professions II (3 credits)

Spanish for Healthcare Professions II is a course designed to help mid-intermediate-level students continue developing Spanish language proficiency and cultural competencies to facilitate future interactions with Spanish-speakers in situations related to health care. Students will continue developing their knowledge of the human body and its afflictions (cardiovascular, endocrine, and nervous systems) as well as reproductive and mental health. In combination with these topics, this course will focus on current issues of public health such as an introduction to the linguistics policies in the US healthcare system and their effects on Latinx communities, access to healthcare for LGBTQ communities, and an overview of the evolutions of stigmas and taboos surrounding mental illnesses. SPA 335 and 336 are two independent courses. Students do not need to complete SPA 335 in order to enroll and succeed in SPA 336.

Prerequisites: SPA 302 or SPA 303 or SPA 335

Attributes: Undergraduate

SPA 337 Latinx Comm Culture & Health (3 credits)

Latinx communities are the fastest-growing demographic in the United States, with Pennsylvania and Philadelphia reflecting this trend through 45% and 25% population increases, respectively, over the past 15 years. This course examines challenges in accessing healthcare due to social, environmental, and economic factors for these communities. The course aims to enhance students' health literacy and cultural competence, preparing them for interactions with Spanish-speaking individuals in healthcare. It also explores the U.S. healthcare system and its barriers for Latinx populations, emphasizing the relationship between culture, well-being, and healthcare, including social determinants of health.

Prerequisites: SPA 302 or SPA 303

Restrictions: Enrollment is limited to Undergraduate Division level students.

Attributes: Latin American Studies Course, Undergraduate

SPA 350 Intro to Latin Amer Cultures (3 credits)

The purpose of this course is to orient students to the diverse peoples and places of Latin America. Students will use Spanish to discuss the geography, history, politics and cultures of the region. Some attention will be paid to current issues in Latin America, as reported in online news sources from the region.

Prerequisites: SPA 302 (may be taken concurrently) or SPA 303 (may be taken concurrently) or Language Placement with a score of SP350

Attributes: Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 351 Introd to Spanish Cultures (3 credits)

The purpose of this course is to orient students to Spain's rich and diverse cultural heritage, varied terrain and dynamic history. Students will also discuss current issues and events, as reported in Spanish online news sources. Students may not count both 351 and 356 for credit toward a Spanish major or minor. Both may be taken but only one may count for major/minor credit.

Prerequisites: SPA 302 or SPA 303 or Language Placement with a score of SP351

Attributes: Undergraduate

SPA 352 (Post)Modern City in Spain (3 credits)

Cities are the stage of social and political changes at the same time that events transform urban space. On occasion, alterations are sudden and traumatic, such as the devastation and reconstruction after a war. However, transformations are most often caused by economic and social factors that are subtle and happen over a long period of time. For these reasons, cities have captivated the imagination of writers and filmmakers alike. This course examines representations of Spanish cities from the nineteenth to the early twenty-first century. The course will focus on different periods of Spain's history in which cities underwent relevant transformation.

Prerequisites: SPA 302 or SPA 303

Attributes: CCC: Literature, GEP: Art/Literature, Undergraduate

SPA 353 Latin American Cinema (3 credits)

This course examines some of the historical debates, social issues and cultural currents of Latin America in the twentieth and twenty first centuries through some of its more relevant films. The course covers a variety of historical periods and nations to offer a general understanding of the region. This course counts toward the minor in Latin American and Latinx Studies.

Prerequisites: SPA 302 or SPA 303

Attributes: GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 356 Spain:Study Tour (3 credits)

Spain is one of the most dynamic countries in Europe today. It's a mixture of the old and new. Some of the major influences of the ancient and contemporary worlds will be studied through history, literature, film, art, architecture, regional languages, politics, economic development and music. The highlight of the course is the experience in Spain itself. Students may not count both 351 and 356 for credit toward a Spanish major or minor. Both may be taken but only one may count for major/minor credit. The other may count for elective credit.

Prerequisites: SPA 301 or SPA 303

Attributes: GEP: Art/Literature, Undergraduate

SPA 357 Spain in the New Millenium (3 credits)

After several years of unprecedented economic expansion between 1995 and 2007, in which Spain became the seventh largest economy in the world, the 2008 economic crisis eroded that prosperity and changed the social structure of the country. While the economic growth and historic low unemployment drew a wave of immigrants who transformed Spain into a more multicultural society, the crisis truncated the future of an entire generation and initiated the rise of populism. Some questions that articulate the topics discussed are: What does it mean to be a Spaniard? Is there more than one Spanish identity? These questions will guide us to deepen our understanding of political and sociological issues in Spain during the last twenty years. Some of the topics discussed will deal with how soccer can construct a national identity; "peripheral" nationalism as in the case of Catalonia and the Basque Country bids for independence; the issue of immigration and how it has influenced Spanish society; and the rise of populism. These topics may change as the issues that affect Spain evolve.

Prerequisites: Language Placement with a score of SP357 or SPA 302 or SPA 303

Attributes: Undergraduate

SPA 358 Contemporary Spanish Cinema (3 credits)

The social evolution of Spanish democracy since 1975 is reflected in the Spanish cinema of the twenty-first century, which underscores the global and diverse influences on modern society. This course examines Spanish films from the twenty-first century by some major directors (Javier Fesser and Alberto Rodríguez) and also rising filmmakers (Arantxa Echevarría and Salvador Calvo), including a variety of genres: animation, comedy, drama, suspense, and documentary. Works will be analyzed from a film analysis perspective in relation to their socio-political context. Topics of discussion will include immigration, national identity, and political corruption, among others.

Prerequisites: SPA 302 or SPA 303 or SPA 311 or SPA 350 or SPA 351 or SPA 352 or SPA 356 or SPA 357

Attributes: Undergraduate

SPA 360 Spanish in the Community (4 credits)

This service-learning course focuses on cultural, social, historical, linguistic, and political issues relevant to Latinx communities in Philadelphia. The course is designed to promote solidarity with Latinxs, learn about cultural norms and values, reflect on issues of social justice prevalent in these communities, and develop oral and written proficiency in Spanish. Class materials include both written and community texts, presentations, film and news media. Active participation in both the community and the classroom are key components of the course. In addition to classes on campus, each student will carry out three hours per week of work at a designated service placement site in a Latinx community in or near Philadelphia. This class focuses on learning how to "read the texts" of your service experience, how to read the texts of concepts and theories and how to make connections between the two. This course also counts toward the minor in Latin American and Latinx Studies.

Prerequisites: SPA 302 or SPA 303

Attributes: Faith Justice Course, Latin American Studies Course, Service Learning Course, Undergraduate

SPA 370 Topics in Spanish (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the Spanish-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Prerequisites: SPA 302 or SPA 303 or Language Placement with a score of SP370

Attributes: Undergraduate

SPA 375 Translation (3 credits)

This course aims to help students deepen their understanding of the Spanish language and to broaden their vocabulary through the practice of translation. We will consider a range of discursive, lexical and syntactic topics and will translate a variety of texts (fiction and non-fiction, of different registers and for various purposes). Students will translate from Spanish to English and from English to Spanish. Class discussions will be held in both languages, as determined by the task at hand. Open to non-native, native, and heritage speakers of Spanish. This course counts for the Linguistics major/minor.

Prerequisites: SPA 302 or SPA 303 or Language Placement with a score of SP375

Attributes: Undergraduate

SPA 380 Intro to Spanish Linguistics (3 credits)

This course is an introduction to the study of language and principles of Spanish linguistics including: the sound system (phonetics and phonology), the formation of words (morphology), sentence structure (syntax), as well as word and sentence meaning (semantics); in addition, we will discuss linguistic change throughout time (historical linguistics), linguistic variation in geographical space (dialectology) and within society (sociolinguistics), language use for communication (pragmatics), language learning (second language acquisition), and language teaching (pedagogy and applied linguistics). This course counts for the Linguistics major/minor.

Prerequisites: SPA 301 or SPA 303 or Language Placement with a score of SP380

Attributes: Undergraduate

SPA 381 Spanish Phonetics & Phonology (3 credits)

This course focuses on specific sounds of Spanish as well as the underlying sound system that determines how and where these sounds are distributed in the language. The course includes theoretical concepts related to phonetics and phonology, as well as a particular emphasis on phonetic aspects that are typically challenging for those who speak Spanish as a second language. Students will examine sounds spoken by both native and non-native speakers of Spanish, as well as an introduction to how sounds vary across dialects due to linguistic and extralinguistic factors. This course also counts for the Linguistics major/minor.

Prerequisites: SPA 302 or SPA 303

Attributes: Undergraduate

SPA 401 Topics in Latin Am Cultures (3 credits)

This course is a focused study of select aspects of Latin American cultures. It is designed to help students build a framework for understanding some of the geographical, historical, social, and political circumstances that have shaped Latin American realities and cultural manifestations. The course will take a thematic approach, and topics will vary. It would be helpful though not required that the student have some kind of introduction to Latin America prior to or concurrent with this course.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 402 Topics in Spanish Cultures (3 credits)

This course provides an in-depth look at select aspects of Spanish cultures and civilization. It also provides a framework for understanding these cultural manifestations within their geographical, historical, political and social contexts. The course will take a thematic approach, and topics will vary. It would be helpful though not required that the student have some kind of introduction to Spain prior to or concurrent with this course.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: Undergraduate

SPA 415 Iconic Women of Latin America (3 credits)

In this course, we study representations of iconic women from various countries and historical periods in Latin America. We analyze salient aspects of literary, cinematic, and artistic works that have helped shape and nuance their evolving legends. We also describe the mutual relationships between these representations and their historical, political and cultural contexts: both those in which they emerged and those that they have helped shape. We discuss the ways in which these representations reflect and at times challenge gender norms and stereotypes. The primary objective of this course is for students to use increasingly advanced written and spoken Spanish to deepen their understanding of Latin American cultures. The language of instruction is Spanish. This course counts toward the major and minor in Spanish, the Latin American and Latinx Studies minor and the Gender Studies minor.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Diversity Course, Gender Studies Course, Latin American Studies Course, Undergraduate

SPA 420 Major Latin American Authors (3 credits)

An in-depth study of selected texts by major authors in different genres, such as (poetry, fiction, essay, and/or theater), with special emphasis on the interrelationship of genre, form, and content. This course counts toward the minor in Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380) or Language Placement with a score of SP420

Attributes: GEP: Art/Literature, Latin American Studies Course, Undergraduate

SPA 422 Culture and Dictatorship (3 credits)

In this course we approach the topic of dictatorships in Latin America through a variety of genres, including works of fiction and non-fiction, testimonies and memoir, film and visual art. We discuss the ways in which these cultural texts register and articulate social and ideological struggles in relation to the broader historical and cultural context. This course counts toward the minor in Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380) or (Language Placement with a score of SP422)

Attributes: GEP: Art/Literature, Latin American Studies Course, Undergraduate

SPA 423 Latin Am Short Story (3 credits)

In this course students conduct close readings of short stories and/or nouvelle by Latin American authors. We analyze the stories within their cultural, historical and ideological frameworks. Counts toward the minor in Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Art/Literature, Latin American Studies Course, Undergraduate

SPA 425 Imagery of the Conquest (3 credits)

Most official histories of early contact between Europeans and Amerindians in Latin America will present a Eurocentric version of American reality. This course will explore Amerindian and mestizo perspectives as expressed through a variety of texts, such as narrative, poetry and song, illustrations and painting, maps, uprisings, and other forms of expression. The objective is to better understand pre-Columbian civilizations and the effects of European colonization on Amerindian cultures. The course will analyze how Amerindian and mestizo subjects authorize their voices, represent their own unique identities, and respond to the cultural changes brought about through conquest and colonization. It would be helpful though not required that the student have some kind of introduction to Latin America prior to or concurrent with this course. Counts toward the minor in Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 426 Culture in Revolution (3 credits)

In this course students will become familiar with three main milestones of Latin American history and culture in the 20th century: the Mexican, Cuban and Nicaraguan Revolutions. Beginning with a discussion of the concept of "revolution" and a brief historical introduction to these periods, we will discuss cultural policies of the new regimes, including the literacy campaigns derived from those policies. Students will also become familiar with the different cultural manifestations of those periods, including literature, visual arts, and popular music. Counts toward the minor in Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Art/Literature, Latin American Studies Course, Undergraduate

SPA 428 Rainforest: A Literary Journey (3 credits)

This course explores Las narrativas de la selva, a set of Latin American texts written during the 20th century that deal with stories of failure by modern, urban, male subjects who escape the city to fulfill in the Amazon rainforest their dreams of freedom, self-realization, and financial independence. Over time, the rainforest has been represented in a variety of forms: from the image of a paradise to that of an inferno, to that of a benevolent shelter. Throughout those representations, Latin American writers have brought into question notions of national identity, sovereignty, economic development, care for the environment, among others. The primary goal of this course is to introduce students to referential and theoretical texts about Latin American narrativas de la selva. Through them, students will reflect on the following questions: What are the most recurrent representations of the rainforest in this narrative production? What environmental problems are problematized in these texts? What role do the indigenous people play in these narratives? What kind of relationships between human communities and the rainforest are represented in these stories?

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 431 Commonplaces of Colonial Exp (3 credits)

In this course students think about how various spaces became places through human experience in Colonial Spanish America. They engage in reflective discussion about the physical conditions, value systems, beliefs and politics that created such places and, in some cases, have changed their meaning over time. They explore the dynamics of spaces endowed with different values by different peoples at different times. Through these discussions students think about some commonplaces of colonial experience, as well as the experience of colonial legacies and colonial places in the 21st century. It would be helpful though not required that the student have some kind of introduction to Latin America prior to or concurrent with this course.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Art/Literature, Latin American Studies Course, GEP: Non-Western Studies, Undergraduate

SPA 451 Narrative & Film of Dem Spain (3 credits)

This course examines narrative and film in Spain from the demise of the Franco dictatorship (1975) until today. In doing so, the course focuses on cultural and aesthetic renovations such as the cinema of Pedro Almodovar in the "movida madrileña" and the new representations of Spanish youth in the 1990s with the "generación Kronen." This course also analyzes additional approaches for understanding Spanish culture through the social cinema of Fernando León de Aranoa, and the role of Franco's traumatic dictatorship in today's society. Finally, we will examine the current socioeconomic crisis in Spanish society and how it affects younger generations.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP. Ethics Intensive, GEP. Art/Literature, Undergraduate

SPA 452 History on the Big Screen (3 credits)

This course examines Spain's history and culture through the analysis of historical films. The course begins with a brief introduction to the concept of History and a definition of historical cinema. After this introduction, the class will focus on some key historical periods of Spanish history such as the Conquest of America; the rise and decay of the Spanish Empire; the Spanish Civil War, Franco dictatorship, and the transition to democracy. In addition to introducing students to key moments and aspects of Spanish history and culture, this course invites students to think critically about History's objectivity and how historical events are often shaped to satisfy current political projects. Other underlying issues will be reflecting on whether film may be considered History or not.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP. Art/Literature, Undergraduate

SPA 453 Comics and Graphic Novels (3 credits)

This course will examine the evolution of comics (usually referred to as "tebeos") in Spain from the Spanish Civil War (1936-1939) to the present. During Francisco Franco's dictatorship, this genre was heavily influenced by the Fascist ideology of the government. On the one hand, some editorials sympathized with the government and used their publications to spread an ultra-conservative ideology. On the other hand, some artists circumvented censorship by drawing harmless comical stories that, in fact, were a critical portrayal of the miseries of the post-war era. After Franco's death in 1975, comics were free of censorship and became a space of transgression to express the political, religious, and sexual liberation of the late 1970s and early 1980s. In the early 2000s, graphic novels became more accepted by the public and received deserved recognition by critics. In the second part of the semester, we will analyze graphic novels that deal with social and political issues within an ethical framework.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP. Ethics Intensive, Undergraduate

SPA 460 Advanced Oral Communication (3 credits)

In this course, we will analyze communication from a linguistic perspective and also focus on the development of advanced oral communication skills. Drawing on current research in the field of linguistics (including discourse analysis, cross-cultural communication, semantics, pragmatics, etc.) we will explore various aspects of "communication" as well as study methods used to investigate oral communication. Significant class time will also be devoted to the continued development of students' own communicative competence and oral language proficiency. Students will engage in activities aimed at developing their interpersonal and presentational communicative skills. This course will be beneficial to students who are majoring or minoring in Spanish as well as those who plan to use Spanish for personal or professional reasons outside the classroom. Because of its emphasis on communication skills for non-native speakers, this course is not open to native speakers of Spanish. This course also counts for a Linguistics minor.

Prerequisites: SPA 302 or SPA 303

Attributes: Undergraduate

SPA 461 Methods for Teaching Spanish (3 credits)

This course is designed for students who are potentially interested in teaching Spanish at the university, secondary or elementary levels. We will explore general aspects of Spanish phonology, morphology, syntax, and semantics as they bear upon teaching the Spanish language. Topics discussed include second language acquisition, pedagogical theory, materials preparation and language teaching methodology. This course also counts for a Linguistics minor.

Prerequisites: SPA 380 and (SPA 302 or SPA 303)

Attributes: Undergraduate

SPA 466 Spanish Dialectology (3 credits)

In this course, students will become familiar with the range of dialect features exhibited in the Spanish spoken in Spain, Latin America, and the United States. We will also discuss the relationship between language and dialect, examine the role of the standard language in both written and oral usage, and identify the factors that have contributed to the diversity of the Spanish language. This course also counts for the Linguistics major/minor and for Latin American and Latinx Studies.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380) or Language Placement with a score of SP466

Attributes: Latin American Studies Course, Undergraduate

SPA 467 Lang Contact & Pol in U.S. (3 credits)

This course is designed to engage students in a critical analysis of the history and politics of language contact within the context of the United States. Given the demographic shifts in population taking place currently in the U.S., the course will focus primarily on the contact between Spanish and English. We will discuss bilingualism and the characteristics of language contact, language ideologies, language planning and policy, Official English movements, and bilingual education. We will examine the language of hegemony used to maintain the dominance of English vis-a-vis Spanish (and other languages) present in our society. We will also do some comparative study connecting this reality to what is happening with Spanish in other situations of language contact. This course counts for the Linguistics major/minor.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: GEP: Diversity Course, Latin American Studies Course, Undergraduate

SPA 470 Topics in Spanish (3 credits)

The purpose of this course is to explore specific topics within the literatures and/or cultures of the Spanish-speaking world. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic.

Prerequisites: (SPA 302 or SPA 303) and (SPA 310 or SPA 311 or SPA 315 or SPA 320 or SPA 321 or SPA 330 or SPA 331 or SPA 335 or SPA 350 or SPA 351 or SPA 352 or SPA 353 or SPA 356 or SPA 357 or SPA 358 or SPA 360 or SPA 370 or SPA 375 or SPA 380)

Attributes: Undergraduate

SPA 480 Topics in Spanish Linguistics (3 credits)

The purpose of this course is to explore specific topics within the field of linguistics as they relate to the Spanish language. Topics will vary according to the semester in which the class is offered; check the semester listing for current topic. This course also counts for the Linguistics major/minor.

Prerequisites: SPA 302 or SPA 303

Attributes: Undergraduate

SPA 490 Spanish Internship I (3 credits)

This course is a practicum in which the student applies their communication skills in Spanish in a work environment related to their professional area. The majority of the work for this course is performed at the internship site. The student is responsible for securing the internship site and will meet with the professor prior to the semester in which the internship is to take place in order to discuss the course requirements and expectations. During the practicum, the student will reflect upon their experience at the internship site in written assignments and in regular meetings with the professor. At the end of the semester, the student will submit a final paper or will deliver a final presentation based on their internship experience. This course is intended as an advanced course for Spanish majors or minors who have completed the other course requirements for the major or minor.

Prerequisites: (SPA 310 or SPA 311 or SPA 315) and (SPA 350 or SPA 351 or SPA 353 or SPA 356 or SPA 357 or SPA 358) and (SPA 380 or SPA 466)

Attributes: Undergraduate

SPA 491 Spanish Internship II (3 credits)

This course is a practicum in which the student applies their communication skills in Spanish in a work environment related to their professional area. The majority of the work for this course is performed at the internship site. The student is responsible for securing the internship site and will meet with the professor prior to the semester in which the internship is to take place in order to discuss the course requirements and expectations. During the practicum, the student will reflect upon their experience at the internship site in written assignments and in regular meetings with the professor. At the end of the semester, the student will submit a final paper or will deliver a final presentation based on their internship experience. This course is intended as an advanced course for Spanish majors or minors who have completed the other course requirements for the major or minor.

Prerequisites: (SPA 310 or SPA 311 or SPA 315) and (SPA 350 or SPA 351 or SPA 353 or SPA 356 or SPA 357 or SPA 358) and (SPA 380 or SPA 466)

Attributes: Undergraduate

SPA 493 Independent Research in Span I (3 credits)

Prerequisites: (SPA 310 or SPA 311 or SPA 315) and (SPA 350 or SPA 351 or SPA 353 or SPA 356 or SPA 357 or SPA 358) and (SPA 380 or SPA 466)

Attributes: Undergraduate

SPA 494 Independent Research in Spn II (3 credits)

Prerequisites: (SPA 310 or SPA 311 or SPA 315) and (SPA 350 or SPA 351 or SPA 353 or SPA 356 or SPA 357 or SPA 358) and (SPA 380 or SPA 466)

Attributes: Undergraduate

Special Education (SPE)

SPE 160 Intro to Special Edu w/Field (3 credits)

This introductory course introduces and explores supporting children with disabilities in schools. Students will be provided with an overview of Special Education with an emphasis on historical and emerging perspectives. Topics to be examined will include types and natures of exceptionalities; accessibility; legal and ethical responsibilities of teachers; least restrictive environment; and the inclusion of children with exceptionalities in schools and communities.

Attributes: CCC: Mission: Ethics Social Justice, GEP: Ethics Intensive, Undergraduate

SPE 170 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

SPE 205 Inclusive Classrooms w/ Field (3 credits)

The focus of this course is on the developing of skills for effective inclusive classroom management and creating classroom climates conducive to student achievement in PreK-12 classrooms. It provides coverage of a variety of discipline models to aid candidates in building systems and conceptual models of classroom management based on their underlying theories. This course emphasizes: (a) activities promoting positive behavioral supports, including school wide, classroom, and individual supports, (b) increasing student motivation and academic engagement through effective pedagogical practices, (c) establishing cooperative classroom routines, procedures, and practices, (d) organizing the environment, (e) effective instructional planning, and (f) measuring and reporting progress.

Prerequisites: SPE 160

Attributes: Undergraduate

SPE 270 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

SPE 320 Progress Monitoring w/ Field (3 credits)

This course will provide an in-depth presentation of the complex issues of assessment at all levels of educational settings. The content of this course will provide students with an in-depth review of informal evaluation procedures and classroom-based data collection strategies. Focus will include academic, affective, adaptive, functioning, fine motor, and environmental measures. Content coverage will consist of an overview of assessment models including traditional, informal, dynamic, performance, curriculum-based, and alternative techniques and include an examination of evaluation procedures in the area of transition planning.

Prerequisites: SPE 160

Attributes: Undergraduate

SPE 329 High Incid Disabil w/Field (3 credits)

This course is a comprehensive study of theoretical issues and research-based diagnosis, instructional planning and programmatic organization of instruction for children with learning problems. Content will cover curriculum design, development of programs of differential instruction involving evidence-based interventions that meet students' needs based on formative assessment, developmental and educational information; integrated learning experiences; specialized adaptations and resources; practices and procedures validated for specific characteristics of learners and settings; prevention and intervention strategies from multiple theoretical approaches for individuals at-risk for academic or behavioral failure; systematic implementation of instructional variables; and systems management necessary for effective instruction of children with disabilities. Focus will also be given to the development and implementation of differentiated curriculum and curricular enhancements, and concepts and teaching practices related to the development and implementation of effective instructional programs for students with high incidence disabilities. Candidates will develop effective, evidence-based instructional strategies for all levels of support (PK-8). These will include: lesson plans, unit plans, IEPs, IFSPs, 504 plans, and intervention strategies that employ Pennsylvania's Standards Aligned Systems (<http://www.pdesas.org>). Candidates will be able to modify and implement curriculum including appropriate adaptations and technology, using the appropriate Academic Standards, Alternate Academic Standards where necessary, Assessment Anchors, and eligible content. In addition, candidates will demonstrate the ability to collaborate and plan for student outcomes and transition at designated times throughout the student's education, including Age 3 transition for Pre K-8, secondary transition procedures (7-12), and transition to post school success. This course of study will include: applying the knowledge of transition-related legislation in fields of special and vocational education, rehabilitation, labor and civil rights; developing and implementing a transition plan that integrates functional, academic, and vocational data aligned to identified post school outcomes; and administering and interpreting formal and informal career and vocational assessment approaches.

Prerequisites: SPE 160

Attributes: Faith Justice Course, Undergraduate

SPE 339 Low Incid Disabil w/Field (3 credits)

This course addresses the definitions, characteristics, assessment and specific techniques for students needing adaptive and functional curricula. This includes research validated instructional strategies, adaptive and assistive technologies including augmentative communication systems, and communication and social interaction alternatives for non-speaking individuals. The course reviews behaviorally-based educational models for students with autism and other moderate and severe disabilities, and presents methods aimed at enhancing functional skill development in major life domains, with emphasis on community-based training and self-determination. In addition, candidates will demonstrate the ability to collaborate and plan for student outcomes across academic transitions. at designated times throughout the student's education, including Age 3 transition for Pre K-8, secondary transition procedures (7-12), and transition to post school success.

Prerequisites: SPE 160

Restrictions: Enrollment limited to students with the Education Basic Skills attribute.

Attributes: Undergraduate

SPE 349 Literacy Intervention w/Field (3 credits)

This course will focus on the development of competency in the implementation of explicit and systematic evidence-based instructional strategies designed to teach accuracy, fluency, comprehension, and monitoring strategies in literacy and content area reading to students with disabilities, including exceptional children in regular classroom, with emphasis on applying findings from research in reading to classroom practices, including children who are linguistically and culturally diverse. Content will include diagnostic-prescriptive techniques for remediation of reading and written language and associated learning disabilities. Candidates will develop lesson plans, unit plans, IEPs, IFSPs, 504 plans and intervention strategies that employ Pennsylvania's Standards Aligned System. By using <http://www.pdesas.org>, candidates will be able to modify and implement curriculum using the appropriate Academic Standards, including Alternate Academic Standards where necessary, Assessment Anchors, and eligible content.

Prerequisites: SPE 160

Attributes: Undergraduate

SPE 359 Math & Content Interv w/Field (3 credits)

This course is an intensive and comprehensive study of research practices for the instruction of Mathematics, Science, and Social Studies for students with high incidence disabilities. Content will cover diagnostic planning, curriculum design, progress monitoring, and the development of student-specific programs involving evidence-based interventions. This course centers around the Response to Intervention model and most of the strategies discussed are based on the research which supports multi-sensory instruction, integrated learning experiences, and the multiple intelligences. Focus will also be given to the development of appropriate goals and the implementation of research-based curriculum, concepts, and instructional strategies which are most effective for students with high incidence disabilities. Candidates will develop lesson plans, unit plans, IEPs, IFSPs, 504 plans and intervention strategies that employ Pennsylvania's Standards Aligned System. By using, candidates will be able to modify and implement curriculum using the appropriate Academic Standards, including Alternate Academic Standards where necessary, Assessment Anchors, and eligible content.

Prerequisites: SPE 160

Attributes: Undergraduate

SPE 369 Emot-Beh'l Disabil w/Field (3 credits)

This course covers social, emotional, and behavioral disorders in an educational setting, as well as the most common types of mental illness that PreK-12 students may experience. In addition, the course covers possible causes, identification, assessment, behavioral data collection and recording, and effective instructional planning for these populations. Teacher candidates will develop skills in classroom management and crisis intervention, trauma-informed care, and creating a safe, inclusive, culturally responsive classroom climate conducive to learning and growth.

Prerequisites: SPE 160

Attributes: Faith Justice Course, Undergraduate

SPE 370 Special Topics (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: Undergraduate

SPE 379 Fam School & Comm:Diverse Soc (3 credits)

This course focuses on the issues of family and professional collaboration, and methods of promoting adult communication and management strategies. It applies the knowledge of cultural and linguistic diversity and the significance of socio-cultural and political contexts as they relate to the family, culture and society. It identifies the members of teams designed to support and optimize children's educational needs and social-emotional development and the network of community services and resources to individuals, families and groups affected by social, environmental, health and related problems.

Prerequisites: SPE 160

Restrictions: Enrollment is limited to students with a major, minor, or concentration in Educational Studies, Elementary/Middle Grades (4-8), Elementary Educ Pre K -4th Gr, Secondary Education or Special Education.

Attributes: Faith Justice Course, Undergraduate

SPE 495 Special Ed. Student Teaching (6 credits)

This experience is designed as the capstone professional course in the Special Education major. It is to be the final course in the sequence of Special Education courses for certification. The student teaching experience approximates a full time working experience for a fourteen week semester. It includes a supervised teaching experience as well as a weekly seminar class in which issues related to student teaching are studied. Evaluations are conducted by the seminar instructor, the cooperating teacher and a university supervisor.

Restrictions: Enrollment is limited to students with a major in Elem - Special Education or Elementary Education.

Attributes: Undergraduate

SPE 498 SPE Student Teacher - Dual Prog (6 credits)

This field-based seminar is designed to provide teacher candidates with an understanding of the diverse need of their students and their learning environments in early childhood education (as defined by the Pennsylvania Department of Education) for grades PreK-4 and Special Education PreK-12. At the conclusion of the student teaching experience, the candidate shall have demonstrated proficiencies in instructional management; student motivation; curriculum planning; learning theory, problem solving in the educational setting; the use of technology; use of reading, language, and literacy skills in all classrooms; the identification of appropriate instructional resources; and the assessment of student achievement. Throughout student teaching and the student teaching seminar, candidates will be expected to apply the knowledge, skills, and competencies developed through the Saint Joseph's University Teacher Preparation Program as aligned with the program's mission "to cultivate knowledgeable, caring, reflective, and socially conscientious educators who can think critically, inspire a passion for learning, communicate effectively, and advocate intentionally for all PK-12 students, including those from culturally non-dominant communities who have distinct learning needs."

Attributes: Undergraduate

SPE 570 Special Ed Independent Study (3 credits)

Students will study a topic in special education with a faculty mentor.

SPE 600 Found & Current Issues w/Field (3 credits)

This course is a critical study of the contemporary and controversial issues within the field of special education. Consideration will be given to the philosophical, psychological, and sociological basis of teacher education, including an analytical review of research-based curricula, programmatic innovations, policy issues and their effects, and ethical practices. Discussions will focus on evidence-based core concepts that contribute to effective program planning; investigation of cognitive, academic, behavioral, and psycho-social solutions and implications for those working with exceptional students; and future implications for the advancement of special education diagnostic and instructional services. This course requires 15 hours of observation in special education classrooms.

Restrictions: Enrollment is limited to Doctoral or Graduate level students.

Attributes: Graduate

SPE 603 Thry&Instr High Incid w/Field (3 credits)

This course is a comprehensive study of theoretical issues and research-based diagnosis, instructional planning and programmatic organization of instruction for children with learning problems. Content will cover curriculum design, development of programs of differentiated instruction involving evidence-based interventions that meet students' needs based on formative assessment, developmental and educational information; integrated learning experiences; specialized adaptations and resources; practices and procedures validated for specific characteristics of learners and settings; prevention and intervention strategies from multiple theoretical approaches for individuals at-risk for academic or behavioral failure; systematic implementation of instructional variables; and systems management necessary for effective instruction of children with disabilities. Focus will also be given to the development and implementation of differentiated curriculum and curricular enhancements, and concepts and teaching practices related to the development and implementation of effective instructional programs for students with high incidence disabilities. This course requires 6-8 hours of fieldwork.

Prerequisites: SPE 600

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 604 Research:Lit,Writ,Lang w/Field (3 credits)

This course will focus on the development of competency in the implementation of explicit and systematic evidence-based instructional strategies designed to teach accuracy, fluency, comprehension, and monitoring strategies in literacy and content area reading to students with disabilities, including exceptional children in regular classroom, with emphasis on applying findings from research in reading to classroom practices, including children who are linguistically and culturally diverse. Content will include diagnostic-prescriptive techniques for remediation of reading and written language and associated learning disabilities. This course requires 4-5 hours of fieldwork.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 605 RsrchBasedModel:MathSciencePro (3 credits)

This course will focus on the development of competency in the implementation of explicit and systematic evidence-based instructional strategies designed to teach mathematics and content area subjects, including science and social studies. A study of theory and practice of effective teaching methodologies, combined with principles of differentiated instruction. Attention will be on teaching models and methods supported by research and emphasis will be placed on development of effective teaching procedures.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 606 ThryInstrPract:Emot/Soc/Behav (3 credits)

This course covers social, emotional, and behavioral disorders in an educational setting, as well as the most common types of mental illness that PreK-12 students may experience. In addition, the course covers possible causes, identification, assessment, behavioral data collection and recording, and effective instructional planning for these populations. Teacher candidates will develop skills in classroom management and crisis intervention, trauma-informed care, and creating a safe, inclusive, culturally responsive classroom climate conducive to learning and growth.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 607 ThryInstrPractStdntsw/LowIncid (3 credits)

This course addresses the definitions, characteristics, assessments, and specific techniques for students with mild, moderate, and profound intellectual disabilities, physical disabilities, and autism. In addition, this course includes students with multiple disabilities who may also be blind or deaf. These students need special education, including adaptive, academic, social, and functional curricula. Characteristics are addressed about why and how instruction can meet these individuals' learning and developmental needs, specifically in cognitive development, systematic instruction, assistive technology, individualized learning strategies and tools, and language communication. This course includes research-validated instructional strategies, adaptive and assistive technologies, augmentative communication systems, and communication and social interaction alternatives for non-speaking individuals. Behaviorally based educational models for students with autism and other moderate and severe disabilities present methods to enhance functional skill development in major life domains and emphasize transition planning, community-based training, and self-determination. The course is approved by the Pennsylvania Department of Education (PDE), and the required competencies are included in the course readings, discussions, PowerPoint presentations, videos, assignments, Zoom meetings, and reflections.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 608 Families Schls & Cmnty w/Field (3 credits)

This course focuses on the home-school partnerships, issues of family and professional collaboration and diversity, and methods of promoting adult communication and management strategies. It applies the knowledge of cultural and linguistic diversity and the significance of socio-cultural and political contexts as they relate to the family, culture and society. It identifies the members of teams designed to support and optimize children's educational needs and social-emotional development and the network of community services and resources available to individuals, families and groups affected by social, environmental, health and related problems. This course requires 2-3 hours of fieldwork.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 609 SPED Clinical Practicum I (3 credits)

This is a combined seminar/internship experience. This fieldwork experience will provide the candidate with an opportunity for in-depth varied and continuous instruction experiences. The practicum will include a variety of researched based instructional practices, assessment procedures, classroom management strategies and organizational strategies to provide structured opportunities for professional growth and stimulation. These experiences will enable the candidate to (a) apply the knowledge and skills acquired through his/her study and previous experience to actual classroom situations that a teacher will face in a Response to Intervention Classroom; (b) integrate the concepts and skills from different prior learning experiences as well as researched-based principles in reading, comprehension and writing for educational programming and apply to individual situations; (c) become involved in the routine functions of a classroom teacher including planning, assessment, progress monitoring and collaboration with peers. Course requirements are designed to meet Departmental and Commonwealth standards. Between 20-25 hours of clinical practicum are required per week.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 610 SPED Clinical Practicum II (3 credits)

This is a combined seminar/internship experience. This fieldwork experience will provide the candidate with an opportunity for in-depth varied and continuous instruction experiences. The practicum will include a variety of research-based based instructional practices, assessment procedures, classroom management strategies and organizational strategies to provide structured opportunities for professional growth and stimulation. These experiences will enable the candidate to (a) apply the knowledge and skills acquired through his/her study and previous experience to actual classroom situations that a teacher will face in a Response to Intervention Classroom; (b) integrate the concepts and skills from different prior learning experiences as well as researched-based principles in reading, comprehension and writing for educational programming and apply to individual situations; (c) become involved in the routine functions of a classroom teacher including planning, assessment, progress monitoring and collaboration with peers. Course requirements are designed to meet Departmental and Commonwealth standards. Between 20-25 hours of clinical practicum are required per week.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 611 Mental Health Literacy w/Field (3 credits)

This course will introduce the concept of social, emotional, and behavioral wellness for PK-12 students. Teacher candidates will be able to define and describe social and emotional learning and identify programs that promote social and emotional competence. They will also be able to describe and define Adverse Childhood Experiences (ACEs), trauma, and mental illness, including how such experiences and conditions can impact the growth, development, and learning of children and adolescents. This course also covers the role of schools in reducing risk factors and increasing protective factors, building assets and fostering resilience in students who experienced trauma and/or mental health issues. This course requires 5 hours of fieldwork, interviewing school personnel about mental health supports for students and faculty/staff.

Prerequisites: SPE 600 or SPE 602 or SPE 603 or SPE 606 or SPE 607 or SPE 700

Attributes: Graduate

SPE 613 Incl. Class Practices w/Field (3 credits)

This course is a comprehensive study of theoretical issues and research-based diagnosis, instructional planning, and programmatic organization of instruction for children with disabilities in inclusive environments. Content will cover curriculum design, development of programs of differential instruction involving evidence-based interventions that meet students' needs based on formative assessment, developmental and educational information; integrated learning experiences; specialized adaptations and resources; practices and procedures validated for specific characteristics of learners and settings; prevention and intervention strategies from multiple theoretical approaches for individuals at-risk for academic or behavioral failure; systematic implementation of instructional variables; systems management necessary for effective instruction of children with disabilities; and promote an understanding of the underlying theories, issues and methods for managing classroom environments. This course requires 15 hours of observation in an inclusive classroom.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 614 SEB Wellness w/Field (3 credits)

This course covers the roles of other relevant child-serving systems within communities that can be supportive to addressing matters associated with social, emotional and behavioral wellness of PK-12 students (e.g., children's mental health, juvenile justice). Confidentiality and professional ethics will be emphasized and required. Teacher candidates will apply skills in communicating and collaborating effectively with children and youth who have experienced trauma and/or mental illness, as well as their families and school and community partners. This course also allows teacher candidates to practice advocating professionally for children and youth and their social, emotional and behavioral wellness. Since this course is the practicum for the Social, Emotional, Behavioral Wellness PK12 endorsement, it requires 40 hours of fieldwork in mental health community agencies.

Prerequisites: SPE 611

Attributes: Graduate

SPE 620 Fund SE Prac for School Ldrs (3 credits)

This course is a critical study of the contemporary and controversial issues within the field of special education emphases will be placed on the role of the supervisor or administrator. Consideration will be given to the philosophical, psychological, and sociological basis of teacher education, including an analytical review of research-based curricula, programmatic innovations, policy issues and their effects, and ethical practices. Discussions will focus on evidence-based core concepts that contribute to effective program planning; investigation of cognitive, academic, behavioral, and psycho-social solutions and implications for those working with exceptional students; and future implications for the advancement of special education diagnostic and instructional services.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 621 Law, Pol & Proced for SE Sup (3 credits)

This course is designed to provide an overview of the legal rights of students and their families in the field of special education, with particular focus on the supervisor's role in implementing and monitoring policy and procedures in districts' special education programs. Content covered includes an overview of laws and litigation and the current status of legislation dealing with special education. The American legal system, particularly in respect to special education, the constitutional and statutory provisions of federal and state law, and judicial decisions interpreting those laws are reviewed. This course will focus on the supervisor's role in addressing issues of identification, IEP development and implementation, equal protection, extended school year (and day), functional behavioral analysis, teacher assistants, least restrictive environments, transition, procedural due process, complaint resolution, and substantive due process doctrines to school practices affecting students with disabilities. Additionally, attention will be given to preparation of focus audits, data collection, basic compliance issues, communicating and collaborating with parents and maintaining active parental support groups. Also, case studies will be conducted that deal with issue, rule, analysis and conclusion (IRAC), as a tool to provide a framework for supervisors to rapidly increase their understanding of emerging, complex legal issues.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 622 Admin & Supv:Spec Ed Progs (3 credits)

The purpose of this course is to provide the student an opportunity for in-depth understanding of the supervisory and administrative duties for the role of Supervisor of Special Education. This course provides the Special Education Supervisor candidate with a specified professional knowledge-base included in the following aspects of leadership: decision-making, leadership theory, communication skills, human relations theory, administrative theory, policy analysis/evaluation, supervision/assessment practices.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 623 Advanced Fieldwork/Seminar (3 credits)

This is a combined seminar/internship experience. This fieldwork experience will provide the candidate with an opportunity for in-depth varied and continuous administrative experiences. The practicum will attempt to include a blend of all the administrative experiences possible to provide professional growth, maturity and stimulation. These experiences will enable the candidate to (a) apply the knowledge and skills acquired through his/her study and previous experience to actual problem and day-to-day administrative duties faced by a Supervisor of Special Education; (b) integrate the concepts and skills from different prior learning experiences and focus on individual situations; (c) become involved in the routine functions of schools/school districts and Intermediate Units.

Attributes: Graduate

SPE 624 Adv Super & Curr Fieldwk/Sem (3 credits)

This is a combined seminar/internship experience. This fieldwork experience will provide the candidate with an opportunity for in-depth varied and continuous administrative experiences. The practicum will attempt to include a blend of all the administrative experiences possible to provide professional growth, maturity and stimulation. These experiences will enable the candidate to (a) apply the knowledge and skills acquired through his/her study and previous experience to actual problem and day-to-day administrative duties faced by a Supervisor of Special Education based on the Educational Leadership course content; (b) integrate the concepts and skills from different prior learning experiences and focus on individual situations; (c) become involved in the routine functions of schools/school districts and Intermediate Units. Course requirements are designed to meet Departmental and Commonwealth standards. The requirements of this course will be a continuation of SPE 623, specifically, an additional 180 hours, for a total of 360 hours of fieldwork activities under the supervision of University faculty.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 626 Assess/ProgMonitorPK12 w/Field (3 credits)

This course will provide an in-depth presentation of the complex issue of assessment, including an examination of evaluation procedures, from pre-referral intervention, eligibility/placement/ program decision-making to progress monitoring of scientifically-based instructional interventions based on Response to Intervention (RTI). Focus will include academic, affective, work-study skill, adaptive functioning, fine motor, and environmental measures. Content coverage will consist of an overview of assessment models including traditional, informal, dynamic, performance, curriculum-based, and alternative techniques. Additional course topics will address legislation, regulations, topical issues, emerging evaluation trends, test modifications/accommodations, parent involvement and assessment/progress reporting. This course requires 12 hours of fieldwork.

Prerequisites: SPE 600

Attributes: Graduate

SPE 630 Design&Tech Differentiated Ins (3 credits)

This course will provide comprehensive coverage of what is involved in the consideration, assessment and implementation of assistive technology for students with special needs including those with specific learning disabilities found most commonly in regular and special education classrooms today. Additional topics will include current and emerging technologies used to enhance instruction for both regular and special learners; school practices related to technology integration and effective uses of technology in the general and special education classroom.

Restrictions: Enrollment is limited to Graduate level students.

SPE 645 Student Teaching Certification (1 credit)

This course is the four week student teaching experience required for those who have an initial teaching certification, are adding special education PK-12 certification, and have taken the inclusive classroom practices course. The focus of this course is on developing skills for creating classroom climate conducive to student achievement and effective inclusive classroom management. Course content will include addressing the specific needs of students with disabilities. Student teachers are expected to complete 140 hours (equal to four 35-hour weeks) of direct teaching/co-teaching. Time in the classroom may be spread out over more than four weeks, but must equal 140 hours. The class may be in a public (urban or suburban), private, charter, segregated special education, or parochial school but must contain at least 10% of students who have Individual Educational Plans (IEPs). In all placements, student teaching supervisors conduct formal classroom observations and complete PDE evaluations while collaborating with the cooperating or mentor teacher(s) in supervising and evaluating the student teacher.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 646 Student Teaching Certification (6 credits)

This course is the full semester student teaching experience required for graduate students seeking special education PK-12 certification who do not have an initial teaching certificate. The focus of this course is on developing skills for creating classroom climate conducive to student achievement and effective inclusive classroom management skills. Course content will also include addressing the specific needs of students with disabilities in an inclusive setting. Student teachers are expected to complete a full semester (12 weeks) of direct teaching/co-teaching. The class may be in a public (urban or suburban), private, charter, segregated special education, or parochial school but must contain at least 10% of students who have Individual Educational Plans (IEPs). Student teaching supervisors conduct formal classroom observations and complete PDE 430 evaluations while collaborating with the cooperating or mentor teacher(s) in supervising and evaluating the student teacher.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 670 Special Topics: Special Educa (1-3 credits)

The theme or topic for this course will change as topical interests among graduate students and faculty change.

Attributes: Graduate

SPE 700 Special Education Law/Policy (3 credits)

This course is designed to provide an overview of the legal rights of students and their families in the field of special education. Students will explore the source, history, and current status of special education law. Content covered will include an overview of laws and litigation affecting special education. The American legal system, particularly in respect to special education, the constitutional and statutory provisions of federal and state law, and judicial decisions interpreting those laws are reviewed. This course relates equal protection, procedural due process, and substantive due process doctrines to school practices affecting students with disabilities.

Attributes: Graduate

SPE 701 Cog Proc: Resrch Brain Studies (3 credits)

This course provides an integrative survey of knowledge and research in the cognitive and neurological development of the young mind. The content is designed to connect cognition, neuroscience and educational practice with the critical periods of child development, including language development, visual systems, and psycho-social growth. Attention will be given to the basic structures of the brain and their corresponding dynamic functions, how neurons communicate with each other, and ways that networks of cells function in the vision, memory, and learning processes. The interaction and effects of learning and thinking and how the brain processes, consolidates and internalizes information will be explored.

Attributes: Graduate

SPE 702 Culturally Responsive Teaching (3 credits)

This course is designed to align instruction along with the assets and differential needs of diverse student populations through applying and incorporating multicultural perspectives into the teaching-learning process to maximize the academic, cognitive, personal, and social aspects of student learning. It will provide ways to design and deliver culturally responsive strategies to work with culturally and linguistically diverse students and empower their families in the teaching and learning process. The course focuses on addressing challenges to the reading achievement of culturally, linguistically, and economically diverse students with disabilities. Issues covered will include assessment and intervention, curricula development and social/affective skills related to family, community, values and culture of students from different cultural and ethnic groups

Attributes: Graduate

SPE 710 WRP: Intro Multisens Lang Inst (1 credit)

This online Wilson introductory course examines the definition of dyslexia and common characteristics, reading research and the five areas of reading in relation to students beyond grade two with persistent phonological coding deficits. Specifically studies the Wilson Reading System® (WRS), including student identification and placement, program implementation, progress monitoring, scheduling, and creating a successful classroom environment; principles of language structure; and how to teach language with direct, multisensory methods. Wilson Reading Certification course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 711 WRP: Int Instr- NonRepsRdr 1-3 (3 credits)

This course presents in detail the multisensory structured language instruction that is required for teaching students beyond grade two with word-level deficits who are unresponsive to previous instruction. This online course provides practical application of reading research, with particular emphasis on phonological awareness, phonics and spelling at the beginning levels of decoding and encoding as well as expands upon these concepts with specific instruction in the closed syllable pattern. Provides specific procedures to teach the concepts presented in Wilson Reading System (WRS) Steps 1-3. Additional topics include accuracy and automaticity of word recognition, fluency with decodable and authentic text, vocabulary and listening/reading comprehension at beginning stages of reading. Wilson Reading Certification course.

Prerequisites: SPE 710

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 712 WRP: Int Instr- NonRepsRdr 4-6 (3 credits)

This is a continuation of the Wilson Steps 1-3 on-line course. Presents in detail the multisensory structured language instruction that is required for teaching students beyond grade two with word-level deficits who are unresponsive to previous instruction. This online course provides practical application of reading research, with particular emphasis on phonological awareness, phonics and spelling at the beginning levels of decoding and encoding as well as expands upon these concepts with specific instruction in the vowel-consonant-e, open, and consonant-le syllable patterns. Provides specific procedures to teach the concepts presented in Wilson Reading System® (WRS) Steps 4-6. Additional topics include the ten critical points of the Wilson Reading System, dyslexia, non-controlled text, and handwriting. Wilson Reading Certification course.

Prerequisites: SPE 710 and SPE 711

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 713 WRP: Int Instr- NonRepsRdrPrac (3 credits)

This course, a supervised practicum, requires identifying and securing a practicum student in grades 4 - 12 with significant word level deficits, selected according to WRS practicum student selection criteria. Although not required, a second practicum student is highly recommended. The practicum entails successful delivery of a minimum of 60 Wilson Reading System (WRS) lessons and teaching mastery through WRS Step 4.2. A Wilson trainer observes the participant working with his / her student five times during the practicum via videoconferencing. Must demonstrate that the teaching plan is based on continuous assessment of the student's needs. *This course is completed over two semesters, generally spanning one academic year. Please Note: Although completion of SPE 710, SPE 711, SPE 712 and SPE 713 are required for WRS Level I Certification, certification is not guaranteed and is dependent upon successful fulfillment of all Wilson requirements.

Prerequisites: SPE 710 and SPE 711 (may be taken concurrently) and SPE 712 (may be taken concurrently)

Attributes: Graduate

SPE 720 Intro ASD: Caus Diag & Advoc (3 credits)

This course will provide candidates with an introduction to Autism Spectrum Disorders (ASD). With the increase in the number of individuals being diagnosed with ASD, this course will examine the challenge ASD presents to families, educators, students, related service providers, advocates, and policy makers. Course content will include an overview of ASD; family issues and challenges; ASD screening, diagnosis and assessment; an overview of intervention and treatment approaches; accessing appropriate supports and services; policy issues; advocacy and the experience of individuals living with ASD. Autism Spectrum Disorder Specialist Endorsement course.

Attributes: Graduate

SPE 721 Aug & Alt Com & Soc Stratg (3 credits)

This course will focus on a wide range of current research and evidence-based practices in the area of Augmentative and Alternative Communication (AAC) as it is implemented to increase, improve, and maintain functional communication skills of students with Autism Spectrum Disorder (ASD). In addition, specific strategies and techniques to address socialization skills for individuals with ASD as well as their communication partners will be addressed. Case studies, discussions, and activities will be utilized to personalize these strategies and techniques. Autism Spectrum Disorder Specialist Endorsement course.

Attributes: Graduate

SPE 722 Evid Based Prac: AI&I Method (3 credits)

This course will provide comprehensive coverage of the importance of using evidence-based practice in assessment, instruction, and implementation of interventions for individuals with Autism Spectrum Disorder (ASD). Course content will include identifying the legal basis and requirements for evidence-based practice; a review of how to locate and evaluate evidence in the literature base; (a review of the theoretical basis of, and evaluation of the empirical evidence for screening and assessments; a review of the theoretical basis of, and evaluation of the empirical evidence for screening and assessments; the continuum of interventions from traditional behavior to social-developmental-pragmatic; comprehensive program approaches; and instructional strategies in the classroom. Additional topics will include the use of medical, dietary, and sensory interventions in the schools; pseudoscience and fad interventions; and finding the middle ground between parents and professionals in the decision-making process. Autism Spectrum Disorder Specialist Endorsement course.

Attributes: Graduate

SPE 723 Autism: Behv Manag Approaches (3 credits)

This course will examine and introduce the major therapies/educational interventions that have been developed to treat autism and related pervasive developmental disorders. Applied behavior analysis (ABA), an empirically- validated treatment for individuals with autism and related disabilities will be discussed in detail. In addition, other emerging treatments including Greenspan, Relationship Development Intervention, and the principles of Positive Behavioral Supports (PBS) in Universal Design for Learning (UDL) will be examined in relation to ABA. In addition, scientific criteria will be compared to pseudoscientific criteria for various interventions. This course is relevant for both novices and experienced practitioners in the field of autism treatment. Autism Spectrum Disorder Specialist Endorsement course.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 730 Ed Found - Deaf & Hard of Hear (3 credits)

This course introduces basic concepts for the education of deaf and hard of hearing students. Topics covered include the social construction of deafness; the history of deaf education; families of deaf and hard of hearing children; language and literacy development; educational philosophies and approaches; cognitive and academic development; basic concepts in audiology; cochlear implants; placement options; deaf students with disabilities; and transition to life after school. The course is grounded in the perspective that varying levels of hearing ability are aspects of human diversity. Field Experience hours are required.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 731 Lang, Lit & Comm Dev-Deaf & HH (3 credits)

This course will introduce students to the major elements of language and literacy development and scientifically-based reading instruction pertaining to D/HH learners. Multi-modal strategies for facilitating language acquisition and integrating language and literacy instruction across academic content areas are reviewed. Students will explore literacy programs, create technology-embedded lesson plans, and perform assessments. They will also be introduced to resources and strategies for supporting families. Field experience hours are required. Students will also consider personal plans for expanding their own communication and language repertoire.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 732 Curr, Inst & Lrn Env-Deaf & HH (3 credits)

This course content will cover what teachers of DHH learners need to know in order to choose and effectively implement the most appropriate curriculum and instruction methods. Progress monitoring, data collection and analysis will guide students with decision-making regarding goals and objectives. Attention will also be given to how curriculum and instruction are differentiated through varied learning environments (general, special education and private education settings). Field experience hours are required. Students will have the opportunity to observe DHH students across different placements.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 733 List & Spk Skills - Deaf & HH (3 credits)

This course will provide information regarding the etiology and age of onset of hearing loss, anatomy and physiology of the hearing mechanism, degree and type of hearing loss, and interpretation of audiological results. The course will also offer information on auditory skill development, the utilization of various forms of amplification including hearing aids, cochlear implants, and FM systems, and the relationship of classroom acoustics to auditory access. Additionally, information in the area of spoken language development will be provided, including speech sound acquisition, development of vocabulary, syntax and pragmatics, and the relationship of listening and spoken language to literacy.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 734 Sign Comm in Instruct Settings (3 credits)

This course introduces and expands upon the advantages that sign language and other visual communication systems offer in the education of DHH learners. Among the topics covered are the history and structure of American Sign Language (ASL), the nature and characteristics of artificial sign systems based on English systems, as well as tactile systems for DHH learners with additional sensory differences including the DeafBlind. Interpreted education is also reviewed along with other educational tools such as fingerspelling.

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

SPE 739 Student Teach & Prof Seminar (6 credits)

This is an individually designed field experience under approved supervision (including seminar meetings). This experience is designed as the capstone professional course for students seeking the Hearing Impaired (PK-12) certification (PA). It approximates full-time working/teaching experience for one full semester. At the conclusion of this experience, students must have demonstrated proficiencies in instructional management and specially designed instruction, student engagement and motivation, curriculum planning, learning theory, problem solving in an educational setting, using computers in the classroom, integrating reading, language, and literacy skills in all classrooms, the use of audiovisual materials in the classroom, communicating effectively with students and staff members who are deaf or hard of hearing in their preferred languages and modes of communication, the identification of instructional resources, assessment of student achievement, the development of IEP goals and objectives, management of amplification systems, assessment and development of listening and spoken language skills, consultation with regular classroom teachers, modification of the classroom acoustic environment, and development of student compensating strategies. The fieldwork course is typically the final course in a certification sequence. Includes a weekly online seminar session.

Prerequisites: SPE 600 and SPE 608 and SPE 612 and SPE 730 and SPE 731 and SPE 732 and SPE 733 and SPE 734

Restrictions: Enrollment is limited to Graduate level students.

Attributes: Graduate

Surgical Technology (SUR)

SUR 100 Perioperative Services (2 credits)

This course introduces the hospital environment, roles and expected professional behaviors of health care workers. Students will also gain knowledge of the preoperative needs of surgical patients.

Prerequisites: SUR 102 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Surgical Technology.

Attributes: Undergraduate

SUR 102 Perioperative Pharmacology (2 credits)

This course provides an introduction to the use of medications within the surgical department including those used by the anesthesia team.

Restrictions: Enrollment is limited to students with a major in Surgical Technology.

Attributes: Undergraduate

SUR 103 Surgical Armamentarium (2 credits)

This course introduces the student to the instruments, equipment and techniques available to the medical practitioner during surgical procedures.

Attributes: Undergraduate

SUR 110 Intraoperative Patient Care (4 credits)

This course outlines the requirements for safe patient care within the operating room. Students will gain an understanding of the surgical technologist's responsibilities to the patient and all members of the surgical team.

Prerequisites: SUR 100 and SUR 102

Restrictions: Enrollment is limited to students with a major in Surgical Technology.

Attributes: Undergraduate

SUR 115L Perioperative Svcs Lab (3 credits)

This course introduces the student to the perioperative services department. Students will demonstrate the duties of a Surgical Technologist in the scrubbed role during the perioperative phase of patient care.

Attributes: Undergraduate

SUR 212 Professionalism (1 credit)

This course provides the surgical technology student an opportunity to understand the hiring process and prepare for employment as an entry-level surgical technologist. Additionally, students will explore alternate roles a surgical technologist may fulfill inside and outside of the operating room.

Restrictions: Enrollment is limited to students with a major in Surgical Technology.

Attributes: Undergraduate

SUR 215C Periop Serv I Clinical (0 credits)

All students in SUR 215 must also register for SUR 215C Clinical.

Attributes: Undergraduate

SUR 215L Periop Serv I Lab (4 credits)

This course allows the surgical technology student to apply theory and lecture content to the surgical setting. Students will participate in a supervised clinical setting while developing the skills of a professional surgical technologist.

Prerequisites: (SUR 115L or SUR 115) and SUR 110

Attributes: Undergraduate

SUR 225C Periop Serv II Clinical (6 credits)

This course focuses on continued application of lecture and laboratory material to the clinical setting. Students remain in supervised clinical specialty rotations, with a focus on more technical surgical procedures. Integration of the surgical technologist's role is emphasized.

Prerequisites: SUR 215 or SUR 215L

Attributes: Undergraduate

SUR 230 Surgical Proc & Patho I (4 credits)

This course begins an intensive look at the pathophysiology affecting surgical patients and the procedures utilized to correct deformity or treat disease. Students also explore advancements in the surgical field.

Prerequisites: SUR 110 (may be taken concurrently)

Attributes: Undergraduate

SUR 240 Surgical Proc & Patho II (4 credits)

This course continues to look at the pathophysiology affecting surgical patients and the procedures utilized to correct deformity or treat disease. Students will explore theories on future advancements in surgery.

Prerequisites: SUR 230

Attributes: Undergraduate

SUR 299 Certification Exam Review (1 credit)

This course focuses on the review of knowledge common to competent entry-level Surgical Technologists.

Attributes: Undergraduate

Theology (also see REL crses) (THE)

THE 153 Encountering the New Testament (3 credits)

This course examines the biblical traditions and texts of the Christian Scriptures as products of particular historical and cultural communities, and as literary and theological documents. Although it focuses on the New Testament, the course will also introduce biblical studies more generally, including the relationship between the Hebrew Bible and New Testament. Special attention will be paid to the need for historical- and literary-critical methods to interpret the Bible as mandated by the 1943 Papal encyclical, "Divino Afflante Spiritu," and later Church documents. This course will also help students acquire familiarity with the great diversity in the New Testament about regarding the person and significance of Jesus, the role and structure of the Christian community, and how discipleship is understood.

Attributes: CCC: Theology, GEP: Signature Course, Undergraduate

THE 154 Catholic Theological Tradition (3 credits)

This course critically engages the Christian, particularly Catholic, understanding of humanity in relation to God. It undertakes this study from historical/chronological, philosophical, or thematic/topical approaches. It introduces central Christian theological concepts, such as the doctrines of Christ, the human person, sin/grace/salvation, sacramentality, and moral principles such as the preferential option for the poor, solidarity, and the common good.

Attributes: CCC: Theology, GEP: Signature Course, Theology Level 1, Undergraduate

THE 155 Catholic Social Tradition (3 credits)

This course engages students in study of Christian teachings and practices related to the call to social responsibility, particularly in what is known as Catholic Social Teaching. Students examine the theological, historical, and biblical foundations of ethical commitments, explore a variety of central principles within the tradition (for instance, human dignity, social justice, rights, solidarity, and preferential option for the poor); and analyze how these ethical insights inform analysis of situations in the contemporary world (for instance, economic justice, international development, human rights, war and peace, the forced migration, and care for the global environment).

Attributes: CCC: Mission: Ethics Social Justice, CCC: Theology, GEP: Signature Course, Undergraduate

THE 161 Christian Social Ethics (3 credits)

This course provides a general overview of the forms and teachings of Christian ethics and how they impact the broader society. Specific social forms based upon human rights, theological virtues, conceptions of justice and the common good will be analyzed through teachings on war, the conquest, race, gender, class and the relationship between church and state. Particular attention will be given to the recent papal encyclicals.

Attributes: CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, Health Care Ethics Course, Justice Ethics and the Law , Undergraduate

THE 170 Special Topics in Theology (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: CCC: Theology, Undergraduate

THE 201 Christian Origins (3 credits)

A study of the cultural and historical matrices of the early Jesus movement, its rise and early developments, and the emergence of institutionalized practices and belief systems that coalesced in the formation of Christianity. The course is organized chronologically and employs the standard tools and theoretical approaches of modern historical-critical methodology, such as those derived from anthropology, sociology, literary criticism, and classical archaeology. Ancient Studies
Attributes: CCC: Theology, Undergraduate

THE 221 Synoptic Gospels (3 credits)

This course will progress in two movements. It first will investigate the historical background of the growth of the gospel tradition. It then will read the Gospels as viable literary texts, making use of the most recent advances in the literary critical study of Matthew, Mark, and Luke-Acts. In this way, the course will focus upon the theological uniqueness of each book, as well as tracing their interrelatedness. Ancient Studies

Attributes: CCC: Mission: Faith Reason, CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 222 Letters of Paul (3 credits)

The aim of this course is to examine the main characteristics of Paul's faith as found in his epistles. The course will establish the broad argument of each of the letters, their historical setting, and their literary and rhetorical character, and demonstrate how these elements work together to express Paul's gospel. Ancient Studies

Attributes: CCC: Mission: Faith Reason, CCC: Theology, Undergraduate

THE 223 Early Christian Thought (3 credits)

An historical and theological investigation of the Christian community during the first four centuries. Among the topics to be considered are the relationship of the early church to classical culture, conflicts over issues of orthodoxy and heresy, and the links between historical context and early Christian doctrinal claims. The course will also investigate the development of the canon of Scripture, Christian leadership structures, the creeds, and early Christian traditions of martyrdom, monasticism, the sacraments and worship.

Attributes: CCC: Theology, Undergraduate

THE 261 Christianity & Media (3 credits)

This course offers an opportunity to explore the relationships between Christianity and the wide variety of modes of communication that we refer to as "media." In the course, students will engage in two basic tasks. First, students will engage in the descriptive task of identifying the current state of the media with respect to religion. How are religions and religious issues portrayed in various media? How do Christians understand and use media for their various purposes? Second, the class will engage in the normative task of judging the social and moral worth of the various modes of communication using the resources of the discipline of Christian social ethics. Does the current media landscape support human flourishing and the just society? If so, what should be done to ensure that this continues? If not, how might it be shaped so that it supports such development?

Attributes: CCC: Mission: Ethics Social Justice, CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, Undergraduate

THE 262 Technology Ethics (3 credits)

This course will engage in critical reflection on technology, its role in human lives, and its impact on society. The course will examine various theories of the nature technology. It will also investigate particular resources available within the discipline of Christian social ethics that are central to understanding and evaluation the moral worth of various technologies, such as common good, justice, human dignity, development, and solidarity. These conceptual tools will then be used to explore the ethical implications of technology will be the assessment of a variety of particular cases of both commonplace and emerging technologies (e.g., civil engineering, cellular telecommunications, social media, surveillance, digital divide, data security, product manufacturing and disposal, intellectual property, body modification, and the post-human movement).

Attributes: CCC: Mission: Ethics Social Justice, CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, Justice Ethics and the Law , Undergraduate

THE 270 Special Topics in Theology (3 credits)

Concentrated focus on a selected theme in theology at an advanced level. Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Certifications differ by section.

Attributes: CCC: Theology, Undergraduate

THE 335 Gendr & Christian Spirituality (3 credits)

An examination of some of the spiritual classics written by both the men and women of the Christian faith. Emphasis on reading and study of primary texts, largely medieval, with an eye to any discernible differences between men as spiritual authors and women as spiritual authors. Course will also examine the given perceptions of gender, spirituality and eroticism.

Attributes: CCC: Theology, GEP: Diversity Course, Faith Justice Course, Gender Studies Course, Undergraduate

THE 337 Compassionate Care in Clin Set (3 credits)

Compassion is the bridge between curing and healing: Curing restores a patient to health; healing restores a person to wholeness. This course examines the philosophical, theoretical, and practical foundations of compassionate care. Topics include current research in the science of compassion, clinician burnout and fatigue, the maintenance of compassionate care in the face of suffering, clinician self-care, and the organizational factors that establish a culture of compassionate care. Course materials will be drawn from cultural anthropology, philosophy, medicine, psychology, and sources both spiritual and religious.

Attributes: CCC: Mission: Faith Reason, CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 339 Darwin, Dogma, and Ecology (3 credits)

In his 2015 encyclical, *On Care for our Common Home* (Laudato Si'), Pope Francis makes an urgent appeal to "every person living on this planet" for dialogue and action in the face of impending environmental collapse. Of course, the pope's argument is grounded in Roman Catholic teaching; however, his critique is more philosophical than theological. It concerns not just the detrimental effect modern technology has had on the environment, but, more fundamentally, how modern science understands our knowledge of the world, and how in turn this understanding has adversely affected human action. The course will investigate the development within Catholicism of an evolutionary worldview that critically embraces neo-Darwinian science, but also distinguishes between religious faith-traditions and secular faith-traditions, suggesting how the former might prove more effective than the latter in addressing the ecological crisis.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 340 Atheism and the Case for God (3 credits)

Over the past twenty years several best-selling authors have mounted a concerted attack on religion, advancing an argument that is, purportedly, so fresh and compelling as to earn them the title, "The New Atheists." The more important and enduring cultural phenomenon affecting religious practice today is the secularism that has increasingly dominated modern civilization, religious belief and practice became significant options rather than cultural givens. This course deals with the question of whether secularism arose in reaction to religion, or as one of religion's greatest success stories. Much of the analysis will be historical: When and how did the secular movement arise? What notion of "God" did it reject? But the course will also address questions that are more philosophical and theological in nature: Has natural science disproved religion? And is secularism properly understood as necessarily concurrent with scientific advance?

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 341 Jesus through the Centuries (3 credits)

An inquiry into Western Christianity's understandings of the meaning and significance of Jesus Christ, including New Testament Christologies, the controversies of the 4th and 5th century councils, medieval atonement theories, post-Enlightenment problems and reformulations, and contemporary liberation Christologies. Students will be encouraged to develop their own Christological position as an integral part of the course.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 345 Evil as a Theological Problem (3 credits)

An examination of the profound challenge both to religious understandings of a meaningful and ordered existence and to theological claims regarding an omnipotent, beneficent deity rendered by the occurrence of evil and the suffering that accompanies it. The course will contextualize particular manifestations of evil and investigate how evil is identified, explained, challenged and interpreted through texts in theology and popular culture, with particular attention to its modern and contemporary manifestations.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 211)

Attributes: CCC: Theology, GEP: Faith-Reason Course, Undergraduate

THE 348 Theology and Science (3 credits)

An exploration of the Galileo Case, evolution, contemporary Big Bang cosmology, and quantum theory show how the relationship between theology and science has developed to the present day. The scientific, methodological and theological issues will be critically evaluated for their significance today. Students will thus be provided with the basic tools for understanding and participating in the contemporary dialogue between science and theology.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, GEP: Faith-Reason Course, Theology Level 3, Undergraduate

THE 349 Theology of Disability (3 credits)

This course will examine the relationship between the way in which human disability is approached, on the one hand, from the perspective of the theological anthropology found in the Christian faith and, on the other hand, how it is approached by other contemporary discourses. More specifically, the course will examine the adequacy of certain contemporary approaches to disability and inquire into ways in which the Christian theological tradition can contribute to the project of rethinking and re-imagining the nature of human disability as well as the nature of the human person in general.

Attributes: CCC: Diversity, CCC: Mission: Faith Reason, CCC: Theology, GEP: Diversity Course, Faith Justice Course, Health Care Ethics Course, Undergraduate

THE 350 The Beauty of God (3 credits)

This course explores how beauty serves as a way to God. In the history of all three major monotheistic faith traditions (Judaism, Christianity, and Islam), it was believed that God identified himself through various divine names. Focusing primarily, though not exclusively, on the Judeo-Christian tradition, this course examines beauty as one of these divine names. Consequently, the mode of theology that will ground this exploration is what has recently come to be called theological aesthetics. As a mode of theology, or a theo-logic, theological aesthetics draws from the principles of human reason as the art of thinking well (hence as a logic) and the event of divine revelation. Insofar as it unites theology with beauty, a theological aesthetic not only draws from the grammar, language, and thinking associated with beauty and art, but attempts to tie these more deeply to both human reason and divine revelation. Taking its cue from aesthetic experience, this course is divided into three basic parts: part 1 is the encounter with the object of interest, namely God's existence; part 2 examines the subjective aspects of the encounter, namely, the socio-cultural dimensions of how we come to understand God, "religion," faith, etc.; and part 3 examines the results inspired by the encounter, namely, the reception of divine beauty in revelation, music, responding to evil and human suffering, and mysticism.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Mission: Faith Reason, CCC: Theology, GEP: Faith-Reason Course, Medieval, Ren & Reform Studies, Undergraduate

THE 351 Ignatian Spirit in Jesuit Trad (3 credits)

An examination of and reflection on the religious vision of Ignatius of Loyola and its embodiment in the life of the Society of Jesus, including a reading of the Spiritual Exercises. An overview of the major movements and influential persons in Jesuit history, a study of Jesuit spirituality and theology, and a consideration of the role of the Jesuits in broader church life.

Attributes: CCC: Theology, European Studies Course, Undergraduate

THE 356 Liberation & Pol Theologies (3 credits)

An inquiry into the critique and vision brought to theology by the perspective of the poor and oppressed in the 20th century via the paradigm known as liberation and political theology. An extensive examination of the context and methods of Latin American liberation theology followed by an examination of European political theology and African-American liberation theology. Other topics for consideration may include the work of Hispanic, Asian, African, and North American feminist liberation theologians.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, Faith Justice Course, GEP: Faith-Reason Course, Latin American Studies Course, Undergraduate

THE 357 Feminist Theologies (3 credits)

An inquiry into the sources, contexts, methods, and symbols of Christian theology from the perspective of women in the process of human liberation. The roles of women in church and society, the history of the women's movement in North America, and the experiences and theological perspectives offered by feminists of differing racial, ethnic and socioeconomic background will be examined. Feminist reflections within other religious traditions may also be considered.

Prerequisites: (THE 153 or THE 154 or THE 155 or THE 221)

Attributes: CCC: Theology, Faith Justice Course, GEP: Faith-Reason Course, Gender Studies Course, Undergraduate

THE 360 Story as Theology (3 credits)

This course introduces fiction and films that are driven by religious sensibilities and theological insights. Issues rising throughout the course include deity, sin, forgiveness, grace, redemption, virtue, and community. Student expectations entail critical analysis and theological reflection, as well as a very basic grasp of the phenomenon of human religiosity.

Attributes: American Studies Course, CCC: Theology, Undergraduate

THE 366 Christian Medical Ethics (3 credits)

With the technological inauguration of the age of new medicine we have at our disposal more means than norms for intervention in the life, health, and death processes of human existence. Even more crucial is the question: "Should we do everything that is within our capacity to do?" Consideration will be given to the contribution of Christian ethicists in their reflection on the issues involved in abortion, reproductive engineering (AIH, AID, IVF, cloning, etc.), care of the dying, euthanasia, medical experimentation, organ transplantation, and the rights of patients.

Attributes: CCC: Mission: Ethics Social Justice, CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, Health Care Ethics Course, Justice Ethics and the Law , Undergraduate

THE 368 Just Hlth Care in Dev Nations (3 credits)

Just Health Care in Developing Nations: An investigation of adequate health care as a fundamental human right. The course will proceed from the premise that socially induced needs are a result of historical development of material and social conditions, coupled with a social consensus that some things are necessary for happiness, social life, or some other goal. It will consider the inability of many societies to supply adequate health care as an issue of basic personal dignity, a claim against society, and as a matter of justice. The course will examine the issue of just health care for all peoples from both public health and ethical perspectives. When taught as a study tour, students will travel internationally.

Attributes: CCC: Mission: Global Citizenship, CCC: Theology, GEP: Ethics Intensive, GEP: Globalization Course, Health Care Ethics Course, Justice Ethics and the Law , Latin American Studies Course, Theology Level 3, Undergraduate

THE 370 Special Topics in Theology (3 credits)

Concentrated focus on a selected theme in theology or religion at an advanced level. Topic and content varies from semester to semester. Course may be taken twice for credit as the topic changes. Other certifications differ by section.

Attributes: CCC: Theology, Undergraduate

THE 373 Economic Ethics (3 credits)

Economic Ethics: This course will examine the historical, social and philosophical conditions that gave rise to economics as a distinct discipline. Both the theory and practice of economics will be subjected to an ethical analysis drawing upon biblical and theological sources, particularly emphasizing Catholic teaching. Different economic systems will be compared and different forms of economic life and teaching within the Christian church will be discussed.

Attributes: CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, GEP: Globalization Course, Justice Ethics and the Law , Undergraduate

THE 374 War and Peace (3 credits)

Throughout Christian tradition, theologians have argued for and against Christian participation in war. This course will examine these arguments through reading relevant biblical, theological, historical and philosophical materials. We may explore how the various arguments have been represented (or misrepresented) in popular culture through film.

Attributes: CCC: Theology, GEP: Ethics Intensive, Faith Justice Course, Irish Studies Course, Undergraduate

THE 392 Directed Readings in Theology (3 credits)

A study of significant themes or issues in Theology or Religious Studies under the direction of faculty in the department. Frequent consultations and written reports are required. Prior written permission of the instructor and approval from the chair is required.

Attributes: CCC: Theology, Undergraduate

THE 470 Special Topics in Theology (3 credits)

Topics will vary according to the semester in which the class is offered.

Attributes: CCC: Theology, Undergraduate

THE 491 Internship in Theology I (3 credits)

This course is an experiential learning experience in which students work 10 hours per week (total 130 hours) in an organization related to Religious Studies. The internship is a way to see how different areas of theological study are used "on the ground" in public, private, non-profit, community, and church-related organizations. In addition to their hours, students must keep a journal, meet regularly with their faculty adviser, and complete a final essay/presentation that connects their learning experience in the internship to their other coursework and the goals of the major. For more information and for the required application, please see the department chair.

Attributes: CCC: Theology, Undergraduate

THE 492 Internship in Theology II (3 credits)

This course is an experiential learning experience in which students work 10 hours per week (total 130 hours) in an organization related to Religious Studies. The internship is a way to see how different areas of theological study are used "on the ground" in public, private, non-profit, community, and church-related organizations. In addition to their hours, students must keep a journal, meet regularly with their faculty adviser, and complete a final essay/presentation that connects their learning experience in the internship to their other coursework and the goals of the major. For more information and for the required application, please see the department chair.

Attributes: CCC: Theology, Undergraduate

THE 493 Ind Research in Theology (3 credits)

Independent research and writing under the direction of faculty in the department. Prior written permission of the instructor and approval from the chair are required. Course may be taken twice for credit as the topic of research changes.

Attributes: CCC: Theology, Undergraduate

THE 494 Ind Research in Theology (3 credits)

Independent research and writing under the direction of faculty in the department. Prior written permission of the instructor and approval from the chair are required. Course may be taken twice for credit as the topic of research changes.

Attributes: CCC: Theology, Undergraduate

Vascular Sonography (VAS)

VAS 112 Vasc Sonography Procedures I (3 credits)

This course will prepare the student to perform indirect arterial testing. Normal and abnormal anatomy will be explored. In addition, basic vascular procedures will be discussed.

Prerequisites: VAS 113L (may be taken concurrently) or VAS 237L (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 113L Vascular Sonography Lab I (1 credit)

This course will introduce the skills needed to perform indirect arterial testing. The students will practice basic scanning procedures in a simulated clinical environment.

Prerequisites: VAS 112 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 224C Vascular Clinical I (3-4 credits)

This course is designed to introduce the student to the fundamental skills needed for vascular scanning. The student will apply knowledge learned throughout the Vascular Sonography program to demonstrate clinical competency in specific vascular procedures in the clinical environment.

Prerequisites: VAS 112 or (VAS 238L or VAS 235L)

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

VAS 227 Vascular Sonography Proc II (3 credits)

This course will prepare the student to perform arterial duplex imaging. Normal and abnormal anatomy associated with arterial duplex imaging will be explored.

Prerequisites: VAS 224 (may be taken concurrently) or VAS 224C (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 230 Vascular Sonography Adv Topics (3 credits)

This course will prepare the student for professional practice. The students will learn about advancements in technology, disease process, clinical procedures, and professional development.

Prerequisites: VAS 227

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 231 Vascular Sonography Review (3 credits)

This course will prepare the student for the Vascular Sonography registry exam. Topics related to arterial and venous sonographic procedures will be discussed and reviewed.

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 233C Vascular Clinical II (3-6 credits)

This course will further prepare the student in a clinical setting to enhance the student's vascular scanning skills. The student will apply knowledge learned throughout the Vascular Sonography program to demonstrate clinical competency in specific vascular procedures in the clinical environment.

Prerequisites: VAS 224C or VAS 224

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

VAS 234C Vascular Clinical III (4-8 credits)

This course will provide continued clinical experience in all previously studied arterial and venous sonograms. The student will apply knowledge learned throughout the Vascular Sonography program to demonstrate clinical competency in specific vascular procedures in the clinical environment.

Prerequisites: VAS 233C or VAS 233

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

VAS 235L Vascular Sonography Lab II (1 credit)

This course will introduce the skills needed to perform arterial duplex vascular examinations and extracranial arterial sonograms. Venous sonograms are also introduced in this course. The students will practice these procedures in the simulated clinical environment.

Prerequisites: VAS 113L and (VAS 224 (may be taken concurrently) or VAS 224C (may be taken concurrently)) and VAS 227 (may be taken concurrently) and DMS 227 (may be taken concurrently)

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 236L Vascular Sonography Lab III (1 credit)

This course will introduce the skills needed to perform intra-abdominal and intracranial vascular sonograms. Venous and arterial sonograms are also expanded upon in this course. The students will practice these procedures in the simulated clinical environment.

Prerequisites: (VAS 235L or VAS 238L) and (VAS 233 (may be taken concurrently) or VAS 233C (may be taken concurrently))

Restrictions: Enrollment is limited to students with a major in Vascular Sonography.

VAS 237L Vascular Lab I (1 credit)

This course will introduce the skills needed to perform indirect arterial testing, extracranial arterial, intracranial arterial and venous sonograms in a simulated clinical environment.

Prerequisites: DMS 111

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

VAS 238L Vascular Lab II (2 credits)

This course will introduce the skills needed to perform arterial duplex vascular examinations and intra-abdominal sonograms in a simulated clinical environment. Venous and arterial sonograms are also expanded upon in this course

Prerequisites: (VAS 237L or VAS 113L)

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

VAS 239 Vascular Seminar (1 credit)

This course will prepare the student for professional practice.

Prerequisites: VAS 233C or VAS 233

Restrictions: Enrollment is limited to students with a major in Diagnostic Medical Sonography.

Attributes: Undergraduate

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Gérard A. Férère (1964) Bachelier ès Lettres, 1948, Haiti; Ensign, 1953, Naval Academy, Venezuela; M.A., 1966, Villanova University; Ph.D., 1974, University of Pennsylvania. *Professor Emeritus of Modern and Classical Languages*

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George H. Webster, Jr. (1980) B.S., 1964, Seton Hall University; M.B.A., 1969, Seton Hall University; M.A., 1973, State University of New York, Binghamton; Ph.D., 1981, State University of New York, Binghamton *Professor Emeritus of Finance*

Dennis W. Weeks (1977) A.B., 1971, Saint Joseph's University; M.F.A., 1975, School of the Art Institute of Chicago *Professor Emeritus of Art*

Ronald C. Wendling (1972) A.B., 1962, Fordham University; Ph.L., 1963, Fordham University; A.M., 1965, Fordham University; Ph.D., 1970, Case Western Reserve University. *Professor Emeritus of English*

Dagmar Wienroeder-Skinner (1992) M.A., Rutgers University; M. Phil., 1987, Rutgers University; Ph.D., 1991, Rutgers University *Professor Emeritus of Modern and Classical Languages.*

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