## Academic Calendar 2023-2024

| Fall Semester 2023 |  |
| :---: | :---: |
| Classes Begin | Wednesday, August 23 |
| Last Day to Register/Add Classes | Tuesday, August 29 |
| Last Day to Drop without a W | Tuesday, August 29 |
| Labor Day, No Classes | Monday September 4 |
| Last Day to Drop/Withdraw with W | Friday, November 10 |
| Thanksgiving Break, No Classes | Wednesday-Sunday, November 22 - November 26 |
| Reading/Study Day, No Classes | Thursday, December 7 |
| Final Exams | Friday-Thursday, December 8-14 |
| Last Day of Term, undergraduate programs | Thursday, December 14 |
| Winter Intersession begins | Friday, December 15 |
| Last day to add or drop Winter Intersession without W | Monday, December 18 |
| Last day to drop with a W for Winter Intersession | Monday, January 2 |
| Spring Semester 2024 |  |
| Classes Begin | Monday, January 8 |
| Last Day to Register/Add Classes | Friday, January 12 |
| Last Day to Drop without a W | Friday, January 12 |
| MKL Day, No Classes | Monday, January 15 |
| Wellness Day, No Classes | Monday, February 12 |
| Spring Break | Monday-Friday March 2- March 10 |
| Easter Break, No Classes | Thursday-Sunday, March 28-March 31 |
| Last Day to Drop/Withdraw with W | Friday, April 5 |
| Reading/Study Day, No Classes | Thursday, April 25 |
| Final Exams | Friday-Thursday, April 26 - May 2 |
| Last Day of Term | Thursday, May 2 |
| Commencement | Saturday, May 4 |
|  |  |


| Summer 12024 | Monday, May 13- Friday, June 14 |
| :--- | :--- |
| Classes end, Summer 1 | Friday, June 14 |
|  |  |

## Academic Calendar 2023-2024

| Summer 2 2024 | Monday, June 17-Friday, July 19 |
| :--- | :--- |
| Classes end, Summer 2 | Friday, July 19 |

# The University 

## History

The University of Evansville, an independent, United Methodist Church-affiliated university, holds a strong position in character and quality among institutions of higher education throughout the nation. With five colleges and schools, including the Harlaxton College in England, the University provides outstanding educational opportunities in the liberal arts and sciences as well as in selected professions. The University offers more than 80 academic areas of study and a full range of degree programs, including bachelor's, master's, and doctoral degrees, certification programs, and adult education classes. Approximately 2,700 fulltime and part-time students in credit programs from 42 states and 55 countries study on its beautiful 75 -acre campus.

Founded in 1854 as Moores Hill Male and Female Collegiate Institute in southeastern Indiana, the school was relocated to Evansville in 1919 and renamed Evansville College. In 1967, after continued growth and organizational restructuring, the name was changed to the University of Evansville with the approval of the Indiana General Assembly.

Metropolitan Evansville is located on the banks of the Ohio River in southwestern Indiana. The city of about 122,000 residents serves as the cultural, industrial, and retail center for the Tri-State region encompassing southern Illinois, western Kentucky, and southern Indiana. Evansville is a comfortable drive from Cincinnati, Indianapolis, Louisville, Nashville, and St. Louis.

## Mission And Core Values

## Mission Statement

To empower each student to think critically, act bravely, serve responsibly, and live meaningfully in a changing world.

## Core Values

Integrity: We promote academic and personal integrity to establish a culture of trust. Academic integrity begins with all students pledging to abide by our honor code, and extends to faculty, staff and administration adhering to our code of conduct. It culminates in an expectation of professionalism, transparency, and respect in all interactions. Personal integrity includes practicing informed, ethical decision-making, and respecting the ideas, rights, boundaries, and beliefs of others. Each member of our community is accountable and prepared to act as a responsible citizen of the world.
Innovation: We recognize the value of interdisciplinary teamwork, creative problem solving, global immersion, and learning experiences at home and abroad. We recognize the value of learning from failure. We have the freedom, flexibility, and motivation to create experiences that help our students think critically and act bravely. Each member of our community is challenged to discover novel solutions to modern problems and to become a catalyst for progress.

Intellectual Curiosity: We strive to develop lifelong learners. We introduce students to a variety of ideas that sharpen existing interests and awaken latent ones. We challenge students to stretch their minds, while supporting them with strong faculty engagement. Research, experiential learning, and community outreach foster intellectual curiosity while exposure to new ideas and technologies broadens our students' view of the world and what might be possible.

Inclusive Community: We value openness and collaboration, and recognize that inclusion leads to personal growth. Our commitment to actively fostering a diverse range of cultures and perspectives reflects the characteristics required to thrive in an increasingly global society. The university demonstrates and benefits from inclusion by welcoming all.

Education for the Whole Person: We cultivate intellectual, moral, social, physical, emotional and spiritual wellness through engagement and discovery. We value the liberal arts, sciences, and professional programs as paths to intellectual and personal growth, and we encourage the integration of knowledge across disciplinary lines. We promote engagement in organizations, programs, and the community as essential to personal development. We equip individuals to examine their world, articulate their values, and develop the character needed to live healthy lives of meaning and purpose.

## Vision Statement

The University of Evansville - a leading private university in the Midwest - is recognized nationally for developing students' personal and professional competencies, cultivating critical and creative thinkers, and producing ethical, global citizens equipped to thrive in a world of complexity and change. We accomplish this by attracting and retaining talented and motivated students who succeed within a diverse, supportive, and sustainable environment.

## Accreditation

The University of Evansville is accredited by the Higher Learning Commission. Information about the University of Evansville's accreditation can be obtained through the Higher Learning Commission; 230 South LaSalle Street, Suite 7-500; Chicago, Illinois, 60604-1411; hlcommission.org; 800-621-7440.

The University of Evansville is approved by the University Senate of The United Methodist Church. Additional accrediting bodies include: Association to Advance Collegiate Schools of Business International, National Association of Schools of Music, Accreditation Commission for Education in Nursing, Council for the Accreditation of Educator Preparation, Indiana Department of Education, Commission on Accreditation of Athletic Training Education, Commission on Accreditation in Physical Therapy Education, and The Accreditation Review Commission on Education for the Physician Assistant. The civil, computer, electrical, and mechanical engineering programs are accredited by the Engineering Accreditation Commission of ABET, www.abet.org. The computer science program is accredited by the Computing Accreditation Commission of ABET, www.abet.org.

Approved by the National Strength and Conditioning Association, American Chemical Society, and the American Music Therapy Association, The University of Evansville is also a member of the National Association of Independent Colleges and Universities, Association of Schools and Colleges of The United Methodist Church, and the Association for Continuing Higher Education.

Because of accreditation by or membership in these organizations, qualified graduates are regularly accepted with full credit by graduate and professional schools throughout the nation.

## Admission

## Freshman Applicants

The University of Evansville seeks motivated students who desire an interactive learning experience within a close-knit academic and social community. In high school, students should follow a college preparatory program minimally including four years of English, three social sciences, three lab sciences, three mathematics courses, and strongly recommend two years of foreign language. Grade point average (GPA), and course selection are used to determine a student's admissibility. Extracurricular activities are also considered.

Students should submit the following information in applying to the University of Evansville: a completed application with official high school transcript and SAT or ACT scores are optional. An essay and a counselor recommendation form are recommended. Early Action deadline is November 1, with notification by December 15. Applications are accepted on a rolling basis after November 1 as space is available. Accepted students deciding to enroll at the University should send a nonrefundable $\$ 300$ deposit to reserve their place in the freshman class.

## Transfer Students

Transfer students are degree-seeking students who have graduated from high school or received their GED and have been enrolled at a regionally accredited college or university at any time since graduation or earning the GED. Courses with a grade of C- or higher will be considered for transfer credit to the University of Evansville. Interested transfer students should submit a transfer application and official transcripts from all post-secondary schools attended. Students with fewer than 24 credit hours must also submit an official high school transcript and may have to submite standardized test scores depending on their major. Transfer students may also submit a personal statement.

Transfer students are admitted on a rolling basis. Notification of admission status will be sent after a completed application is received, reviewed, and processed. Transfer students must send a nonrefundable $\$ 150$ deposit when they decide to enroll at the University.

## Re-entry Admission

Students who have formerly been enrolled at the University of Evansville as degree-seeking and who wish to re-enroll following a semester or more of absence need to complete an application for re-entry admission. If the student has been enrolled elsewhere since leaving UE, transcripts from the most recently attended university are needed as well.

Re-entry students are admitted on a rolling basis. Notification of admission status will be sent once the application has been fully reviewedand processed.Re-entrystudentsmustsendanon-refundable $\$ 100$ deposit when they decide to re-enroll at the University.

For questions concerning graduation under a particular catalog, please refer to the section titled Academic Policies and Procedures.

## Part-Time Students

Students who wish to take classes toward a degree, whether they are full-time or part-time, must meet regular admission standards as stated by the Office of Admission.

For more information and application materials, students should contact:

Office of Admission<br>University of Evansville<br>1800 Lincoln Avenue, Evansville, Indiana 47722<br>1-833-BeAnAce or 1-833-232-6223<br>admission@evansville.edu or www.evansville.edu

## International Students

The University of Evansville welcomes international students to our campus. International students should submit an international student application online, official transcripts of all high school and university work, official TOEFL or IELTS scores, and proof of financial support for the first year of college expenses. Undergraduate applicants must score at least 61 on the Inter-net-based TOEFL or 5.5 on the IELTS test unless otherwise specified by the degree program. For more information, contact:

Office of Admission
University of Evansville
1800 Lincoln Avenue, Evansville, Indiana 47722
001-812-488-2434
international@evansville.edu
www.evansville.edu
All students whose native language is not English must take the University's writing skills test as a part of registration for the first term. Test results determine placement in appropriate English credit-bearing courses.

## Special Students

Students not wishing to pursue a degree may take courses at the University as "special students." Special students are granted permission to earn up to 24 credit hours at UE. After earning the first 24 hours of credit, an application for admission must be submitted or a special student extension must be requested. Special students are defined as the following:

- Visiting/Transient Students are currently enrolled at another accredited college or university who wish to take courses at UE but plan to graduate from their home institution
- Concurrent Students are currently enrolled in high school or are homeschooled and wish to take courses at UE
- College Graduate Students have a college degree but need additional undergraduate credit to earn special licensing or to prepare for graduate school
- Personal Enrichment/Non-Degree Seeking Students have graduated from high school or earned their GED, regardless of age, who wish to take courses for personal enrichment
Admission criteria are different for each special student category. For more information and a special student application, contact:

Office of the Registrar
1800 Lincoln Avenue, Evansville, Indiana 47722
812-488-2600
registrar@evansville.edu
www.evansville.edu

## Financial Aid

The University of Evansville is eager to see that students have the opportunity to obtain an education that will enable them to maximize their abilities and to be of the greatest service to society. It strives to adhere to a consistent and equitable approach in the awarding of student financial aid. Many students rely on financial aid to help with college costs, and over 90 percent of the University's full-time students receive some type of financial assistance.

The University demonstrates its commitment to making high quality education affordable by offering several types of merit scholarships and awards as well as need-based assistance in the form of grants, loans, and on-campus employment. Students often have some combination of the four types of aid. Students are free to accept or reject any part of the financial aid offered. First-time applicants to UE are considered for scholarships and merit awards when they apply for admission. These awards are made possible through the generous gifts of donors.

Although the University is eager to help students, it believes that the principal responsibility for financing an education lies with students and their families who are expected to contribute as much as is reasonably possible toward education costs. The University's financial aid program exists primarily to help students who, without such aid, would be unable to attend UE.

## Needs Analysis and Deadlines

The University adheres to the principles of financial aid administration established by the National Association of Student Financial Aid Administrators. To help judge student need and distribute financial aid fairly, the University asks that students and parents complete the Free Application for Federal Student Aid (FAFSA) on an annual basis. Submitting this form to the federal processor so that it is received by April 15th is mandatory to apply for assistance from the State of Indiana and is highly recommended for all students. Eligibility for financial aid administered by the Office of Student Financial Services is based on students' enrollment.

## Establishing Financial Aid Eligibility

Students must first be admitted to the University of Evansville before any type of financial aid can be offered or processed. International students must apply through the UE Office of Admission and are eligible only for UE scholarships and UE work-study.

In order to be eligible for federal and state financial aid, a student must:

- Have a high school diploma or GED
- Be a US citizen or eligible non-citizen
- Have a valid Social Security number
- Comply with Selective Service registration, if male
- Not be in default on any federal student loan or owe a refund on a federal student grant
Continuing eligibility for federal and state financial aid requires that students file the FAFSA annually, maintain satisfactory academic progress, not be convicted under federal or state law of the sale or possession of drugs while receiving federal student aid, and continue to be degree-seeking students enrolled in appropriate aid-eligible credits.

Incoming freshmen will be provided their financial aid notification beginning in December. Returning students will be pro-
vided access to their aid notification in June.

## UE Merit-based Scholarships

Merit-based scholarships are awarded only at the time of acceptance to UE. The types of scholarships offered, standards for selection, amounts, and renewal criteria may change with each new academic year. Awards are administered throughout the student's UE career according to the policy in place at the time the award is offered. University of Evansville merit-based scholarships are available for full-time enrollment during fall or spring semesters. Details about renewing UE merit-based scholarships can be found in the UE Financial Aid Guide available online at https:// www.evansville.edu/student-financial-services/policies.cfm.

Neither University of Evansville merit-based scholarships nor UE need-based grants are available for students in programs administered by the Center for Advancement of Learning, RN to BSN, or Transition to Teaching; however, need-based aid from federal and State of Indiana sources may be available.

## Need-based Financial Aid

The University of Evansville assesses eligibility for all forms of need-based financial aid through the Free Application for Federal Student Aid (FAFSA). Need-based aid may come from federal, state, and University sources, and may include grants (gift assistance that is not repaid), student loans (repaid by the student after college), and federal work-study (a job on campus).

We encourage all UE students to file the FAFSA annually for the next academic year. Indiana residents must file by April 15th each year to be considered for state grants. Students should file no later than May 1st to ensure maximum consideration for all forms of need-based aid for the next academic year. Each type of need-based aid has specific rules that govern its use, and details are offered in the UE Financial Aid Guide.

## Veterans Benefits

Information on all veteran educational benefits is available from the Department of Veterans Affairs online at www.benefits. va.gov. Campus advisement of veterans regarding VA educational benefits is conducted through the Office of Student Financial Services.

## Duration

Financial aid from the University and/or state resources for full-time students is normally available for eight semesters only or when requirements for the first bachelor's degree have been met, whichever comes first. However, students may apply for the continuation of University need-based aid for a fifth year if extenuating circumstances have precluded the student from obtaining a degree in four years. Federal Pell Grant and Federal Direct Loans may be available for a fifth year based on need as demonstrated on the FAFSA. UE students enrolled in programs designed to last longer than four years may be eligible for institutional aid for the standard length of their program.

## Satisfactory Academic Progress Policy

The United States Department of Education (Higher Education Act of 1965, as amended) requires that students maintain satisfactory progress toward completing their degree in order to receive
financial aid. The Office of Student Financial Services is required to check three standards: quantitative (pace of progression), qualitative (GPA), and maximum time frame for receiving aid.

These standards, known as Satisfactory Academic Progress (SAP), apply to a student's entire degree program, including semesters (fall, spring, and summer) in which financial aid was not applied for or disbursed. SAP governs eligibility for students to establish or maintain aid eligibility for all federal, state, and institutional financial aid programs including grants, scholarships, student and parent loans, and work-study. Many private loans also require the student to be meeting SAP.

The UE Office of Student Financial Services reviews all three standards of Satisfactory Academic Progress at the end of each semester (fall, spring, and summer) for all students using financial aid. All summer terms combine to create one summer semester for financial aid purposes.

## Quantitative Standards (Pace of Progression)

Students must successfully complete a minimum of 67 percent of all credit hours attempted. After grades are posted each semester, a student's cumulative credit hours successfully completed (earned) will be divided by the cumulative credit hours attempted to determine the completion rate.

Completed (earned) credits: Successfully completed credits include grades of $A, B, C$, or $D$ (including plus or minus) and credits taken pass/fail, in which a P was earned. Unsuccessful grades consist of F, W, I, classes taken for audit, or any other grade that does not result in completed credits. Credits earned by examination will be considered completed credits. Note: A grade of $D$ is not considered a passing grade for graduate programs and is not counted as completed credit.

Attempted credits: All credit hours for which a student registers at UE, those transfer credits that count toward the UE degree, and credits earned by examination are included in attempted credits. Grades of I or W will count as hours attempted, but not completed. If incompletes are later completed, they will be reflected when progress is again checked, or sooner, at the student's request.

Transfer Credits: Transfer credits that apply to a student's UE degree are included in both the credits attempted and the credits earned when calculating the completion percentage. Credits received for remedial courses or for courses that are not applicable to the student's UE degree are not included in either credits attempted or earned.

Repeated Courses: Courses that are retaken to improve a grade are counted in attempted hours each time the course is taken, but only once toward the credit hours earned in the completion rate. Students may retake a class for which they have previously received a grade of " $F$ " as many times as it takes to successfully complete the class. However, students may only repeat a course one time in which they have received a passing grade. After one allowable time, the student cannot use federal assistance for future repeats.

Part-time Students: Cumulative GPA requirements are the same as for full-time students. The number of semesters required to complete the program will depend on the hours registered. Students must successfully complete the majority of the credit hours attempted each semester and maintain a 67 percent cumulative completion rate.

Second Degree Students: Officially accepted credits that apply to the degree program will count toward both credit hours
attempted and credit hours earned.

## Qualitative Standards (GPA)

Undergraduate students admitted to UE as freshman must have earned a minimum cumulative GPA of 2.0 by the end of their second academic year (fourth regular semester) and each semester thereafter. Before the end of the fourth semester, these students must have the minimum cumulative GPA as shown below:

```
Credit Hours Earned GPA
Fewer than 30 1.6
30-59.99 1.9
```

All other students must maintain a minimum cumulative GPA of 2.0 at the end of each semester.

## Maximum Time Frame for Eligibility

Federal Aid Standards: Federal regulations govern the maximum length of time a student may receive federal aid. This time frame is defined as $150 \%$ of the scheduled length of the program. For example, students pursuing a bachelor's degree in an academic program requiring 120 credit hours may attempt up to 180 credit hours ( $150 \%$ of 120 is 180 hours). Students pursuing an associate degree requiring 72 credits may attempt up to 108 credit hours ( $150 \%$ of 72 is 108 hours). For transfer students, the number of transfer credit hours accepted at the point of admission to UE will be used to calculate the student's remaining eligibility for the $150 \%$ maximum time frame calculation. Second undergraduate degree students are will have the previous degree's accepted credit hours applied toward the student's current degree and used in the $150 \%$ maximum time frame calculation.

## Financial Aid Academic Progress Status

Financial Aid Warning: Students will be sent a warning if they fail to meet either the completion rate, minimum cumulative GPA standard as outlined, or are approaching their program's maximum time frame. Students will be placed on warning for one semester during which they must come into compliance with the standard. Students not meeting SAP at the end of the warning semester will be placed on Financial Aid Suspension.

Financial Aid Suspension: Students who fail to meet the standards at the end of their warning semester will be ineligible for financial aid beginning with the next semester of attendance. (See appeals to regain eligibility.)

Students receiving grades of F or D (graduate programs only) in all courses attempted in any semester will be automatically ineligible for financial aid regardless of whether the student has previously been placed on financial aid warning.

Students who preregister for a subsequent semester before grades are evaluated and who use financial aid to defer tuition and fees are responsible for the semester's balance if they do not maintain satisfactory academic progress and have been disqualified from financial aid once grades are posted and reviewed.

A student who is disqualified from financial aid more than one time for failure to meet these standards must meet with a financial aid counselor to discuss plans for re-establishing financial aid eligibility. Unless there are extenuating circumstances, a student in this category should expect to enroll for at least 12 semester credits without financial aid at UE and successfully pass all courses with a minimum of a 2.0 GPA to be reconsidered for financial aid.

Students are responsible for maintaining awareness of their SAP status for aid renewal whether or not they receive the official notifications. The Office of Student Financial Services is not responsible for address changes that are not reported or for problems with postal mail or email delivery. Students may view their SAP status in Financial Aid Self Service at any time.

Correcting Academic Deficiencies: It is important to remember that grade deficiencies can only be corrected at UE, but credits to correct a deficiency in credit hours earned can be taken elsewhere and transferred to UE through arrangement with the Office of Academic Advising. Students may request a review of their progress when a grade is changed, regardless of when that change occurs.

Appeals to regain eligibility: A student who fails to meet these standards and has lost eligibility for financial aid may appeal this decision. Appeals must be in writing and must be accompanied by appropriate supporting documents. In the appeal, the student must explain why he or she was not making progress and what has changed so that he or she will begin making progress. Appeals should be submitted to the Office of Student Financial Services at least three (3) weeks before the beginning of the student's next semester of attendance to allow time for processing.

Appeals will be approved or denied in writing via email. The student is limited to two appeals.

Reasons that may be acceptable for appeal are: 1) serious illness or accident affecting the student; 2) death, accident, or serious illness in the student's immediate family; 3) change in academic program; 4) or other circumstances.

If approved, the student will be placed on Financial Aid Probation for one semester and aid will be granted. If the student cannot meet SAP by the end of the probationary semester, the student must complete and submit to the Office of Student Financial Services a SAP academic plan that shows how and when the student will be meeting SAP.

If denied, the student may choose to enroll without using financial aid in an effort to repair the SAP deficiencies. Students may request a review of their record following any semester. If the SAP standards are met at the time of review, financial aid eligibility may be regained for subsequent semesters of enrollment that year.

## Financial Aid and On-Campus Residency Requirements

Most students are required to live in University-approved housing when they enter UE. For most students, the full renewal of UE financial aid (scholarships or grants) requires continued residency in UE-approved housing, even after satisfying their on-campus residency requirement. The residency requirements and associated aid policies differ for freshmen and transfers.

Freshmen: Freshmen* must live in UE-approved housing for three years, or the equivalent of six semesters. The Office of Residence Life may grant an exemption if the student meets one of the following criteria:

1. The student's local residence is with parents or legal guardians in Vanderburgh or contiguous counties;
2. The student has attained the age of 22 prior to the start of the academic year;
3. The student is married and/or lives with a dependent.

* Residency requirement also applies to freshmen transfers (those entering UE in January after one semester at another institution).International students who have participated in the Inten-
sive English Program may count their semester(s) in residence toward this requirement.

Transfer Students: Transfer students who have not attained $90+$ academic credit hours by the start of the academic year must live in UE-approved housing when entering UE. These hours can be a combination of hours earned at previous institutions and UE hours (excluding bridge, early-college, dual-credit, and advanced placement credit). Students with fewer than 90 hours may also request an exemption from the Office of Residence Life if they meet one of the following criteria:

1. The student's local residence is with parents, legal guardians, or immediate family members who are over the age of 22 . Local residence must be in Vanderburgh or contiguous counties;
2. The student has attained the age of 22 prior to the start of the academic year;
3. The student is married and/or must live with a dependent.

Office of Residence Life: Information and details regarding housing and meal plans are found at www.evansville.edu/residencelife.

Financial Aid Reduction: Students entering prior to Fall 2021 who were required to live in UE housing when entering UE, and who choose to move off campus after satisfying the Office of Residence Life's residency requirement, will experience an annual reduction to their UE-funded financial aid of $\$ 4,500$ ( $\$ 2,250$ per semester). This reduction of aid will not apply to students who have elected to live on campus but later move off campus to live at home with parents in approved counties or to live with a spouse or dependent. Documentation may be required. Students awarded a UE Housing Scholarship must reside in UE housing for renewal.

Regaining aid: Students who lost aid as a result of moving off-campus may regain the original value of their aid if they return to UE-approved housing.

Harlaxton and study abroad: Students attending Harlaxton College for a semester are considered to be living in Universi-ty-approved housing and will NOT experience a reduction to their UE-funded financial aid. Students in UE-approved study abroad programs will not experience a reduction as long as the study abroad experience provides a housing opportunity similar to UE.

## Summer Aid

Summer is a trailer to the academic year and financial aid eligibility available for summer enrollment may include: federal loans (Direct or PLUS), private student loans, federal grants (Pell or SEOG), state grants, Tuition Remission (employees and dependents), and student employment. Students must be enrolled for at least six credit hours to qualify for federal loans. Students enrolled for less than six credit hours may consider private loans. In general, University of Evansville gift assistance is not available for any summer programs including on-campus summer classes. Students may work on campus (as jobs are available) in the summer regardless of enrollment status, but only students who have not graduated and who will be returning to campus the following year will be eligible to apply. The Summer Financial Aid application and summer employment information will be available in mid-March. The Office of Student Financial Services determines eligibility for all forms of aid based on enrollment and summer cost of attendance.

## For More Information

Detailed information about all forms of financial aid (federal,
state, and institutional) is available in the Financial Aid Guide provided annually.

## University of Evansville Financial Information Privacy and Safeguarding Guidelines

## Background

Adequately securing customer information is not only the law, but it also makes good business sense. Above all, it is our ethical responsibility to safeguard this information while it is in our possession. When we show that we care about the security of personal information, we increase the level of confidence in our institution. Poorly managed customer data can lead to identity theft. Identity theft occurs when someone steals a consumer's personal identifying information to open new charge accounts, order merchandise, or borrow money.

## Information Collected and Stored

As an educational institution, the University of Evansville collects, retains, and uses non-public financial information about individual students, as allowed by law, to provide services. Non-public financial information is collected from sources such as:

- Applications and/or other forms
- Financial transactions (checks, credit cards, and ACH)
- Informationabout transactions with us,our affiliates, orothers
- Information we receive from consumer reporting agencies
- Information from governmental agencies

Information Shared
The University of Evansville may disclose non-public financial information about students with our business affiliates and other affiliated third parties under certain circumstances to provide services. Any non-public financial information sharing is conducted
in strict adherence to applicable law. The University of Evansville will not disclose any non-public personal information to anyone except as permitted under law.

## Who Receives Information and Why

The University of Evansville does not disclose any non-public financial information about our students, or former students, to anyone, except as permitted by law. We may exchange such information with our affiliates and certain non-affiliated third parties (under limited circumstances) to the extent permissible under law to service accounts, report to credit bureaus, provide loan services, or provide other financial services related activities.

## How Information is Protected

The University of Evansville understands that the protection of non-public financial information is of the utmost importance. Providing for administrative, technical and physical safeguarding of students' privacy is our obligation. We restrict employee access to customer information only to those who have a legitimate business reason to know such information, and we educate our employees about the importance of confidentiality and customer privacy.

## Tuition and Fees for the Academic Year 2023-2024

| TUITION | SEMESTER | ANNUAL |
| :---: | :---: | :---: |
| Traditional Undergraduate Programs: |  |  |
| Full-time Undergraduate (12-18 credit hours) | \$20,700.00 | \$41,400.00 |
| Each Additional Hour | \$1,150.00 per hour |  |
| Part-time Undergraduate (1-11 credit hours) | \$1,150.00 per hour |  |
| Summer Sessions (2023) | \$590.00 per hour |  |
| Non-Traditional Undergraduate Programs: |  |  |
| RN to BSN | \$345.00 per hour |  |
| Transition to Teaching | \$345.00 per hour |  |
| Teaching (Associates to Bachelor's + Accelerated Elementary) | \$345.00 per hour |  |
| Organizational Leadership | \$345.00 per hour |  |
| University Studies | \$345.00 per hour |  |
| Each Additional Hour | \$345.00 per hour |  |
| Summer Sessions: regular program rate |  |  |
| Graduate Programs: |  |  |
| Doctor of Physical Therapy | \$21,220.00 | \$42,440.00 |
| Doctor of Physical Therapy - summer session (2023) Direct Entry prior to Fall 2020 | \$620.00 per hour |  |
| Transfer Doctor of Physical Therapy: by cohort schedule |  |  |
| Master of Physician Assistant Science: by cohort schedule |  |  |
| Certified Registered Nurse Anesthetists: by cohort schedule |  |  |
| Master of Science in Health Services Administration | \$580.00 per hour |  |
| Master of Science in Public Health | \$580.00 per hour |  |
| Master of Science in Athletic Training | \$580.00 per hour |  |
| Master of Science in Public Service Administration | \$580.00 per hour |  |
| Master of Science in Leadership | \$580.00 per hour |  |
| Summer Sessions 2023 (HSA, PH, AT, ML): regular program rate Summer Session 2023 (CRNA, DPT, PsyD): by cohort schedule |  |  |
| HARLAXTON-TUITION/ROOM/BOARD |  |  |
| Comprehensive Fee (Tuition, Room and Board) | \$27,720.00 |  |
| Services Fee - Harlaxton (Transport, Technology, Health/Wellness) | \$1,275.00 |  |
| Student Activity Fee | \$163.00 |  |
| REGISTRATION AND/OR ACTIVITY FEES |  |  |
| Registration Fee (Excludes FT students in Fall/Spring) | \$50.00 per session |  |
| Student Activity Fee - Evansville and Harlaxton | \$163.00 | \$326.00 |
| Services Fee - Evansville | \$475.00 | \$950.00 |
| Technology Fee - (Excludes FT students in Fall/Spring) | \$111.00 | \$222.00 |


|  | SEMESTER | ANNUAL |
| :---: | :---: | :---: |
| Technology Fee - Summer Session and Winter Session (2023) | \$42.00 per session |  |
| HOUSING | SEMESTER | ANNUAL |
| Residence Halls (Double Occupancy/Standard) |  |  |
| Moore, Schroeder and Powell | \$3,640.00 | \$7,280.00 |
| Jones Hall | \$5,025.00 | \$10,050.00 |
| Villages | \$4,005.00 | \$8,010.00 |
| Weinbach Apartments (Single Occupancy) | \$5,025.00 | \$10,050.00 |
| Lincoln Park Apartments (Single Occupancy) | \$5,025.00 | \$10,050.00 |
| Townhouses | \$5,135.00 | \$10,270.00 |
| New Resident Hall: 4 Pod Corner Room (Single Occupancy) 4 Pod: Standard Room (Single Occupancy) 6 Pod: Standard Room (Double Occupancy | $\begin{aligned} & \$ 4,815.00 \\ & \$ 4,715.00 \\ & \$ 4,150.00 \end{aligned}$ | $\begin{array}{r} \$ 9,630.00 \\ \$ 9,430.00 \\ \$ 8,300.00 \end{array}$ |
| Moore, Schroeder, Powell Single Occupancy | \$4,390.00 | \$8,780.00 |
| Hale Hall (Limited Spaces, Freshman, Double Occupancy | \$2,950.00 | \$5,900.00 |
| MEALS |  |  |
| Residence Hall Occupants: |  |  |
| Anytime Dine Prime 7: unlimited meals/\$300 Ace Bucks | \$3,680.00 | \$7,360.00 |
| Anytime Dine Purple 7: unlimited meals/\$100 Ace Bucks | \$3,495.00 | \$6,990.00 |
| Anytime Dine Orange 5: unlimited weekday meals/\$175 Ace Bucks | \$3,380.00 | \$6,760.00 |
| Aces 12: 12 weekly meals + \$300 Ace Bucks | \$3,380.00 | \$6,760.00 |
| Seniors in Residence Halls, Villages, Townhouses and Commuters: |  |  |
| Aces 7: seven weekly meals + \$200 Ace Bucks | \$1,470.00 | \$2,940.00 |
|  |  |  |
|  |  |  |


| SPECIAL FEES |  |  |
| :--- | ---: | ---: |
| Applied Music | $\$ 460$ per credit |  |
| Prior Learning Credit | $\$ 50$ per hour |  |
| Bridge/Dual Credit Program | $\$ 100$ per course |  |
| Co-op | $\$ 440$ per period |  |
| Music Therapy Internship | $\$ 440.00$ per sem. |  |
| Late Registration | $\$ 190$ |  |
| Parking | $\$ 50$ per year |  |
| Credit by Exam | $\$ 125$ per credit |  |
| Tuition Exchange | $\$ 270$ per year |  |
| Course Audit Fee (no credits earned) | $\$ 100$ per credit |  |
| Nursing Course Fee - Harlaxton | $\$ 480$ |  |
| Senior Scholars/Age 62 and up, non-degree seeking students |  |  |
|  |  |  |
| Rates are Subject to Change without notice. |  |  |
| Variable Section Fees: May apply with specific course registration. |  |  |
| Finance Charge: 1.5\% per month calculated on month-end balance. |  |  |
| Special Notes: Independent Study classes for undergraduates <br> are charged full/part-time rates. |  |  |

## Institutional Charges and Financial Aid Refund Policy

All institutional financial aid will be refunded according to the institutional charges refund schedule shown below. In other words, all UE financial aid will be refunded according to the 100 percent, 80 percent, 60 percent, 40 percent, or 20 percent determination during the first four weeks. After four weeks, there are no refunds for such aid.

Institutional Charges: Tuition, on campus room and board, and the following fees: activity, registration, services, applied music, and any mandatory course related fees (course related fees are non-refundable after start).

Non-Institutional Charges: All other fees and costs (special fees, books, insurance fees, off-campus living expenses, transportation expenses, and the like).

The amount of institutional charges (excluding course related fees) that will be refunded is determined as follows:

- UE classes begin on Wednesday in fall and Monday in spring. Students who withdraw on or before the first day will receive a 100 percent refund.
- Students who withdraw or leave within the first week of class (ThursdaythroughWednesday infallorTuesdaythroughMonday in spring) will receive an 80 percent refund.
- Studentswhowithdraworleavewithinthesecondweekofclass (next Thursday through Wednesday in fall or Tuesday through Monday in spring) will receive a 60 percent refund.
- Students who withdraw or leave within the third week of class (next Thursday through Wednesday in fall or Tuesday through Monday in spring) will receive a 40 percent refund.
- Students who withdraw orleave withinthefourth week of class (next Thursday through Wednesday in fall or Tuesday through Monday in spring) will receive a 20 percent refund.
- Afterfour weeks, there are no refunds for the above listed institutional charges.


## Institutional Aid Refund Policy

Dropping Below Full-Time: Students who drop/withdraw from a course(s) during the first 4 weeks who remain enrolled but whose enrollmentstatus becomes less than full-time will not be eligible for any University scholarships or grants.

Withdrawing From All Classes: Students who withdraw from all courses within the first 4 weeks will have their institutional scholarship and grants reduced according to the University's Institutional Tuition Refund Policy.

## State Aid Refund Policy

The Indiana Commission of Higher Education (CHE) policy for refunds dictates that to be eligible for these awards, a student must be enrolled full-time at the end of the published add/ drop period. Hence, if a student completely withdraws from the University before the end of the add/drop period, the student is not eligible for the state award, and the University must return 100 percent of the semester's award to CHE. After the add/drop period, the student's state aid would be 100 percent earned. State aid that requires full-time enrollment consists of the Freedom of Choice Award, Student Performance Incentives, Twenty-first Century Scholarship, Mitch Daniels Scholarship, and the Minority

Teacher Scholarship.

## Veterans Benefits Refund Policy

The U.S. Department of Veterans Affairs requires all changes of enrollment to be certified within 30 days of action. For VA purposes, the effective date is the date the student withdrew or dropped the course. The U.S. Department of Veterans Affairs will process the information regarding change of enrollment and may establish a debt on the student, based on the effective date of the change. It is the responsibility of the student to satisfy any debt established on the student by the VA.

Students withdrawing from all courses in a semester will have the current, and any future certifications terminated. If the student completely withdraws on or before the first day of the term, the University of Evansville will return the tuition and fees payment received, directly to the VA, upon receipt of school debt letter. If the date of complete withdrawal is after the first day of the term, any credit balances that result from a refund of institutional charges will be issued to the student. In this case, the student will receive a debt letter from the Department of Veterans Affairs with balance due.

For students dropping a course(s), an enrollment update will be submitted to the VA. Tuition and fees are reported specific to the remaining credithours, asifthoseweretheonlycoursestakenduring the entire enrollment period. The VA will determine if the change in hours/chargesrequiressome percentageofrepaymentfromthestudent. If debt is established, the student will receive a debt letterfrom the Department of Veterans Affairs with balance due.

Tuition Assistance: The University of Evansville will return any unearned TA funds on a prorated basis through at least the $60 \%$ portion of the period for which the funds were provided. TA funds are earned proportionally during an enrollment period, with unearned funds returned based upon when a student stops attending. These funds are returned to the military service branch.

In addition, when a service member stops attending due to a military service obligation, the university will work with the affected service member to identify solutions that will not result in student debt for the returned portion.

Military Tuition Assistance Program Refund Policy/schedule:
Studentsreceivingfundsfromthetuitionassistanceprogramwho withdraw from the University of Evansville will have their tuition assistance funds reduced as follows:

16-week semester

| On or before the 1st day of classes | $100 \%$ |
| :--- | :--- |
| 2nd day of class through the end of the first week | $90 \%$ |
| Second week of classes | $80 \%$ |
| Third week of classes | $70 \%$ |
| Fourth week of classes | $60 \%$ |
| Fifth week of classes | $50 \%$ |
| Sixth week of classes | $40 \%$ |
| Seventh week of classes | $30 \%$ |
| Eighth week of classes | $20 \%$ |
| Ninth week of classes (60\% course completion) | $10 \%$ |
| After the $60 \%$ point of the semester | 0 | After the $60 \%$ point of the semester $0 \%$

The funds will be returned to the tuition assistance program/ payer. Other financial aid will be refunded according to the University's Institutional Charges and Financial Aid Refund policy.

Student debt, resulting from the tuition assistance program refund calculation outlined above, will be eligible for a 12-month equal installment payment plan to satisfy the adjusted balance.

Chapter 31 and 33- Post/911 GI Bill ${ }^{\text {®* }}$ Benefits: The University of Evansville will permit any covered individual to attend and participate in the course of education during the period beginning on the date on which the individual provides to the educational institution a certificate of eligibility for the entitlement to educational assistance. In addition, the university will not impose any penalty, including the assessment of late fees, the denial of access to classes, libraries, or other institutional facilities, or the requirement that a covered individual borrow additional funds on ay covered individual because of the individual's inability to meet his or her financial obligation to the institution due to the delay of disbursement funding from VA under Chapter 31 and 33.

* GI Bill ${ }^{\oplus}$ 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 http://www.benefits.va.gov/gibill.


## Federal Aid Refund Policy

Students are encouraged to meet with the Office of Student Financial Services before changing enrollment by dropping a course or withdrawing from the University so they can be informed of the financial impact of their enrollment changes. Enrollment is set at the end of the add/drop period each term. Students must begin enrollment in all courses to be eligible for Federal Pell Grant funds and in at least one course to be eligible for all other aid.
I. All Programs, Except Center for the Advancement of Learning
This policy applies to all University programs, except those administered by the Center for the Advancement of Learning (CAL) and operate on a different academic calendar. Students enrolled in one of the University's CAL programs should refer to section (II) for the CAL refund policy. Refund information for summer is provided annually when summer course registration information becomes available to students.

## Dropping Below Full-Time

Dropping a class starts with the Academic Services. When a student drops a course(s) but continues as a part-time student (fewer than 12 semester hours), the tuition refund will be the difference between the initial billing and the revised billing multiplied by the percentage refund as outlined in the Institutional Charges Refund Policy. Students who drop below full-time during this refund period will have their eligibility for financial aid recalculated. Enrollment for federal and state financial aid will be set at the end of the add/drop period each term, and federal and state grants will not be adjusted after this date.
If a student drops below full-time after the first four weeks of the semester, there is no refund of charges or reduction of financial aid.
Students Withdrawing from All Courses
The official withdrawal process begins in Academic Services. The policy that determines the return of Title IV funds is defined by federal regulation and calculates earned federal financial aid on a per diem basis up to the 60 percent point in the semester. Federal financial aid that is considered "unearned" is returned to the appropriate source. The amount of earned federal aid is calculated by dividing the number of calendar days completed by the total number of calendar
days in the semester. A calendar is developed each year and maintained in the Office of Student Financial Services that outlines the percentage of federal aid earned during the first 60 percent of the term. There are no refunds (or return of Title IV funds) if the student attends classes after the 60 percent point as Title IV aid is considered to be 100 percent earned at that point.
There are two parts to a refund determination when the student withdraws from all classes.

1. Refund of institutional charges. The student's withdrawal date for institutional charges is the date the student submits the completed withdrawal form to Academic Services. However, UE can determine a withdrawal date related to extenuating circumstances for a student who:
(a) left without notification because of extenuating circumstances, or
(b) withdrew because of extenuating circumstances but another party gave notification on the student's behalf. Extenuating circumstances include illness, accident, grievous personal loss, or other such circumstances beyond the student's control. Academic Services makes the determination in such matters.
2. Reduction (refund to the program) of institutional, state, or federal financial aid. The student's withdrawal date for financial aid is determined based on whether the student officially withdrew from the University or stopped attending (walked away). For those who officially withdrew, the withdrawal date is the date the student begins the withdrawal process with Academic Services. For those who stopped attending and failed all classes, the withdrawal date is the latter of the midpoint of the semester, the date the student last attended classes, or the last date of academically related activity such as taking a test.

## II. CENTER FOR THE ADVANCEMENT OF LEARNING

If a student in the organizational leadership, university studies, masters of leadership, or masters in public service administration program finds it necessary to completely withdraw from the University before the end of a semester, the withdrawal process begins in the office of the director of adult education where an official date of withdrawal is determined for institutional charges refund purposes. A student's withdrawal date is determined using the same process as for the federal financial aid refund policy. The director of adult education may determine a different withdrawal date for institutional charges due to extenuating circumstances if such conditions exist and can be documented.
The University's CAL institutional charges refund policy treats each five-week course in the semester as a separate course. Students register and are billed for the semester at the beginning of the term, but refunds will be calculated based upon the five-week courses completed and/or the date/time when the withdrawal occurs. Full refunds for the semester will be given if the student cancels the enrollment before attending any class in the term. Refunds that occur during the semester will be calculated as follows for each five-week course:

During week one 75\% refund*
During week two 50\% refund*
During week three 0\% refund*
All other information relative to the withdrawal process is described in the regular policy and conforms to it.

Dropping Center for the Advancement of Learning Courses in the Semester
Federal financial aid eligibility is established by attending class. Students with Federal Pell Grants must begin attendance in each module. Because of the nature of the federal withdrawal policy, students who do not begin attendance in all modules and successfully complete those modules may have their aid prorated based on return of Title IV funds regulations.
III. Returning Federal Financial Aid to Accounts

Unearned federal financial aid will be returned in the following order:

Federal Direct Unsubsidized Loan
Federal Direct Subsidized Loan
Federal Direct PLUS Loan
Federal Pell Grant
Federal SEOG
TEACH Grant
Iraq Afghanistan Service Grant
The amount of aid to be returned is determined by the Federal Title IV Return of Funds calculation as provided by the U.S. Department of Education.
Any refunds of charges will be applied to the student's account and alladjustments for aid, loans, fines and non-refundablefees or deposits will be made before eligibility for a cash refund is determined. If there is a student account balance resulting from the adjustments, the student is responsible for payment.
Sample Return of Funds calculations are available in the Office of Student Financial Services.

## IV. ADMINISTRATIVE FEES

Official Withdrawals
Students who officially withdraw from the University will be assessed a $\$ 100$ administrative fee.
Unofficial Withdrawals (Walkaways)
Students who simply "walk away" during a semester without officially withdrawing, and who earn all Fs or Incompletes will be assessed a $\$ 500$ administrative fee.
V. Student and Institutional Responsibilities in Regard to the Return of Title IV funds
The University's responsibilities include:
a. Providing each student with information about the refund policy.
b. Identifying students who are affected by the policy.
c. Completing the Return of Title IV funds calculation for those affected. Notice will be sent/given to student within 30 days of the withdrawal date of the amounts that must be returned to UE.
d. Returning federal financial aid within 45 days to the Title IV programs any funds that were disbursed directly to the student and which the student was determined to be ineligible for via the Return of Title IV funds calculation.
The student's responsibilities include:
a. Cooperating with UE in establishing satisfactory repayment arrangements if it is determined that a repayment is due for a Pell Grant because of the withdrawal.
b. Returning his or her share of unearned aid attributable to a loan under the terms and conditions of the promissory note.
c. Making payment to the University for any student account balance that results from the adjustments to the account.

Payment in full or payment arrangement should be made within 30 days of the student receiving notice of what is owed.
This policy conforms to the Federal Return of Title IV Funds (Section 668.22) regulations of the 1998 changes to the Higher Education Amendments. Title IV funds refer to the following federal financial aid programs: subsidized and unsubsidized Direct Loans, Federal Perkins Loans, Federal Direct PLUS Loans, Federal Pell Grants, Federal SEOG, and TEACH grants. Federal work-studyfunds are excluded from the refund calculation.

## Cancellation of Housing and Food Service Contracts

When a student completely withdraws from all classes in the middle of the semester, UE housing and meal plan charges and refunds are governed by the Institutional Charges Refund Policy as "institutional charges." However, the policies governing new or continuing students who remain enrolled but wish to cancel housing and/or meal plan charges are administered by the UE Office of Residence Life.

Completion of the Housing and Meal Plan Registration on Self-Service constitutes a legal and binding agreement between the student and the University of Evansville. A personalized and dated contract is generated upon completion of the online agreement on Self-Service. All housing contracts are binding for the duration of the academic year. There are specific provisions and restrictions regarding contract cancellation requests. Information regarding these policies is found online at www.evansville.edu/ residence_life, in the student's personal contract, and in the Residence Life Handbook.

## UE Financial Aid Credit Balance

## Refund Policy

Students whose financial aid results in a credit balance will receive a refund within 14 days of the credit balance occurring unless the credit balance occurred before the term began, in which case, the refund will be issued within 14 days of the start of the term. A student may authorize UE to hold a credit on their account for future charges, but all credits will be refunded at the end of the award year.

Credit balances that result from a Federal Parent PLUS Loan will be refunded or held per the borrower's request on the PLUS Loan Supplemental form. Parents may choose to have the balance refunded to them, refunded to the student, or held on the student account for future charges.

Should a credit balance occur as the result of an overpayment, the excess will be refunded to the payer.

Refunds are processed automatically at least weekly once the term begins and enrollment has been verified. If the student has elected an electronic refund, it will be processed as a direct deposit into the student's bank account, using bank information provided by the student. If a student does not elect direct deposit, a paper check will be issued and mailed to the student's permanent home address. Refund checks will be held for pick-up in the Office of Student Financial Services upon request. Unclaimed checks will be mailed to the permanent home address after seven days.

Regardless of any authorization provided by the student and/ or parent, credit balances that resulted from a federal loan will be refunded to the student/parent at the end of the award year in which they were disbursed.

Uncashed and unclaimed refund checks will be credited back to the student's account and the funds returned to the program from which they came.

## Payment Policy

A schedule is published annually listing registration, billing, and payment dates. As a general rule, payment may be made in full or under a two-payment plan. The two-payment plan carries a 1.5 percent-per-month finance charge calculated on the monthend outstanding balance. (Copies are available upon request.)

## Responsibility of Charges

Students are responsible for all institutional charges. If any payment is not made when due, the entire balance, including accrued interest, shall, at the discretion of the University of Evansville, become due and payable on demand. In the event of any default, the student will be obligated to pay all collection costs and/or attorney fees incurred by the University of Evansville in the collection of these charges.

For more information about bills and payments, call the Office of Student Financial Services at 812-488-2565.

## Campus Life

In keeping with the mission of the University, a variety of programs and services are offered to students as part of the total educational process. The goal of this developmental effort is to assist all students in reaching their maximum potential. Both out-of-class learning experiences and support services are part of this effort.

## Student Handbook

Further information on student services and guidelines for student life are outlined in the Student Handbook available on AceLink or on the Student Life web page at www.evansville.edu/ offices/deanstudents. The Student Handbook includes important information regarding excused absences, formal grievance procedures, and the student code of conduct, sexual misconduct policy, and the academic honor code. Every student is expected to be informed regarding University policies and regulations as described in the Student Handbook and to abide by such policies. Any student desiring more than these brief descriptions is invited to call or stop by to meet the staff for information or assistance.

## Student Affairs

The University offers a distinctive educational experience that encourages personal transformation through a wide range of opportunities for intellectual, emotional, spiritual, and physical growth. By intentionally creating an environment of self-discovery, the Office of Student Affairs plays a key role in the educational mission of the University. Partnering with the campus to foster character development and community engagement, the office commits itself to personal interaction, quality services, collaborative education, and student empowerment. This commitment encourages and supports the journey of relevant and responsible adult life.

The Office of Student Affairs consists of the Offices of the Vice President for Student Affairs and Dean of Students, Center for Career Development, Counseling Services (including disability services), Cultural Engagement and International Services, Religious Life, Residence Life, Safety and Security, and the Center for Student Engagement (includes Greek life and volunteer opportunities), the Crayton E. and Ellen Mann Health Center, and the Student Fitness Center.

Our staff is dedicated to the philosophy that student development begins with entry into the University, includes in-class and out-of class opportunities for personal growth and development, and continues through and after graduation.

## New Student Orientation

During the summer, Summer Orientation and Academic Registration (SOAR) sessions are held for all new students. During this program, newstudents have an opportunity to become acquainted with the campus, meet faculty members, administrators, and other students, and learn about academic procedures and student life. During SOAR, each new student meets with an academic advisor and registers for classes. Orientation programs are also provided for parents of new students.

An additional Welcome Week orientation takes place just prior to the start of fall classes. This multi-day program provides students with an opportunity to meet other freshmen as well as upperclassmen. Orientation participants are exposed to a variety of involvement opportunities available throughout the college experience. Information on campus life, academic assistance, and college adjustment issues is readily accessible to students
through this special orientation program. Complete information on the orientation programs is mailed according to the following schedule: SOAR information is mailed in the spring; Welcome Week information is mailed in mid-summer. A special orientation for transfer students, STAR, is also held each semester.

## Safety and Security

The Office of Safety and Security is staffed 365 days a year, 24 hours a day. Information regarding services, policies, the Annual Security Report, crime statistics, and emergency response procedures can be found at www.evansville.edu/safety. For general assistance, students may call 812-488-2051. All emergencies should be reported to 812-488-6911.

## Counseling Services

The University of Evansville offers counseling services that are designed to help students with a variety of life issues as they make their way through the college experience. It is recognized that interpersonal, psychological, and developmental issues can interfere with learning, and ultimately, personal success. The University of Evansville provides a counseling program with nationally certified and licensed professional counselors to respond to the unique needs of university students so they can achieve maximum benefit from their UE experience. The two program areas offered within the Office of Counseling Services include individual counseling for personal or psychological problems with health education and wellness programs, and Disability Services.

## Personal Development Counseling

Counselors address a variety of issues including depression, anxiety, homesickness and adjustment, stress and positive coping strategies, time management, and various relationship concerns. Counselors can provide assistance in helping students become connected with Academic Services to receive help with academic difficulties.

## Crisis Intervention

Counseling Services is open from 8:00 a.m. to 5:00 p.m. Monday through Friday in the Ridgway University Center. Appointments may be made by calling 812-488-2663. Emergency counseling services are available after hours by calling the Office of Safety and Security at 812-488-2051 and asking for the counselor on call.

## Health Education and Wellness Programs

Health education and wellness programs are offered to assist students in making healthy lifestyle choices during their college careers. These programs provide students with education, prevention, and intervention programs related to alcohol/substance abuse, stress management, and other lifestyle issues.

## Information Disclosure

The Counseling Services staff abides by the professional ethical standards of the National Association of Social Workers. A counselor may not reveal information to anyone about a client unless the client gives written permission to do so. For more information, contact Counseling Services at 812-488-2663.

## Disability Support Services

The University of Evansville is committed to providing an accessible and supportive environment for students with disabilities and to treating all individuals in a fair and equitable manner. It is the policy and practice of the University of Evansville to comply with the Americans with Disabilities Act of 1990, as amended, and Section 504 of the Rehabilitation Act of 1973. Under these laws, no otherwise qualified individual with a disability will be denied access to or participation in courses, programs, services, or activities at the University of Evansville.

## Procedures to Establish Eligibility

Students who wish to request accommodations must establish eligibility by providing appropriate written documentation of the disability to Disability Services within the Office of Counseling Services in Ridgway University Center. Disability Services staffmembers coordinate the provision of appropriate and reasonable academic accommodations and support services for any qualified student with a properly documented disability. Each student should schedule an appointment to meet with a Disability Services staff member by calling 812-488-2663. During the consultation, the Disability Services staff member and student discuss the current impact of the disability in the academic setting. After reviewing the student's medical and diagnostic records and meeting with the student, the Disability Services staff member makes recommendations for services or reasonable academic accommodations for the student. The medical records and disability documentation will be maintained in the Disability Services Office and used in accordance with applicable confidentiality.

## Procedures for Communicating with Faculty

If the student chooses to receive recommended services that require assistance from an instructor or other staff member, a release form signed by the student will allow the Disability Services staff member to inform the necessary staff members about the student's needs. The Disability Services staff member will be responsible for notifying each instructor in writing about the student's approved accommodations as well as offering assistance to implement the accommodations if necessary. The student should make an appointment with each instructor to discuss the accommodations that are needed for that particular class, and to verify that the instructor has received the accommodation letter.

## Procedural Difficulties with <br> Accommodation Requests

The instructor is only required to make available the accommodations that are delineated within the accommodation letter issued by Disability Services. If students or instructors have difficulty with specific accommodation needs, the Disability Services staff member should be contacted for assistance. If, as the semester progresses, the student feels additional accommodations are warranted, the student should consult with the Disability Services staff member to discuss other support services or options.

## Disability Advisory Committee

The Disability Advisory Committee reviews atypical requests regarding disability accommodations and makes recommenda-
tions regarding requests which involve accommodations related to changes in curriculum or programs. Committee members include the Coordinator of Disability Services, the Director of Counseling Services, and the University Registrar. When appropriate, other individuals relevant to the petition decision may be included in the committee meeting. The committee acts in an advisory capacity and submits written recommendations regarding each request to the Executive Vice President for Academic Affairs. The EVPAA makes final decisions on all requests. To reach the ADA coordinator for UE students, please contact Karen Stenstrom at 812-488-2663. To reach the ADA coordinator for UE employees, please contact Keith Gehlhausen at 812-488-2943

## Grievance Process

Grievance for Denial of Eligibility
If a student feels they have been unjustly denied eligibility for Disability Services, the student should first discuss the problem with a Disability Services staff member. If the issue is not resolved in a satisfactory manner, the student can complete the Grievance/Denial of Eligibility Petition. This form is available in the Dean of Students office. The written petition must be submitted to the Dean of Students within 15 days of denial of eligibility. The Dean of Students will review the petition and make a decision regarding the request.

## Grievance for Recommended Accommodations or Lack of Compliance with Accommodations

If a student is dissatisfied with the accommodations recommended by a Disability Services staff member or the student feels they are not receiving the recommended accommodations from their instructor, the student is asked to discuss their grievance directly with the Disability Services staff member to try to reach an agreement. If the issue is not resolved in a satisfactory manner, the student can complete the Grievance/Denial of Accommodation Petition. This form is available in the Dean of Students Office. The written petition must be submitted to the Executive Vice President of Academic Affairs (EVPAA) within 15 days of the initial complaint. The EVPAA will review the petition and make a decision regarding the request.

## Grievance Appeal Process

If a student is not satisfied with the decision made through the Grievance Review Process and believes they have been harassed or discriminated against because of their disability, they may then contact the Assistant Director of Institutional Equity and Title IX Coordinator to file a complaint as outlined in the University's Harassment and Discrimination Policy

## Subsequent Semesters

Students who want academic accommodations must schedule an appointment to meet with Disability Services each semester to review progress, review the student's schedule and needs for the semester, and secure appropriate releases for notification of instructors. The student will be responsible for scheduling the appointment

## Further Information

For further information contact the Director of Counseling Services, or the Coordinator of Disability Services, at 812-488-2663.

Information regarding documentation guidelines and grievance procedures are available upon request.

## Center for Career Development

The Center for Career Development provides a primary link to the off-campus world of work for both students and alumni by offering a variety of career and job search related services. The office monitors employment trends; posts up-to-date online listings of full-time, part-time, temporary, and summer job opportunities; schedules on-campus interviews; maintains student resumé files in Handshake; compiles employer information; and coordinates a wide range of programs and activities designed to provide useful information on preparing for the world of work.

Actively involved in the University's experiential educational efforts, the office administers the cooperative education program and assists students who seek internships. Additionally, it offers individual career advising, career guidance software programs, and resources for students who are exploring various careers and majors. The office also provides mock interviews, group workshops in career research strategies, effective résumé and cover letter writing, interview techniques, and preparation for graduate school. A comprehensive website and entry into the world of work is found on the office's web page at www.evansville. edu/careercenter.

## Community Service Initiatives

University of Evansville students, faculty, and staff enjoy a rich tradition of volunteerism within the Evansville community. Volunteering enhances life skills development and builds a sense of civic responsibilitycharacteristic ofaneducatedindividual. Thesecharacteristics arehighly valued by employers and critical to members of a democratic society.

Under the supervision of the director of student engagement, student volunteer coordinators match student volunteer interests with the needs of the surrounding community. Located on the second floor of the Ridgway University Center, students may call the office at 812-488-2538 from 8:00 a.m. to 5:00 p.m. Monday through Friday.

## Residence Life

Several housing options are available for full-time students. Six residence halls are located on campus for single students. Six fraternities have living accommodations for their members. Several additional alternate housing units (the University Villages), including small cooperative houses, townhouses, and apartments, are also available to upperclassmen. Other students commute from their homes or prefer off-campus living in privately owned facilities.

All students must reside on campus for a minimum of two academic years or the equivalent of four full term semesters. Transfer students with less than 60 academic credit hours earned at previous institutions (excluding bridge, early-college, dual-credit, and advanced placement credit) arealso required to live on campus or in University-sponsored housing.

Students who meet one of the following criteria may request an exemption:

1. The student has attained the age of 21 prior to the start of the academic year
2. The student's local residence is with parents or legal guardians (Transfer students may have a local residence with
immediate family over the age of 21)
3. The student is married and/or must live with a dependent.

A complete description of residency requirements for students (includingtransfers) canbefoundontheUniversitywebsiteandinthe Student Handbook.

The residence halls are an integral part of the UE academic community and have been developed, staffed, and programmed to provide an environment that enriches the educational experience. Further information on the residence units, including regulations for residential living, may be found in the Student Handbook.

## Health Center

The Crayton E. and Ellen Mann Health Center is staffed by threelicensedregisterednurses andapart-time physician. Basicfirst aid, medication, and treatment for minor illness are provided at the center. Students who are seriously ill or require hospitalization will be referred to other facilities. In addition, the center provides health information and health counseling.

Full-time UE students are eligible for treatment of minor illnesses at the health center. A registered nurse is available during regular hours. Each student must be evaluated by a staff nurse prior to an appointment with a physician. Emergency procedures are in place at the center for students needing immediate care.

The University provides a health information form that must be completed by all students prior to registration for the first semester. The health information form requires immunization information and allows for the student to share health insurance information. Note: The University of Evansville strongly recommends that all students carry adequate health insurance.

The Crayton E. and Ellen Mann Health Center is located in Sampson Hall, next to the McCurdy Wing of the Schroeder Family School of Business Administration Building. The center's telephone number is 812-488-2033. The health center hours are posted on the University website on the student health center link at the beginning of each school year.

During summer sessions, the center's hours are limited with nurse coverage only. The health center is closed during semester breaks and some holidays. Hours may vary according to University needs.

## Diversity Initiatives

The University of Evansville is committed to creating an environment that celebrates the diversity of all cultures. The campus environment fosters a broader sense of community by providing all students with cross-cultural experiences and supporting the needs and interests of all students.

Programs offered throughout the year include guest speakers, film presentations, panel discussions, workshops, and forums designed to enhance awareness of cross-cultural issues and race relations.

## Religious Life

As a United Methodist Church-affiliated institution, the vision of the Office of Religious Life is to connect the soul of God to the heart of the University.

The mission of the Office of Religious Life seeks to support the expressionofreligiouscommitmentthroughworship,service,study,and fellowship.

Neu Chapel represents the heart of religious life on campus and
is a safe place for spiritual growth and interfaith exploration, where students can engage the spiritual dimension of life and be vitally connected to their faith tradition. Our freestanding chapel, built in 1965 includes a 350 -seat sanctuary, the Office of Religious Life, Grabill Lounge, the John Wesley Gallery, and the Kell Interfaith Prayer Room.

Various types of worship experiences and Roman Catholic Mass are held throughout the academic year in Neu Chapel from across the campus and the local community. A number of diverse Bible studies and fellowship groups are offered throughout the week by a team of campus ministers who represent a variety of religious traditions. The Director of Religious Life is also available for individual spiritual formation and counseling.

Realizing our identity as a church-related institution, we are called to initiate and promote better relationships between Christians and other faith communities of the world based on informed understanding, critical appreciation, and balanced perspective of one another's basic beliefs. The Office of Religious Life seeks to implement interfaith initiatives by intentionally bringing together people of diverse religious traditions for the educational benefit of UE students and the larger community.

## Dining Facilities

The University of Evansville contracts with Chartwells to provide quality dining for University residents. Dining on the Evansville campus is offered through a number of venues. For details see the residence life web page evansville.edu/residencelife/dining.cfm.

## Cultural Events

Numerous cultural and educational events are available to students throughout the year. These include art exhibits, drama productions, readings, concerts, recitals, and lectures.

## Recreation and Athletics

By promoting physical well-being, mental stimulation, and social interaction, recreational and athletic activities at the University form a key component of the total educational program. Students are encouraged to participate in sports instruction, activities, and competitions.

As a member of the National Collegiate Athletics Association, the University sponsors intercollegiate teams for men in baseball, basketball, cross country, golf, soccer, and swimming and diving, and for women in basketball, cross country, golf, soccer, softball, swimming and diving, tennis, and volleyball. In addition, UE has a well-balanced intramural and recreational activities program.

## Student Engagement

Located in the Ridgway University Center, the Center for Student Engagement serves as the central clearinghouse for all student organizations and campus activities. Core services include student organization and campus-wide events registration, volunteer services, civic engagement, Greek life, and leadership programming. The center strives to link student interests and skills with campus and community programs that enhance the student's overall education.

## Cultural Engagement and International <br> Services <br> The Office of Cultural Engagement and International Services

assists international and American students in a variety of ways related to the international dimensions of their education. As the central office on campus for matters concerning international students, the office assists students in their adjustment to the University and the Evansville community and provides support services to ensure that each student's educational experience is successful. The office advises students on immigration and academic, personal, financial, and professional concerns. In addition, the office provides programs designed to enhance each student's academic experience and to help everyone learn more about each other and the world in which we live. Regular programs include cultural events sponsored by the International Club, the International House, and the UE Global Friends and Families Program.

## UEngage Transcript

UEngage is an online software that tracks and manages all student organizations, their membership and events. Through this system, students can manage an experiential transcript that can be used to reflect upon all of their involvements while a student at the University of Evansville. Students have control over what is displayed on their experiential transcript and can provide it to employers or share it with a career advisor to highlight experiences on a resume or interview process.

## Leadership Academy

The Leadership Academy is a two-year, three-tiered program for selected students wishing to enhance and apply their leadership potential. The academy focuses on personal development (Tier I); group development (Tier II); and community involvement, volunteer service, mentor programs, and presentation development (Tier III). The academy is under the supervision of a student advisory council and the Student Government Association.

## Student Government Association

The Student Government Association provides a sounding board for student ideas, fosters academic freedom and responsibility, promotes student rights and responsibilities, recruits students to serve on administrative and faculty committees, and seeks to improve inter-University communication and relations.

## Student Congress

Members represent students from residence halls, commuters, alternative housing, and all organizations. The congress serves as the legislative body of the Student Government Association and has authority to advise and initiate legislation on issues of student interest or concern.

## Student Activities Board

The Student Activities Board initiates campus-wide social and educational programming, including concerts, films, lectures, and recreational opportunities.

## Student Media and Publications

## Crescent Magazine

A monthly magazine printed for the UE community by students, the Crescent Magazine serves as a forum for campus news and opinions through its editorials, columns, and letters to the editor. Coverage of national, local, and campus issues are included in each issue.

## Literary Review

Two literary magazines, the Evansville Review and Ohio River Review, are produced by students.

## Student Organizations

Students are encouraged to create or join student organizations based on the Student Handbook guidelines. Student organizations enhance the college experience by providing practical learning opportunities with fellow students and faculty. A current list of all student organizations is available in the Center for Student Engagement or online at evansville.edu/organizations.

## Academic, Professional, Honorary

Classroom learning is enhanced through informal faculty and student interaction among academic organizations. Students apply what they learn in class through programming, regional and national competition, workshops, field trips, and professional conferences. Many disciplines also offer selective honorary societies that recognize outstanding achievement and character.

## Athletics Support

Athletics support organizations support varsity athletic teams through dance and cheer teams. Membership is offered through try-outs in the fall.

## National Social Fraternities and Sororities

Membership is offered in the form of "bids" or invitations after a series of recruitment events. Social fraternity and sorority membership provides opportunities for social, civic, academic, and leadership development, as well as brotherhood and sisterhood. Current men's fraternities include Lambda Chi Alpha, Phi Gamma Delta (Fiji), Phi Kappa Tau, Sigma Alpha Epsilon, Sigma Phi Epsilon, and Tau Kappa Epsilon. Women's fraternities (referred to as sororities) include Alpha Omicron Pi, Chi Omega, Delta Omega Zeta (local sorority), Phi Mu, and Zeta Tau Alpha. Visit greeklife. evansville.edu for more information.

## National Fraternity and Sorority City Chapters

City-wide Greek chapters are offered to students who seek a broader base of membership that may include members from one or more local colleges and universities. Alumni chapter members often help facilitate these organizations through their close contact. Historically African American fraternity and sorority city chapters include Alpha Phi Alpha Inc., Kappa Alpha Psi Fraternity Inc., Alpha Kappa Alpha Sorority Inc., and Delta Sigma Theta Sorority Inc.

## Student Publications

The student magazine (Crescent Magazine) and literature reviews (Evansville Review and Ohio River Review) offer journalistic training and literary expression with national award-winning publications.

## Religious

Students are encouraged to pursue their personal faith journeys through regular meetings, worship, spiritual retreats, volunteer service, and social activities. Most major religions and Christian denominations are represented at UE.

## Social, Civil, Recreational

The majority of student organizations fall into this category. These organizations offer braod social, cultural, and community service oppprtunties. Membership is open to all students with similar interest.

## Student Government

Leadership, governance, and student service epitomize the philosophy and mission of student government. Full-time student actvity fees fund these organizations, which in turn provide an array of programs and services for the entire student body. Membership is by election and appointment.

## University Committees and Task Forces

Many University departments offer rewarding presonal and leadership development experiences that also serve to assist administrative fuctions. Membership is offered through administrative selection processes and appointments.

## University of Evansville Libraries

University of Evansville Libraries provides an array of information services that underwrite the curricular and research programs of the University. Services range from traditional library collections and electronic full-text databases to individualized reference assistance and library instruction. Information on library holdings is available through the online catalog and discovery system known as QUEST, which is accessible across campus as well as remotely.

UE Libraries' collections include more than 240,000 bound volumes of books and periodicals, access to more than 21,000 scholarly e-journal titles, and access to many important online research databases. Collections are supplemented by an active interlibrary loan service through which the resources of other libraries are made available to students and faculty. Circulation policies permit books, journals, DVDs and CDs to be borrowed.

UE Libraries is open extensive hours each week during academic semesters. Professional librarians are eager to assist students with research assignments as well as with general information needs. UE Libraries offers extensive quiet study areas for individuals and groups, including private study rooms that may be reserved in advance. Specialized services and resources include the University Archives as well as the Multimedia Learning Resources Center located in Graves Hall. UE Libraries supports study and teaching at Harlaxton College by providing access to online databases available on the Evansville campus.

Visit the Libraries' web site (evansville.edu/libraries/) or contact the Information Desk at 812-488-2482 for more information.

## Degrees, Curriculum, Academic Opportunities

## Degrees

## Baccalaureate Degrees

UE offers undergraduate programs leading to the Bachelor of Arts (BA), Bachelor of Fine Arts (BFA), Bachelor of Music (BM), and Bachelor of Science (BS) degrees. A complete list of majors, concentrations, and preprofessional programs follows.

## Graduate Degrees

UE offers the following graduate degrees: Master of Physician Assistant Science, Master of Science in Athletic Training, Master of Science in Health Services Administration, Master of Science in Leadership, Master of Science in Public Health, Doctor of Nurse Anesthesia Practice and Doctor of Physical Therapy.

## Certificates

UE offers certificate programs: British Studies, Classical Greek, Computer in Science and Math, Gerontology, Integrating Business and Career Education (iBACE) and an Energy Engineering Certificate. iBACE is open to all students outside of the School of Business and the Energy Engineering Certificate is open to engineering students.

## Graduate Certificates

UE offers the following graduate certificates: Non-profit Leadership, Innovation, and Higher Education Leadership and Gerontology.

## Organizational Structure and Programs of Study

The University's instructional program is organized into three academic colleges, and schools, two specialized centers of education and the special study abroad site of Harlaxton College in England.

## College of Arts and Sciences

The college provides quality liberal education in the arts, humanities, the natural and social sciences, as well as professional training in the fine and performing arts and creative writing. The programs of study are organized into departmental units (where appropriate) as follows:

Department of Archaeology
Archaeology
Classical Studies
Department of Art
Art Education
Art and Associated Studies; Studio Art
Pre-Art Therapy Concentration
Visual Communication Design
Department of Biology
Applied Biology
Applied Biology - Education
Professional Biology
Department of Chemistry
Chemistry
Chemistry - Education
Biochemistry
Business Emphasis

Environmental Administration
Environmental Science
Department of Communication
Communication
Health Communication
Sports Communication
Department of English and Creative Writing
Creative Writing
Writing
Literature
Department of Foreign Languages and Cultures
French
Latin
German
Greek
Spanish
International Studies
Gender and Women's Studies
Department of History and Society
History
Ethics and Social Change
Political Science
Interdisciplinary Studies
Department of Mathematics
Applied Mathematics
Mathematics
Mathematics - Education
Predoctoral Mathematics
Statistics and Data Science
Department of Music
Music
Music Management Specialization
Music Education
Music Performance
Music Therapy
Department of Physics
Physics
Physics - Education
Preprofessional
Pre-dentistry
Pre-pharmacy (two-year)
Pre-law
Pre-physician assistant
Pre-medicine
Pre-theology
Pre-optometry
Pre-veterinary Medicine
Department of Psychology and Behavioral Sciene
Cognitive Science
Neuroscience
Psychology
Criminal Justice
Sociology
PsyD in Clinical Psychology
Department of Theatre
Stage Management
Theatre Studies
Theatre Design and Technology
Theatre Management
Theatre Performance
Inactive Programs start 2021
Art History
Religion
Ethics

## College of Business and Engineering

The College of Business and Engineering houses both teh Shcroeder Family School of Business Adminstration and College of Engineering and Computer Science. They offer a wide range of programs.

## Schroeder Family School of Business Administration

The school offers the following programs within the confines of its organizational umbrella:

Accounting
Finance
Global Business
Logistics and Supply Chain Management
Management
Marketing
Also available is a Bachelor of Arts and a Bachelor of Science degree with a major in Economics.

## School of Engineering and Computer Science

The College of Engineering and Computer Science provides an array of professional programs in computer science, civil engineering, computer engineering, electrical engineering, mechanical engineering.

Civil Engineering
Computer Science
Computer Engineering
Construction Management
Electrical Engineering
Mechanical Engineering
College of Education and Health Sciences
The College of Education and Health Sciences offers a number of programs in education and health sciences that share common pedagogical approaches to teaching through supervised teaching and clinicals.

School of Education
Multi-Grade Education Music
Elementary Education
Senior High, Junior High, Middle School Education
Art
English
Spanish
Mathematics Science: Life Science, Chemistry, Physics
Social Sciences: Historic Perspectives, Civics and Government, Economics, Psychology, and Sociology, Social Studies

School of Health Sciences
Athletic Training (master's degree)

Clinical Laboratory Science
Exercise Science
Health Services Administration (bachelor's and master's degrees)

Public Health (bachelor's and master's degrees)
Dunigan Family School of Nursing Nursing
Doctor of Nurse Anesthesia Practice
Department of Physical Therapy Physical Therapy (doctoral degree)
Department of Physician Assistant Science
Master of Physician Assistant Science
Inactive Programs Start 2021
Athletic Training (Bachelors Degree)

## Harlaxton College

Harlaxton College offers a semester of intense academic and experiential learning in British and European culture. An interdisciplinary course, The British Experience from the Celts to the Present Day, is taught by a team of excellent British professors and is integrated with superb travel programs. In addition, courses are offered in traditional academic subjects by visiting professors from several US universities.

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Center for Adult Education
    Leadership (master's degree)
    Organizational Leadership
    Public Service Administration (master's degree)
    University Studies
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## General Requirements for Baccalaureate Degrees

Summary of Requirements
To receive a baccalaureate degree, a student must:

- Complete at least 120 semester hours of credit (or more as required for specific programs)
- Complete the Enduring Foundations General Education Program (41 hours)
- Complete a major program of study - at least 51 percent of the courseworkinthemajormustbecompletedatUE(seespecific requirements for each major)
- Earn a minimum grade point average of 2.0 in both the major and the total program of study
- Complete at least 48 semester hours of credit at UE
- Complete at least 39 semester hours of credit in courses numbered 300 or above
- Satisfy the foreign language proficiency requirement
- Satisfy the residency requirement
- Formally apply for the degree no later than one year before anticipated graduation
Specific degree program requirements arestipulated bytheacademic unit offering the degree.

No credit toward graduation is awarded retrospectively to lower-level course work based solely upon satisfactory completion of more advanced course work in the same subject area, except for academic sequence courses in foreign languages and cultures completed at the University of Evansville.

## Credit Limits for Bachelor of Arts Degree

No more than 45 hours in any single subject area may be counted toward the Bachelor of Arts degree.
Writing Proficiency Requirement for Freshmen
All incoming freshmen are tested for writing skills through the SAT or ACT as a part of registration for their first terms in residence on campus. Students who do not meet the criteria of entry level collegewriting throughachievement ofaspecifiedscoreonthewriting portion of the selected exam will be required to enroll in First-Year Seminar 111. Those meeting the minimum writing proficiency will be placed into First-Year Seminar 112.

Writing Proficiency Requirement for
Transfer and Part-Time Students

All transfer and part-time students are tested for writing skills through the SAT or ACT prior to their first terms in residence. Those students who do not have an SAT or ACT score will be required to complete UE's writing placement exam. Students who do not meet the criteria of entry-level writing through achievement of a specified score on the writing placement exam will be required to enroll in First-Year Seminar 111 in their first year to provide extra help in developmental writing skills. Students who meet the criteria on entry-level writing through achievement of a specified score on the writing placement exam will be enrolled in First-Year Seminar 312.

## Writing Proficiency Requirement for

 International StudentsAll international students may be required to sit for a writing placement exam prior to their initial registration at the University of Evansville. This exam will be administered by the Office of Cultural Engagement and Student Services and will be read by the director of the Writing Center, who will determine the appropriate writing sequence for each student.

International students who are required to enroll in English language courses must take First-Year Seminar 111E before taking First-Year Seminar 112. Students must obtain at least a C in English Language (EL) 111 before enrolling in First-Year Seminar 111E.

Students should begin the First-Year Seminar sequence as soon as possible after successfully completing English language courses in order to maintain progress in reading and writing, and to develop the academic skills necessary for success at UE.

International transfer students will be placed in appropriate writing and reading courses on the basis of the writing exam and the Michigan Test of English Language Proficiency. Course work would be selected from English Language 110, and 111.

## Foreign Language Proficiency Requirement

All students entering the University are required to demonstrate proficiency in a foreign language equivalent to the completion of a university-level, first-year foreign language course numbered 112.

All Bachelor of Arts degree candidates a re required to demonstrate proficiency in a foreign language equivalent to the completion of a university-level, second-year foreign language course numbered 212.

The Bachelor of Arts degree in international studies requires proficiency in reading and speaking a foreign language at a level equivalent to that achieved by satisfactory completion of a foreign language through the third year; or two years of col-lege-level competency in two foreign languages.

These requirements shall be met in one of two ways: by satisfactory completion of the appropriate level of foreign language course work at the University of Evansville or another accredited institution of higher education. Course credit will not be awarded through the proficiency exam, but students may meet the foreign language proficiency requirement (equivalent to 112 for BS degrees, equivalent to 212 for BA degrees) by achieving particular scores on the proficiency exam. The tests are administered only during freshman registration and placement scores expire after one year. See details below.

The foreign language proficiency requirement will be met through the second-year University level if a student successfully completes one of the following: (a) completion of a third-year college course in a foreign language or introduction to literary analysis (b) completion of the College Board Advanced Placement Exam with a grade of four or five. Advanced placement examina-
tions are administered in May at approved testing centers. Should a student take both the Spanish Literature AP exam in addition to the Spanish AP exam and receive a four or five on both, students will place into Spanish 311 and receive 3 credits for a UE elective course not in Spanish.

## Foreign Language Proficiency Testing

1. Proficiency testing is required for all students with previous foreign language experience. Proficiency scores expire after one year and students waiting longer than one year to enroll into the course in which they place, must retake the proficiency exam through the department of Foreign Languages and Cultures.
2. Students taking a proficiency exam may enroll one level lower than the exam warrants, with the advice and consent of the student's advisor and the chair of the Department of Foreign Languages and Cultures.
3. Non-graded course credit will be awarded through the proficiency exam if students enroll one-level higher at UE and pass the course with a C or better. Should students meet the foreign language proficiency requirement (equivalent to 112 for $B S$ degrees, equivalent to 212 for $B A$ degrees) by proving proficiency on the exam for that level but not enroll in the next level, they will meet the foreign language proficiency requirement but receive no credit.
4. Students who begin their foreign language study above the 111 level will receive up to six hours of non-graded credit in introductory or intermediate level courses below that level if theysuccessfullycompletetheupper-levelcoursewithagrade of C or higher at UE. Example: Student places into French 211. Upon successful completion of French 211 at UE, the student will receive six hours of non-graded credit for French 111, 112. The Office of the Registrar will process these retroactive credits.
5. No additional credits will be granted to students who are awarded transfer credits in foreign language from approved academic institutions.

## International Students

Students whose native language is not English will satisfy the foreign language requirement by meeting the University's writing requirement; however, no credit hours are granted toward graduation. Furthermore, native speakers of a foreign language may not earn hours toward graduation for foreign language classes in the 111-212 courses or 300 level conversation courses in their native language.

## Residency Requirement

In order to ensure that degrees awarded meet the standards and expectations of the University, all degree-seeking students, regardless of major, must earn in residence at the University:

1. At least 48 degree-applicable semester hours;
2. The majority of hours in the major, subject to requirements of specific majors; and
3. The last 15 credit hours toward the degree.

The number of credits a student may transfer to the University of Evansville once he or she has matriculated is limited to three courses (maximum of 10 semester hours). Such transfer credit must have the prior approval of the student's academic advisor and the registrar on a Transfer Credit Request form filed with the Office of the Registrar.

Requests for exceptions to the residency requirements must be submitted in writing to the Admissions and Standards Committee.

Requirements for an Additional Degree
After earning a baccalaureate degree at the University of Evansville, to be eligible for an additional baccalaureate degree, a student must earn a minimum of 30 additional hours in excess of those required for the previous degree and meet all specified requirements for both degrees. A minimum grade point average of 2.0 must be earned in the total program of study. The same courses may be used to meet the requirements for an additional degree. Completion of a double major does not automatically mean requirements for two degrees have been met.

## Requirements for an Additional Major

To earn an additional major, a student must complete all requirements for that major as listed in the catalog, including all ancillary courses. A minimum grade point average of 2.0 must be earned in the additional major. At least 51 percent of the hours in the major must be completed in residence. Completion of an additional major does not necessarily mean requirements for two degrees have been met.

## Requirements for a Minor

A minor is not required for graduation, although one may be recommended by various departments. If a department offers a minor, the requirements will be listed in that department's section of this catalog. A minor will generally require at least 18 semester hours of course work (some of which may be specified) in the minor subject area, and completion of at least 51 percent of the course work in residence at UE. A minimum grade point average of 2.0 must be earned in the minor.

## Enduring Foundations <br> General Education Program

The University of Evansville is committed to the liberal arts and sciences serving as the center of every student's education. The breadth of knowledge and engagement that is characteristic of a liberal education is central to developing strong students from across all majors at the University who are prepared to live and thrive as global citizens in our increasingly complex, diverse, and changing world. The Enduring Foundations General Education Program provides students with that strong foundation in the liberal arts and sciences and supports the University's international focus and commitment to social responsibility. The program is framed in terms of student learning, clearly identifying the variety of ways that students will develop knowledge and skills, exercise creativity and innovation, engage big questions, and learn to make a difference in their world. The Enduring Foundations General Education Program makes up approximately one-third of every undergraduate degree at the University.

## General Education Objective

Engaged in the human quest for wisdom in its varied expressions and informed by a core cultural, analytical, and scientific literacy, graduates will be prepared to think critically, communicate effectively, judge ethically, act responsibly, and lead full, rich, and productive lives as global citizens.

## General Education Outcomes

As a result of this curriculum, graduates shall demonstrate:

1. Critical reading and thinking (3 hours)
2. Engagement with imaginative expressions of the human condition (3 hours)
3. Knowledge of human history and the historical context of
knowledge (3 hours)
4. Engagement with fundamental beliefs about human identity, core values, and humankind's place in the world (3 hours)
5. Understanding of human aesthetic creation and artistic creativity (3 hours)
6. Linguistic and cultural competence in a language other than one's own (6 hours)
7. Quantitative literacy (3 hours)
8. Scientific literacy (7 hours)
9. Understanding of core concepts of society, human behavior, and civic knowledge (6 hours)
10. Knowledge and responsibility in relation to health and wellness (1 hour)
11. An ability to think critically and communicate effectively, orally, and in writing. (3 hours)
In addition to these outcomes, all students must meet university requirements for writing across the curriculum.

## General Education Courses

A list of specific courses that satisfy the core general education and overlay graduation requirements outlined below can be found on the Enduring Foundations General Education website or the registrar's website.

## General Education for Transfer and

## Part-Time Students

As with traditional matriculating freshmen, transfer and parttime students will need to complete the same general education requirements. Often, but not always, students who transfer in courses from another institution will meet some or even many of the general education requirements through those transferred courses, depending on the nature and number of what is transferred. Evaluation of transfer applications will provide specific information on what requirements are met through a particular student's transferred courses.

## Assessment of Academic Programs

All academic programs at the University of Evansville assess student learning on a regular basis. The mission of student learning assessment is to improve student learning and enhance the effectiveness of the academic programs at the University of Evansville by objectively measuring learning outcomes and using the results to inform both continuity and change. The assessment of student learning is conducted at the program level but is coordinated and evaluated by an Academic Assessment Committee consisting of a faculty member who serves as chair, other faculty members, the dean of the College of Arts and Sciences, and administrators from the Office of the Vice President for Academic Affairs, Student Life, and the Office of Institutional Research. The information gathered is used by the academic programs to continually monitor whether the knowledge, skills, and attitudes of students are meeting learning outcomes of the program and the educational objectives of the University.

## Special Educational Opportunities

ChangeLab
ChangeLab is program that offers students a chance to use their skills to create positive change in the community locally or globally. Students of any level and any major may participate in the ChangeLab, andmanychoosetotakemultipleChangeLabcoursesthroughout their time at UE. In this experiential program, students enroll in
aclassandworkas partofamultidisciplinaryteamto provideservices or develop innovative solutions.

ChangeLab projects address the needs of clients whose organizations may be for-profit companies, non-profits, or government agencies. Additionally, the ChangeLab program also offers students the unusual opportunity to propose their own course project and work on projects they are passionate about while earning class credit. UE students who participate in the Changemaker Challenge often choose to continue their Changemaker projects by proposing their own ChangeLab course. In any given semester, students have a range of projects to choose from addressing such topics as alternative energy, neuromarketing research, infant mortality, urban planning, product development, food waste, global market expansion, and more. Many projects are conducted in Evansville, but some take place in places such as Guatemala, Cuba, and Harlaxton.

Whether working on a project proposed by a client or one they have proposed themselves, students work as part of a diverse team guided by faculty coaches and industry experts to deliver valuable and meaningful results. Additionally, they receive training in teamwork, project management, creative problem solving, and presentation skills through workshops provided throughout the course. All ChangeLab projects culminate with a professional presentation to the client organization or project stakeholders outlining their research findings and recommended solutions. Participation in ChangeLab enables UE students not only to develop skills critical to the workplace but also provides guidance on ways to showcase those skills to prospective employers or graduate schools. Through this unique experiential program, students have an unparalleled opportunity to develop real-world problem-solving skills that prepare them for the increasingly complex challenges and ever-changing environments of the 21st century.

## Honors Program

The Honors Program offers highly motivated and talented students the opportunity to participate in unique academic and extracurricular experiences alongside peers and faculty who share the love of learning and desire to excel. Honors students are known for their passion and collegiality, and they serve as catalysts who propel the University's academic excellence forward.

The Honors Program provides curriculum that challenges students to maximize their potential in all areas of study and fosters independent thinking. Honors students enroll in at least 15 hours of Honors courses, which are designed to offer a particularly stimulating learning experience and the occasion for close collaboration with faculty and other Honors students. These classes are often special Honors sections of courses that students are already taking for completion of their major or general education program. Honors Program students also complete an Honors project, which serves as the capstone of the Honors experience and provides a unique opportunity for students to explore an area of study about which they are passionate. Students present this culmination of their work to faculty and other students during the Honors Program presentation sessions held each spring. In addition to these requirements, students must maintain a minimum GPA of 3.5 to remain in the Honors Program.

The Honors Program also enhances one's social experience at the University by fostering a lively community life among its participants. Honors students have the opportunity to live in the Honors residence hall (Powell) and engage in Honors-sponsored events, including informal gatherings, trips, and the annual Nerd

Wars trivia competition. The Honors Program also encourages its students to engage in a variety of other extracurricular and cultural activities across the campus and in the community.

Both prospective and current students who meet admission requirements are encouraged to apply. As application criteria can change from year to year, anyone interested in applying to the program should consult with the Office of Admission or Honors Program staff regarding the current requirements.

## Undergraduate Research Program

Developed with support from the Lilly Endowment Inc., the undergraduate research program known as UExplore provides students and faculty the opportunity to work together on research by providing funding for joint projects. Undergraduate research is definedinabroadsenseasresearch,scholarship,orcreativeactivities, and thus includes projects from the sciences, humanities, fine arts, and professional programs.

For student-generated proposals, the student researcher is responsible for the majority of the concept development, project design, and proposal writing. Student and faculty collaboration, however, is an essential part of learning. In most cases, research results are presented at campus seminars, regional and national conferences, or published.

Eligible students may participate in fall-semester, spring-semester, or summer research projects. Financial support is available in the form of summer research stipends with free double-occupancy housing during the 10-week summer research period and grants for materials, equipment, or services. Semester projects are limited to grants for materials, equipment, or services. Travel grants are also available for students presenting papers at the National Conference on Undergraduate Research or other discipline-specific conferences.

Cooperative Education (Co-op)
Cooperative Education at the University of Evansville is paid, career-related employment integrated with academic programs requiring at least three measurable learning objectives, self/ employer evaluation and reflective writing. This flexible learning option is available for all undergraduate majors. There are two options available: Traditional (Full-Time) and Concurrent (Part-Time). The University of Evansville's Cooperative Education Program is managed by the Center for Career Development in full collaboration with each College or School.

Traditional co-op requires most students to complete a 5 year program, as compared to a traditional 4 year academic program. A paid educational employment experience that is full-time, 30-40 hours of work per week for 12-15 weeks. Students must complete at least 3 separate work periods and will usually, but not always rotate between work sessions. Some traditional co-op opportunities may be in consecutive semesters of work, which may provide flexibility with course sequencing and academic requirements. All students should maintain communication with their academic advisor, Center for Career Development and have a degree completion plan.

Prerequisite: EXED 090, Building Your Professional Image; zero or one credit hour, Pass/Fail, Does not count toward graduation.

UE Course: COOP 091 for students enrolled in all Colleges and Schools; may be repeated. Zero or one credit hour.

Concurrent co-op is a paid educational employment experience, typically 8-20 hours of work per week for usually a minimum of 12 weeks. Concurrent co-op is available for students enrolled full time, in at least 12 credit hours. May be taken only in
the fall and spring.
Prerequisite: EXED 090, Building Your Professional Image; zero or one credit hour, Pass/Fail, Does not count toward graduation.

UE Courses: College of Engineering and Computer Science ENGR 081, one credit hour, does not count toward graduation, Pass/Fail.

All other students: EXED 072, one credit hour, Pass/Fail.
Traditional Co-op
This co-op plan combines classroom education with full-time professional work experience and provides students with opportunities for earning a part of their University expenses. Through the co-op program, students are offered a variety of professional experiences, ranging from assisting technical staff members to independent research and development. Upon satisfactory completion of the program, the student is designated a co-op graduate and awarded a co-op certificate at the time of graduation.

Under the traditional co-op plan, the student spends alternate or consecutive academic semesters working full time for the co-op employer and studying as a full-time student. Normally, a co-op student is able to earn a bachelor's degree and work four semesters over a period of five calendar years, provided the student follows the prescribed schedule for work and school shown in the following plan (may vary depending on the major program and year in school).

Schedule One

|  | Fall | Spring | Summer |
| :--- | :--- | :--- | :--- |
| First Year | School | School |  |
| Second <br> Year | School + <br> EXED 090 or | School + <br> EXED 090 | Work <br> Rotation 1 |
| Third Year | School | Work Rotation 2 | Work/School/ <br> Open |
| Fourth <br> Year | Work Rotation 3 | School | Work <br> Rotation 4 |
| Fifth Year | School | School |  |

A second option in the Traditional Program is the 3 or 4 semester consecutive rotations schedule. In this plan, a student would finish at least three semesters of full-time coursework at the University of Evansville prior to beginning their work period.
Schedule Two

|  | Fall | Spring | Summer |
| :--- | :--- | :--- | :--- |
| First Year | School | School |  |
| Second Year | School <br> EXED 090 | Begin Rotation 1 | Compete <br> Rotation 2 |
| Third Year | Complete <br> Rotation 3 | School | Internship/ <br> School/Open |
| Fourth Year | School | School | Internship/ <br> School/Open |
| Fifth Year | School | School |  |

This same pattern may be applied after completing four, five or six semesters of full time academic coursework.

## Concurrent Co-op

Not every student has the opportunity to locate a traditional co-op position providing professional full-time experience. Many opportunities exist in Southwest Indiana that provide critical hands-on experience for a wide variety of careers in a part-time role. Numerous employers have long-standing relationships hiring students in professional and paraprofessional capacities for their small businesses, nonprofits and global corporations. Students possess in-demand skills such as computer knowledge, creativity, business fundamentals, social media savvy, communication and customer service coupled with flexible schedules and professional energy. A concurrent co-op is a viable option for most majors and provides a way to connect academics to practical training. Careers associated with local part-time paid positions include: engineering, computer science, information technology, marketing, graphic design, communication, media, religion, management, accounting, finance, writing, modeling, analysis, education, health care and human services. When needed, the Center for Career Development will facilitate the concurrent co-op program for students with existing part-time positions that qualify and support others in their search for a suitable opportunity. The concurrent co-op program is a simple and direct way to link professional part-time employment with curriculum and allow the student to earn the University's Co-op Certificate.

## General Information

Students must satisfy the same course requirements whether they pursue the regular four-year study plan or the five-year co-op plan. All students participating in the co-op program should consult with their academic advisors prior to accepting a co-op job offer. To avoid course scheduling problems that would likely cause a delay in the expected date of graduation, the student and advisor should develop and map an academic advising plan that takes into account the choice of cooperative education for the remainder of the student's educational program. Students may delay entering the co-op program from the second summer to the third spring semester provided that they plan to complete the program.

Application for admission to the co-op program is normally made during the fall semester of the second year after enrolling in Experiential Education 090, which is a zero or one credit seminar managed by the Center for Career Development staff. To be eligible for admission to the co-op program, a student must have a cumulative grade point average of at least 2.25 for Engineering and Computer Science ( 2.50 for all other majors) based on at least three semesters of full-time study. In addition, the eligible applicant must have completed the equivalent of the first three semesters of their desired degree at the time of the first work period and generally complete three semesters of work.

Some employers require U.S. citizenship or permanent residence status. International students holding an F or J type visa completing an experiential experience in the United States must abide by the requirements stated in the CPT Guidelines and must coordinate these activities with the UE Designated School Official (DSO). A copy of the CPT Guidelines may be obtained from the Center for Career Development's Website: www.evansville.edu/ careercenter. The Center for Career Development partners with Cultural Engagement and International Services, advisors and international students to facilitate their participation in the co-op program.

Transfer students are invited to apply for the co-op program
after consulting with their academic advisor to ensure that co-op course schedules will permit satisfactory progress toward their desired degree. Transfer students must satisfactorily complete one semester of full time course work at the University of Evansville and meet all other guidelines/requirements.

The Center for Career Development staff will seek to identify suitable employment for all eligible applicants. However, final admission to the program is governed by the availability of jobs, and employment in the program cannot be guaranteed. Normally a student is eligible for co-op job commitment only once and is expected to remain employed by the initial co-op employer until the program is completed. If the student requests a change of employer, the Senior Director or designee will review the merits of the request and grant it at his or her discretion. Additional requests for change of employer will normally be denied and may necessitate additional fees.

Students admitted to the co-op program must be regularly enrolled each semester in either full-time studies at UE and/or in the appropriate Cooperative Education course. A cumulative GPA of at least 2.25 must be maintained to continue in the program. A co-op fee is charged for enrollment in the Traditional Program, Cooperative Education 091 for the first three roatations and must be paid in accordance with the University's standard schedule for payment of tuition and fees. Co-op fees are used to help offset the costs of administering the program. There is no cost for enrollment in Concurrent Co-op, as long as a student is enrolled as a full time student with 12-18 hours of credit.

During their co-op employment, students are regular employees of the company and are paid at a rate commensurate with the type of work they are doing within that company's compensation schedule. Co-op students are given assignments of increasing complexity and responsibility as they demonstrate their capability for progression. The student's performance is regularly reviewed by the employer and the Center for Career Development staff with the assistance of the student's academic advisor. The student is expected to maintain communication with the Center for Career Development and their academic advisor while they are enrolled in the co-op program.

Employers participating in the co-op program are located throughout the nation and include large global companies, smaller local companies, public utilities, government agencies, nonprofits, health care, and laboratories. Given marketplace limits, effort is made to meet each student's preference for employer and job location. New co-op firms are often added based on student interest.

Students interested in participating in the co-op program should meet directly with their academic advisor or department chair prior to scheduling a meeting with the Center for Career Development.

## Engineering Internship

The University of Evansville College of Engineering and Computer Science Internship Program is managed by the Center for Career Development. It is a paid educational experience, 30-40 hours of work per week for a minimum of 8 weeks and usually available only during summer sessions. Students enrolled in an Engineering Internship must have earned at least 18 earned credit hours at the University of Evansville, with at least nine hours of cumulative progress toward a degree in the College of Engineering and Computer Science during the previous two academic terms. Students must be in good academic standing with a cumulative GPA of at least 2.25. Transfer students should
consult with their academic advisor or department chair to ensure that course schedules will permit participation. Transfer students should satisfactorily complete one semester of full time course work at the University of Evansville and meet all other guidelines/ requirements. Specific academic requirements include developing at least three measurable learning objectives, self/employer evaluation and reflective writing. The position description and potential learning objectives require prior approval by the Senior Director of the Center for Career Development or designee.

Prerequisite: EXED 090, Building Your Professional Image; zero to one credit hour, Pass/Fail.

UE Course: College of Engineering and Computer Science: ENGR 071, Zero Credit, Pass/Fail, May be repeated.

## Experiential Education EXED

## Internship

EXED 071 is a noncredit internship option open to students enrolled in: College of Arts and Sciences, School of Business Administration, College of Education and Health Sciences and Center for Adult Education. It is a paid or unpaid, full or part-time experience for a period of 8-16 weeks in a professional or paraprofessional role associated with a student's major or career interest, requiring a minimum of 50 accumulated work hours per session. Specific academic requirements include but are not limited to developing at least three measurable learning objectives, self/ employer evaluation and reflective writing. The position description and potential learning objectives require prior approval by the Senior Director of the Center for Career Development or designee. May be repeated. EXED 071 was designed as an internship option for students whose schedule or circumstances do not allow them to complete an internship in their major. It is meant to be a flexible option and not a substitute for departmental internships.

A student must be in good academic standing with a minimum GPA of 2.25 , have earned at least 18 credit hours at the University of Evansville with at least nine hours of cumulative progress earned toward a degree in the College of Arts and Sciences, School of Business Administration or College of Education and Health Sciences during the previous two academic terms. Students in the Center for Adult Education must be enrolled in a Degree Program and have successfully completed one semester as a full-time student in their curriculum. Transfer students should consult with their academic advisor or department chair to ensure that course schedules will permit participation. Transfer students must satisfactorily complete one semester of full time course work at the University of Evansville and meet all other guidelines/requirements.

Prerequisite:Itishighlyrecommendedthat participants successfully complete EXED 090, Building Your Professional Image, prior to enrolling in this course.

Course: EXED 071, zero credit, Pass/Fail, May be repeated.

## Professional Preparation <br> EXED 090 Building Your Professional Image

The course is designed for students who will be completing an internship, co-op or other academically-related work experience. It focuses on self-knowledge and résumé development, professional communication and job search correspondence, mock interviews and interviewing processes, cultural communication competencies, etiquette, networking and job search techniques. The course content is delivered in an active learning environment.

EXED 090 is recommended for all students who have successfully completed one or more years of higher education and plan to have an experiential education experience within the next 12 months. This course was previously listed as COOP 090.

Course: EXED 090, may be taken for zero or one credit hour, pass/fail and does not count toward graduation.
Goals

- Students develop self-understanding and discipline specific professional business communication: résumés, cover letters, thank you cards, interviewing techniques, and oral presentations.
- Students improve their ability to connect and articulate their UE experiences with their career goals as they interface with the workforce.
- Students practice the many steps required to present themselves as educated, enthusiastic and competent professionals.
The purposes of this course are to prepare students in developing the skills and approaches to make informed and satisfying career decisions, conduct an effective and professional co-op/ intern employment search, and present themselves in a manner that emphasizes the professionalism, relevant skills and background of a chosen field.

Harlaxton College and Other Study Abroad Programs
The University of Evansville maintains a strong commitment to internationalization. This commitment is shown in the emphasis on studying abroad for all students, and the ability for UE students tochoose locations all over the world to earn credits towards degree completion and to learn to become global citizens.

The Office of Study Abroad also assists students with applications for various national scholarship programs in support of study abroad, including the Fulbright and Gilman Scholarships.

Students are welcome to study abroad through three different types of programs: Harlaxton College, Faculty Led Programs, International Exchanges, and Provider Programs. The Office of Study Abroad, located in SOBA, is available to help students explore these options and select the best fit for a student's field of study and personal goals. Each of these program types are clearly explained on our website and a study abroad advisor will help you through the process of applying and preparing for your time abroad. Although students must be at least sophomores to participate in study abroad, planning should begin as early as the freshman year. Close consultation with the Office of Study Abroad and the student's academic advisor is essential.

1. Faculty-Led Programs

The University of Evansville offers a variety offaculty-led programs abroad, usually over Spring Break or the summer term. Locations and course topics change annually, with some programs running biennially. Trips typically range from one week to five weeks.

Interested students should look for information on the Study Abroadwebsitethroughouttheyearorcometotheofficetolearn moreaboutprogramsbeingoffered.Recentfacultyledtripshave included:

- Designing a marketing plan and then visiting a non-profit organization in Havana, Cuba
- Visiting and shadowing teachers in rural schools in Trinidad
- Participating in a Habitat for Humanity Build in Nicaragua
- Studying Biology in Costa Rica
- Studying Political Science in South Korea

2. Harlaxton College

Harlaxton College, housed in a nineteenth-century manor house, is situated in the East Midlands, just outside Grantham, England, and one hour north of London. Academic programs are rigorous yet personal as the British and American educational systems combine to produce a unique scholastic environment in which experiential learning plays a large part. Classes are often complemented by field trips to enhance the classroom setting. All parts of the United Kingdom, as well as Paris, Rome, Florence, and Ireland, are common destinations for Harlaxton students.
Harlaxton College operates a semester-length program each fall and spring and a five-week summer session. Costs of the semester-length Harlaxton program are comparable to charges on the Evansville campus, and UE financial aid applies. Tuition for the summer program is identical to Evansville summer course tuition.
The centerpiece of the Harlaxton College curriculum is a six-hour course in British studies, offering an interdisciplinary introduction to British life and culture. Literature, art history, economics, history, and political science are part of the course, which combines lectures, seminars, and travel. In addition, a wide range of humanities and social science courses are offered each semester to enable students to maintain normal progress in their respective academic programs. Approximately 30 courses are offered each semester from which the student may select two or three in addition to the British studies courses, which are required of all students. Courses are taught both by British faculty and visiting faculty from the United States.
3. Exchange and Provider Study Abroad Programs

In addition to studying for a semester or summer at Harlaxton College,UniversityofEvansvillestudentscanchoosefromawide varietyofprogramsinotherlocationsaround theworld.Students approved on these programs can typically use their UE financial aid packages during the fall and spring, and the Office of Study Abroad will work to find a program that fits individual interests, goals, and academic requirements.

Major Discovery Program for Undeclared Students
StudentswhohavenotdeclaredamajoruponenteringtheUniversityofEvansvillehavethefreedomtoexplorevariousdisciplineswhile meetingtheirgeneraleducation requirements. TheMajorDiscovery Program is specifically designed to assist incoming freshmen and transferstudentsinthediscoveryofanacademicareaorareasofstudy inwhichtomajor. Theprogramencouragesexploration ofacademic majors, self-discovery, and participation in cocurricular activities offered by the University. Undeclared students are encouraged to take Discussion 100, Journeys and Discoveries, a one-credit course designedtohelpthemmakewiseandthoughtfulchoicesabouttheir future through participation in readings, discussions, lectures, and activitiesthatguidetheirexplorationoftheUniversity,majorfields of study, and career opportunities.

StudentsareadvisedbyfacultymemberswhohaveaspecialunderstandingofthevarietyofopportunitiesavailableattheUniversityand areawareofeventsthathelpstudentsconnecttocampusandtotheir future studies.

Major Discovery students have a broad range of interests and faculty encourage students to embark on academic explorations without pressureto declarea majorbeforetheyareready.Moreover, becauseundeclaredstudentsareoftenacademicallystrong,theyare notdiscouragedfromexploringdisciplinesbeyondtheintroductory level. Indeed, it may be useful to remember that at least 60 percent ofthestudentswhoentertheUniversitywithdeclaredmajorschange to another major at least once. Students who enroll in the Major DiscoveryProgramareencouragedtofindamajorbytheend oftheir freshman year to ensure on-time graduation, but are not pressured tomakeadecisionbeforetheyhaveexploredeverypossibleoutcome that interests them.

## ROTC - Army Reserves Officers' Training Corps

The Army Reserves Officers' Training Corps (ROTC) is available to UE students. Qualifying students are eligible for up to full tuition, merit-based scholarships, and other financial assistance through the US Army. ROTC provides hands-on leadership development in addition to regular college courses. Typically students take two Military Science Level (MSL) ROTC courses each year, one each semester. Course descriptions are listed in the back of the catalog under the undergraduate course descriptions section, under MSL. UE cadets meet with cadets from University of Southern Indiana to conduct weekly physical training. These sessions include cardiovascular fitness, muscular strength, and muscular endurance training. Physical training sessions and courses may be held at USI or at UE, dependent upon enrollment numbers.

To learn more about ROTC scholarships and admission to the program, go to Armyrotc.com. For specific information about UE's ROTC program, please see the UE Office of Veterans Affairs web page at evansville.edu/veteransaffairs/rotc.cfm, or contact:

ROTC Scholarship/Enrollment Counselor
University of Evansville ROTC
812-461-5304
Office of Veterans Affairs
800-423-8633, ext. 2509, or 812-488-2509
Email: tf91@evansville.edu

## Academic Policies and Procedures

Students are responsible for familiarizing themselves with the portions of this catalog pertaining to their course of study, University requirements, requirements for their major, academic policies, regulations, and procedures. Students should seek regular assistance from their academic advisors throughout their course of study; however, the student is ultimately liable for keeping up with program changes and for meeting all requirements.

The University reserves the right to change the fees, rules, and calendars regulating admission and registration, to change regulations concerning instruction in and graduation from the University and its various academic units, to withdraw courses, and to change any other regulation affecting the student body. Information in this catalog is not to be regarded as a binding contract between the student and the school.

The University also reserves the right to deny admission to any applicant, to dismiss a student when formal academic action is taken by the Admissions and Standards Committee, to discontinue the enrollment of any student when personal actions are detrimental to the University community, or to request withdrawal of a student whose continuance in the University would be detrimental to his or her health or to the health and safety of others.

## Academic Honor Code

In its mission, the University clearly states its intention to be val-ue-orientedinallendeavors. TheAcademicHonorCodewascreated bythe University community, students andfacultyalike, to create an atmosphere conducive to this high ideal and to academic integrity.

The primary purpose of the Academic Honor Code is to enable students and faculty to conduct their academic duties in an atmosphere of freedom. This is an ideal that requires the commitment of both students and faculty. Members of the faculty affirm a commitment to the Academic Honor Code by defining clearly what is or is not unauthorized aid. Student commitment to the Academic Honor Code is implied by his or her matriculation at the University of Evansville. The code, which follows, is appropriate for all academic work that is to be submitted for credit.

I understand that any work I submit for course credit will imply that I have adhered to this Academic Honor Code: I will neither give nor receive unauthorized aid, nor will I tolerate an environment that condones the use of unauthorized aid.

Commitment to the University of Evansville Honor Code is a condition of matriculation at the University. Under the honor system, faculty members often use honor-based testing devices, such as take-home exams and examinations without a proctor. Each instructor is obligated to define unauthorized aid clearly as it relates to assignments within his or her specific course(s). Instructors should discuss the importance of academic integrity, review related items in the syllabus, and clarify the definitions of cheating and plagiarism. When in doubt, the student is obligated to obtain an understanding of the instructor's use of the term. Ignorance is not accepted as a valid excuse for a violation of the Academic Honor Code.

The non-toleration clause ("nor will I tolerate an environment that condones the use of unauthorized aid") is integral to the Academic Honor Code as the honor system relies on the active participation of all students. Each student, therefore, is responsible for his or her own personal honor and the academic integrity of the University community. The academic honor system func-
tions only when students value their personal honor and that of the community enough to guard it. This is not to say that students must constantly watch for violations; however, it is the student's responsibility to uphold the integrity of the Academic Honor Code. Any observations or knowledge of misconduct should be reported immediately.

The honor system and the implementation of its procedures fall under the administrative jurisdiction of the faculty and the president. The Office of the Dean of Students keeps records of violations and hearings and may be consulted by the Honor Council chair regarding procedures and past violations.

For more information about the Academic Honor Code and procedures, please reference the Student Handbook.

## Academic Advising

The University of Evansville emphasizes the development of individual initiative, responsibility, and self-discipline by students in the planning of their own educational programs. The academic advising system is designed to assist students in the development of educational plans and career goals and to teach them the skills necessary to pursue those goals. In both academic and career areas, planning is a development process to be fostered during the entire period of a student's involvement with the University.

Faculty advisors, with the support of the Academic Services work closely with students to help them develop intelligent, responsible self-management.

## Transfer Student Advising

Transfer students are assigned to faculty advisors according to their academic interests or intended majors. Advisors, aided by the Office of the Registrar, help transfer students assess standing toward the degree in their chosen field of study and work with them in long-range academic and career planning. A transcript evaluation is completed by the Office of the Registrar after official transcripts are submitted from previous colleges the transfer student attended. It is advisable that all transfer students go over the necessary graduation requirements with their new academic advisor upon matriculating to the University of Evansville.

## Academic Load Fall/Spring Semesters

Full-Time: A student enrolled in 12 or more hours per semester Part-Time: A student enrolled for fewer than 12 hours per semester

The normal load for a full-time undergraduate student is 12 to 16 hours of class and laboratory work per semester. If a student, in consultation with his or her academic advisor, elects to carry more than 16 hours, the grade point average should be a guide in determining the maximum number of hours to be attempted (exclusive of music ensembles and exercise and sport science activity courses). The recommended load limits are:

Up to 1.99 GPA - 16 hour maximum
2.0 to 2.99 GPA - 18 hours maximum
3.0 to 4.0 GPA - 20 hours maximum

Overload: Because academic performance frequently suffers when an overload is taken, a student in good standing wishing to take 21 hours or more and a student on academic probation wishing to exceed 16 hours must petition the dean of his or her major's college for approval and have the support of the academic advisor in doing so.

Most academic failure results from insufficient study outside the classroom. If a student has a job or other non-academic activity requiring 20 or more hours each week, he or she is advised to carry a reducedacademicload.Studentsshouldallowsufficienttimeoutside the classroom for study (use the guideline of two hours of study for each hour spent in class) as an investment in academic success and their professional future.

## Class Attendance

The University is committed to the promotion of a sense of academic community in which the student and instructor join in a shared learning experience. The student and instructor alike assume responsibility for the general well-being of the academic process, each having something to contribute to as well as to gain from a given course.

The University expects regular class attendance by all students and places the responsibility on the student. Students are considered sufficiently mature to appreciate the necessity of regular and punctual attendance, to accept this personal responsibility, and to accept the consequences of failure to attend. An instructor or academic unit may require attendance in courses or types of courses. Instructors are expected to maintain absence policies in keeping with the nature of their courses and may consider attendance in evaluating performance in their courses.

When an absence occurs due to an emergency or medical condition, students are expected to notify their instructors of the absence prior to class or to seek the assistance of the Office of the Dean of Students in notifying instructors. The dean of students has the authority to review and grant requests, if appropriate, for excused absences for documented medical, psychological, or personal reasons, including observation of religious holidays.

## Classification of Students

Students are classified on the following basis:
Senior: 90+ credit hours earned
Junior: 60-89.9 credit hours earned
Sophomore: 30-59.9 credit hours earned
Freshman: 0-30 credit hours earned

## Registration Procedures

## Eligibility for Course Registration

A student must confer with his or her advisor and secure the advisor's approval for all course registrations or changes of registration. Registration for continuing students will take place during the preceding regular semester according to the schedule published by the Office of the Registrar. Registration for new students will be held during special orientation and registration periods or on the opening days of a term as designated by the University calendar.

Ingeneral, coursesarenumberedtosuggesttheappropriatelevel of eligible enrollment by students:

0-99 Non-credit
100-199 Freshman Level
200-299 Sophomore Level
300-399 Junior Level
400-499 Senior Level
500-799 Graduate Level
Exceptions to the undergraduate enrollment eligibility guide may be made by the advisor if there are no other prerequisites to
enrollment.

## Cancellation of Registration

Cancellation of enrollment is permitted prior to the first day of class. The Office of the Dean of Students must be notified. Students who cancel their enrollment by this deadline will be given a full refund for tuition and room and board.

## Change of Registration

The student is held responsible for each course in which he or she officially registers. Once enrolled, students may change their course schedule by dropping or adding one or more, but not all, courses. After the first week of classes, an official drop/add form must be filed in the Office of the Registrar with the signature of the academic advisor and the instructor.
Dropping a Course
A course may be dropped without a designated grade through the last day to register or add a course (see the academic calendar for exact dates). From that date through the 11th week, a grade of W is assigned. After the 11th week, a grade of F is assigned. Discontinuance of attendance does not automatically constitute a withdrawal. Students failing to file a proper drop/add form by the appropriate deadline must complete classes for which they are registered or receive a grade of F .

## Independent Study

The purpose of independent study is to provide students an opportunity to pursue in detail special topics or projects within the discipline when such topics are not sufficiently covered in existing courses. Normally, such enrollment is restricted to the regular academic year. The student shall be registered for independent study credit in the semester during which the majority of the work is done. Independent study is not to be used as a substitute for regularly scheduled academic offerings except in rare special circumstances, which will be defined by each academic unit. In such cases, the student and sponsoring instructor must submit the approved proposal for independent study form explaining why the course must be taken as an independent study. Tuition for independent study is charged at undergraduate tuition rates.

## Auditing Courses

When space is available after the registration of regularly enrolled students, others may request permission of the instructor and the Office of the Registrar to enter a lecture course as auditors. An auditor is subject to attendance regulations and other conditions imposed by the instructor. The audit status for a course must be declared by the last day established for course additions. Laboratory sections of lecture courses, clinical experience in nursing and health sciences, internships and field experience throughout the University, and cohort degree programs are excluded from this policy.

Audit courses are not included in determining full-time enrollment status are not graded, and do not apply towards graduation requirements. An audit course may not be changed to a credit course under any circumstances, which precludes a student attempting to earn credit by departmental or CLEP examination at a later date for a class previously audited. Credit courses may not be changed to audit courses. The tuition charged for audit classes is the same as for credit.

## Undergraduates Taking Graduate-level Courses

Undergraduate students with 90 credits or more may register for graduate credit course work with the consent of the student's advisor and the department offering the course. Students may not enroll in more than 6 graduate credits per semester. For students taking graduate coursework, the total course load each semester, graduate and undergraduate, must not exceed 18 credit hours. No more than 12 graduate credits total can be permitted to count toward the undergraduate degree. Graduate course work may apply toward the undergraduate degree with the approval of the department chair of the student's major.

## Summer School Registration

Students are limited to a maximum enrollment of three courses (maximum 10 credit hours) during a single summer regardless of the number of sessions or universities attended. Students who wish to take more than 10 credits must have a 2.0 minimum cumulative GPA, submit a petition to the dean of his or her major's college for approval, and have the support of the academic advisor in doing so. Students planning to take courses at another institution must have written approval on a transfer credit request form signed in advance by the student's academic advisor and the registrar.

## Withdrawal from the University

A student who finds it necessary to withdraw from all credit courses must apply for formal withdrawal through the Office of the Dean of Students. This process requires the completion of a University withdrawal form, an exit interview and, for students under the age of 18, parental permission. Final approval is subject to clearance from the Office of Student Financial Services. If this procedure is not followed, grades of F will be assigned.

After the official last date to withdraw (see the academic calendar), approval for withdrawal from the University without grade penalty will be considered for only one of three reasons: medical or psychological complications, documented by a letter from a doctor or psychologist, or an approved Title IX recommendation from the Title IX Coordinator. Once documentation has been received, the information will be reviewed and decisions issued on a case by case basis.

Failure to complete the term does not cancel the student's obligation to pay tuition and all other charges in full. For specific details regarding refunds and adjustments, refer to the section on tuition and fees in this catalog.

## Credit from Other Institutions, Advanced Placement, CLEP, International Baccalaureate, and by Examination

## Transfer Credit

The University of Evansville evaluates and may accept credit earned at other regionally accredited educational institutions. The majority of credit hours required for a University of Evansville degree must be earned from a bachelor's degree program. No more than 60 semester hours of credit from a junior college or community college may be transferred to the University, except in cases where an articulation agreement has been established.

At least 48 hours, including the last 15 hours and the majority of hours in the major, must be completed in residence to earn a baccalaureate degree from the University of Evansville, subject to the
requirements of specific majors.
Once matriculated, a University of Evansville student may take no more than three courses (maximum 10 credit hours) from another institution for transfer credit to be applied to his or her degree. Prior written approval from the student's academic advisor and the registrar via the transfer credit request form is required for each course the student takes for transfer credit. Failure to obtain prior approval may result in credits not transferring. The three course limit for transfer credit may not apply to students participating in an approved study abroad program not available through the University of Evansville.

Transfer credit is awarded only upon receipt of an official transcript sent directly to the UE registrar's office from the transfer institution. Each course is evaluated separately (except in cases of articulation agreements) to determine if it can apply toward a UE degree. The University reserves the right to accept or reject courses for transfer credit. Courses with a grade of D or lower and institutional exams will not be accepted for transfer credit. Grades are not transferred,onlycreditsaretransferred.Creditsfromotheraccredited educational institutions will not be posted to a student's transcript unless the credit applies to a student's degree program.

The University of Evansville has articulation agreements with Ivy Tech Community College of Indiana, Vincennes University, Kentucky Community and Technical College System, Henderson Community College, and Owensboro Community and Technical College.

Military Credit Policy
All courses offered by the Army, Navy, Marine Corps, Coast Guard, Army Reserve, National Guard, and Air Force will be assessed for transfer credit. Notarized transcripts are required before credit can be posted.
Credit from Advanced Placement, CLEP, International Baccalaureate, and by Examination

The University of Evansville allows students to earn an unlimited number of hours of credit prior to entrance through the College Board Advanced Placement (AP) testing program, providing a grade of four or better in each examination has been achieved, and through the International Baccalaureate (IB) program, providing a grade of five or better in higher level subjects has been achieved. Exceptions may apply. Contact the Office of the Registrar for details.

Students may also obtain course credit by submitting the results of the College Entrance Examination Board's College Level Examination Program (CLEP) or by taking University of Evansville proficiency examinations administered by an academic department. The number of hours of credit that can be counted toward the total hours required for graduation through CLEP or departmental credit by examination, however, is limited to two courses.

Departmental examinations in specific courses are available to qualified students upon approval of the academic advisor and the chair and/or dean of the academic department in which the examination is to be taken. Credit by examination forms are available from the Office of the Registrar. A nonrefundable departmental examination fee will be charged (see tuition and fees section) by the Office of Student Financial Services. Credit for the course will be granted provided the student passes the examination with a grade of $C$ or better. No exam may be repeated if a grade lower than the equivalent of a $C$ is earned. $A$ grade of $P$ is recorded on the transcript for credit earned by examination.

Students are not permitted to schedule departmental examinations in courses that have been audited, in courses in which
unsatisfactory grades have been earned, or in courses that have been dropped with a grade of W. No credit toward graduation is awarded retrospectively to lower level course work based solely upon satisfactory completion of more advanced course work in the same subject area except for academic sequence courses in foreign languages.

## Credit Hour Policy

The University of Evansville assigns credit on the basis of the semester hour. UE has established a credit hour policy consistent with the Federal definition of a credit hour. A semester credit hour consists of one clock hour of classroom or direct faculty instruction and a minimum of two hours of out-of-class student work each week for approximately 15 weeks for one semester, or an equivalent amount of work through laboratory, practicum, internship, studio, or other academic activity. This equates to 45-75 hours of academic experiences for each semester credit hour. Alternatively, courses may meet the credit hour policy using a learning out come standard. This requires that the student demonstrates, to the satisfaction of the department awarding the credit, evidence of actual achievement of course objectives that are at least equal to the intended learning outcomes for a course
that meets the clock hour requirement described above.

## Grades

Grading System
At the conclusion of each semester students receive letter grades indicating the adjudged quality of their work in each course. Grade points are assigned for each semester hour of credit as follows:

A Excellent 4.0
A- 3.7
B+ 3.3
B Good 3.0
B- 2.7
C+ 2.3
C Average 2.0
C- 1.7
D+ 1.3
D Poor 1.0
F Failure 0.0
FW Failure to complete 0.0
I Incomplete
NG No grade
P Pass
W Withdrew from course
All A, B, C, and D grades are passing grades. Grades of I, NG, P, orW are not included in computing grade point averages. The grade point average is the quotient resulting from dividing the total points earned by the number of hours attempted (including failure and excluding pass and incomplete).

## Midterm and End of Semester Grades

The University does not mail grades at the end of each semester. Students can access their grades on the University's student information website. Midterm grades are not permanently recorded but are used by students and their advisors for information and guidance. End of semester grades become a part of the student's permanent record.

Pass/Fail Option

A student may register for an elective course on a pass/fail basis. The option is intended to encourage the student to explore new academic areas without endangering the student's grade point average unless the grade earned is an F. Limitations on pass/ fail registration are:

- Junior or senior status
- Only one course per semester may be taken pass/fail
- o course required for the major or minor and no course being used to meet a general education requirement may be taken pass/fail
- Pass/fail courses must be listed at the time of registration and must not extend beyond the approved academic load
- A course may not be changed from pass/fail, or vice versa, after the last day established for course additions

Courses offered only on a pass/fail basis are not subject to these regulations, except they must not extend beyond the approved academic load.

## Incomplete Grades

All course work is to be completed within the semester it is attempted.Ifanemergencypreventsastudentfromcompletingsome portion of the required assignments, an instructor may give an I or incomplete grade only if the following circumstances are met:

1. The student's other work in the course would earn a passing grade.
2. The outstanding task can be completed without further class attendance.
Outstanding course work normally should be completed within six weeks of the class ending, but the instructor may allow up to one year from the end of the term for which the I grade is granted. It is the student's responsibility to have this deficiency removed within the agreed-upon period or within one year, whichever is less. (Registering for a course a second time does not remove an incomplete grade.) If the instructor has not submitted a grade change after the grace period, the registrar is authorized to change all grades of I to $F$.

## Repeating Courses

Any student who wishes to better the grade in a course taken at the University of Evansville may elect to repeat that course for grade improvement but must do so at UE. The cumulative grade point average (but not the semester grade point average) will reflect only the higher grade earned for a specific course. Both grades will remain on the transcript. Credit is awarded only once for the course unless otherwise indicated. Some courses may not be repeated; these are determined by the faculty of the appropriate academic unit of the University.

## Dean's List

To merit the honor of being placed on the Dean's List for a given semester, a student must have carried a full academic load of 12 hours or more, excluding pass/fail courses, and have earned a grade point average of 3.5 or above.

## Grade Appeals

Any student who questions a course grade should speak to the instructor. If the instructor is unwilling to change the grade and the studentis notsatisfied withthereasons given, thestudent may commence a formal appeal.

Any student wishing to contest a course grade formally must do so in writing within 60 calendar days after the last day of the semester. Correspondence should be addressed to the instructor
with a copy to the immediate supervisor. A change of grade will occur if both the instructor and his or her immediate supervisor approve and both sign a change of grade form, which is forwarded to the Office of the Registrar.

If either the instructor or the immediate supervisor disapproves of the change of grade, the student has the right to appeal to the Admissions and Standards Committee within two weeks of receiving written disapproval. If the student receives no response from either party within 30 calendar days of filing the appeal, the student may appeal directly to the Admissions and Standards Committee. Any appeal to the Admissions and Standards Committee must be filed during the semester (exclusive of summer terms) immediately following that in which the disputed grade was received.

When appealing to the Admissions and Standards Committee, the student must send a copy of the appeal to the instructor and immediate supervisor. The student, the instructor, and the immediate supervisor will be requested to appear before the committee. In exceptional circumstances, the committee may allow other parties to attend the hearing to provide additional information. The committee chair will notify all parties of the decision.

It is the student's responsibility to retain all dated correspondence until the final decision is reached.

## Academic Standards

Graduation requires a minimum grade point average of 2.0 in both the major and the total program of study. Additional GPA requirements may be imposed by particular programs. The University reserves the right to dismiss at any time a student whose academic standing or progress is regarded as unsatisfactory.

## Academic Good Standing

Goodstandingreferstothenormalacademicprogressofstudents who are not on probation or on academic dismissal.

Cumulative grade point averages required for good standing: After the first semester - not less than 1.6
After completing 30 hours - not less than 1.9
After completing 60 hours or more - not less than 2.0

## Progress Toward Degree

All students enrolled for credit are expected to make regular and satisfactory progress toward completion of a degree in a reasonable time. This is especially true for those students using financial aid grants or loans to meet the cost of education.
Expectations

1. All students must maintain scholastic averages that place them at or above good academic standing (see above).
2. Full-time students (i.e., any student enrolled in 12 or more hours in one semester) are expected $\mathrm{t} o$ accumulate an average of 12 hours of credit for each semester (fall/spring) enrolled.
3. Part-timestudents (i.e., any studentenrolled for fewerthan 12 hourspersemester) areexpectedtoaccumulateaminimum of 24 hours of credit for each 30 semester hours enrolled.
Summer terms are not computed as regular semesters of enrollment; however, credit hours earned during the summer may be applied to degree requirements.

Satisfactory academic progress requirements for financial aid differ from those outlined above. The Office of Student Financial

Services should be contacted for those guidelines (see page 5).
Academic good standing (minimum and cumulative grade point averages) will be reviewed at the end of each semester (fall/ spring).

## Academic Probation

Students will be placed on academic probation when they fail to maintaingoodacademicstanding, which requirescumulativegrade point averages as follows:

Hours of Credit GPA
Fewer than $30 \quad 1.6$
30-59.9 1.9
60 or more 2.0

## Academic Dismissal

Students who fail to remove probationary status for two consecutive semesters (exclusive of summerterms) may be dismissed from the University.

The University reserves the right to dismiss a student not making satisfactory progress toward a degree at the end of any semester in which minimum academic standards are not met.

As long as a student has not been dismissed from the University, classes may be taken during summer sessions to improve the cumulative grade point average and/or to accumulate earned hours toward satisfactory progress. Transfer credit will only apply to accumulated earned hours and not the cumulative grade point average.

Students who have been academically dismissed from the University may not apply for readmission until at least one full semester (excluding summer terms) has passed. Readmissions are considered on a case-by-case basis, and documentation must be provided indicating conditions favorable toward readmission and future academic success. Recommendations from advisors should be included with the petition. If a student takes courses at another university after being dismissed from UE, an official transcript with all grades must be included in the petition for readmission. The petition for readmission must be filed with the Admissions and Standards Committee through the Center of Academic Advising. All completed documentation must be submitted by December 1 for spring semester readmission and by August 1 for fall semester readmission.

Students dismissed a second time by the University may not apply to be readmitted.

## Access to Education Records

The University of Evansville complies with the Family Education Rights and Privacy Act of 1974 (FERPA), as amended (Public Law 93-380), which is designed to protect the privacy of students by giving them rights concerning their education records. Education recordsinclude records directly related to a studentandmaintained by the University. Among other provisions, the act gives students (1) the right to inspect their records, (2) the right to challenge incorrect information in those records, and (3) the right to keep their records private. Students attending the University will be notified of their FERPA rights annually in the Student Handbook. Each University officemaintainingeducationalrecordsmustimplementthispolicyby appropriate means.

FERPA further provides that certain information about the student, designated as directory information, may be released by the University unless the student has informed the University in writing
that such information may not be released. The following is considered directory information: name, home address, local address, telephone listings, major field of study, full-time or part-time status, participationinofficiallyrecognizedactivities(inathletics, theweight andheightofmembers ofathleticteams), datesofattendance, degrees earned, awards received, photographs, and most recent previous school attended.

A student who desires that the above-listed directory information not be released must inform the Office of the Registrar in writing within one week of the beginning of each semester each academic year. Students may rescind their request in writing at the Office of the Registrar. While the University will honor a student's request to withhold directory information, it cannot assume responsibility to contact the student for subsequent permission to release such information. Regardless of the effect upon the student, the University assumes no liability as a consequence of honoring instructions that directory information be withheld.

Also, it is the student's responsibility to seek correction for any apparent errors in end of semester grades. Failure on the student's part to seek correction within a reasonable period indicates that records are accurate as stated.

Effective as of 2012, certain agencies of the federal government may access and release students' records without their consent to any third party designated by a federal or state authority to evaluate a federal or state supported education program or to researchers performing certain types of studies.

## Transcript of Academic Record

Students may obtain a certified statement of their academic record from the Office of the Registrar upon written request with signature. There will be a fee charged for each request. Transcript requests will be processed within five working days. Transcripts will not be released if the student has an unpaid financial obligation to the University or if there is an unresolved disciplinary action against the student.

## Graduation

Upon the recommendation of the faculty and the approval of the Board of Trustees, the University of Evansville confers its academic degrees. Only those candidates who have fulfilled all scholastic requirements for a degree and who have met their financial obligations to the University will be recommended for the degree. Degrees are conferred five times a year at the end of the following terms: fall semester, winter intersession, spring semester, first summer term, and second summer term.

## Application for a Degree

A candidate for a degree must file an application for the degree in the Office of the Registrar one year prior to the intended date of graduation. While the registrar will conduct a degree audit on behalf of the University, it is the student's responsibility to ensure that all graduation requirements are met.
Graduation under a Particular Catalog
University policy allows a student seven years to graduate under the catalog in effect at the time of initial enrollment at the University of Evansville unless the student is readmitted after a one-calendar-year or more break in attendance. Students who are readmitted to the University after a one-year or more absence will follow the catalog in effect at the time of their re-entry.

Students who are pursuing two (or more) degrees simultaneously or who wish to earn an additional degree (see "Require-
ments for an Additional Degree") after completing the first may follow the same catalog as for the first degree if (a) no more than seven years have elapsed since their initial enrollment at the University and (b) there has not been an absence from the University of more than one academic year.

This policy does not apply to students initially admitted to part-time academic programs. Students admitted to part-time academic programs should consult with the Office of the Registrar for applicable policies.

Candidate Clearance
The University will be responsible for including on the list of graduates only those students who have submitted the application for degree and have met all academic requirements and all financial obligations. Deficiencies in academic requirements, such as incomplete grades and course substitutions, must be cleared no later than two weeks prior to the expected date of graduation.

## Graduation with Honors

Bachelor degree candidates who have maintained their scholastic standing at a high level will graduate with honors. Students acquiring a grade point average of 3.85 will receive their degrees summa cum laude; students acquiring a grade point average of 3.70 will receive their degrees magna cum laude; and students acquiring a grade point average of 3.50 will receive their degrees cum laude. Only grades earned at UE are included in the calculation. Students must earn at least the minimum number of hours to comply with the University's residency requirement in order to be eligible for honors.

## Commencement

Commencement exercises are held annually in May. Students completing degree requirements in the spring semester and following summer sessions may participate in the May ceremony.

## William L. Ridgway College of Arts and Sciences

Ray Lutgring, Dean
The William L. Ridgway College of Arts and Sciences provides quality liberal education in the arts, humanities, and natural and social sciences, as well as professional training in the fine and performing arts. While baccalaureate degree work includes studies in fundamental disciplines and applied specializations, these are complementary to the overall goals of individual intellectual growth and cultural development through broad study of the nature of humans and the universe.

The college offers baccalaureate degrees in archaeology, art (art education, pre-art therapy, studio art, visual communication design), biology, biochemistry, chemistry, cognitive science, communication (sport communication), creative writing, criminal justice, ethics and social change, environmental science, environmental administration, foreign languages and cultures (Spanish and Medical Spanish), history, interdisciplinary studies, international studies, literature, mathematics(statistics and data science, actuarial science), music (music education, music management, music performance, music therapy), neuroscience, physics, political science, psychology, sociology (gerontology, pre-social work), theatre (theatre design and technology, theatre management, theatre performance), and writing.

Many preprofessional programs, minors, and concentrations are offered in most of the baccalaureate fields. The college also offers minors in gender and women's studies, ethics, race and ethnic studies, French and German. In conjunction with the College of Education and Health Sciences, the college offers bachelor degrees in senior high, junior high, and middle school education with teaching majors in English, language arts, mathematics, music, science, social studies, and visual arts.

Degrees granted in the College of Arts and Sciences are awarded upon successful completion of all University requirements and those of specific departments and degree programs. Major requirements are outlined within each section describing the academic discipline. Students are required to consult with their faculty advisors before completing class schedules.

## iBACE: Integrating Business and Career Education

The iBACE program is designed to provide students in the William L. Ridgway College of Arts and Sciences and the College of Education and Health Sciences with educational and hands-on business experiences that will improve their marketability and career success. The program exposes students to business skills that they can apply in the workplace and builds upon foundational knowledge in their educational disciplines by adding those marketing, management, and finance skills essential for careers in a variety of fields. This program is designed to prepare students for current and future business trends in the professional workplace.
Course Work
The iBACE program contains three areas: coursework, a practical work experience, and a seminar for students seeking an internship. The program requires nine credit hours of coursework providing three building blocks of business training: Accounting 210, Marketing 325, and Management 377. Students must be at least sophomores to take the accounting course and juniors to enroll in the marketing and management courses. iBACE students are also strongly encouraged to add at least one course from those offered in Health Services Administration.

## Professional Preparation

Students must enroll in EXED 090, Building a Professional Image, prior to completion of their internship. This is a 7 week 0 or 1 credit hour course offered through Career Services for students seeking an internship or co-op program. This seminar course covers job interviewing skills, résumé preparation, currently available internships and details of program administration.
Internship
In addition to any internship, practicum, or clinical experiences in your program of study, iBACE students will complete an additional internship that focuses on business aspects of their field. To earn three credit hours, students must complete 150 hours of work experience. The business courses should be completed prior to the internship so that business principles can be applied to the professional experience. An internship in the student's major discipline is preferred.

## Application

Interested students should complete an application form to enroll in the program. The enrollment form can be found online at ibace.evansville.edu. A certificate will be awarded at the completion of the program.

## Bachelor of Arts with a Major in Archaeology Bachelor of Science with a Major in Anthropology

## Bachelor of Arts with a Major in Art History

## Archaeology

The major in archaeology concentrates on providing students with an introduction to the discipline of archaeology and to the civilizations of the ancient Mediterranean area, the Near East, and Western Europe. It is intended to engage students in a broad-based, interdisciplinary approach that will notonly provide a firm foundation forthose wishing to pursue the discipline further at the graduate level but also serve as a liberal arts core for undergraduates planning careers in professional areas such as law or library science.

Majors are encouraged to spend at least one semester abroad, either at Harlaxton College or at a program directly related to Mediterranean archaeology (e.g., College Year in Athens or the Intercollegiate Center for Classical S tudies in Rome). Harlaxton College is located in an area rich with remains of the Roman civilization in Britain. It is possible to spend a semester in England or even to pursue study-abroad for an entire year and still complete all degree requirements within four years. Students are encouraged to participate in an archaeological field school. In addition to its own field methods class, the department sponsors an excavation at the site of Jezreel in Israel; students may participate in other excavation practica as well. The department contributes to an interdisciplinary major in classical studies, which is described in its own section of this catalog.
Archaeology Minor (18 hours)
Archaeology 105, 106; any two 300-level archaeology courses; one 400-level archaeology course; History 311 or 312 or Interdisciplinary 325

## Art History

The art history major offers a baccalaureate degree as preparation for graduate study in art history or for careers related to the visual arts, as well as providing an excellent liberal arts education. The program is international in scope, offering study at the Evansville campus and Harlaxton College. Study abroad may also be pursued through institutional-ly-approved programs in consultation with the Office of Study Abroad. Internships in major art institutions are recommended. The program offers an emphasis in ancient art and archaeology, Renaissance, Baroque, eighteenth, nineteenth, and twentieth century art, with hands-on experience in museum collections. Students are encouraged to begin their course of study with surveys of art (Art History 208 and 209) to establish a basis for more advanced courses. Independent study and seminar classes are also available to permit individual research projects supervised by a member of the faculty.

## Art History Minor (18 hours)

A minor in art history is recommended for students majoring in anthropology, archaeology, communication, English, history, international business, international studies, languages, nursing, philosophy, political science, religion, or in any area of study where a broad knowledge of Western culture is essential.
Art History 208, 209, 389; one from Archaeology 206, 207, 305, 306, 307, 308, 309, or 311; one from Art History H383, 384, or 385; one from Art History H378, H379, 386, or H387
New Testament Greek Minor (19 hours)
The department offers a minor in the language of the New Testament to develop skills in using ancient Greek to study and interpret biblical texts.

Greek 211, 212; one from Greek 351, 371, 411, or 421; Religion 320, 330; Religion 435, normally taken in conjunction with the upper level biblical studies course above

## Religion Minor (18 hours)

The religion minor consists of any eighteen hours in religion. Students may take ETH 200 (Social Justice Movements), ANTH 453 (Anthropology of Religion), and/or GRK 371 (New Testament Greek Exegesis) toward their religion minor requirements

New Testament Greek Minor (19 hours)
The department offers a minor in the language of the New Testament to develop skills in using ancient Greek to study and interpret biblical texts.
Greek 211, 212; two from Greek 351, 371, 411, or 421; Religion 320, 330; Religion 435, normally taken in conjunction with the upper level biblical studies course above.

## Bachelor of Arts

## ARCHAEOLOGY

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (47

 hours)Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (38 hours)
ARCH 105: Intro to Greek Archaeology (3 hrs)
ARCH 106: Intro to Roman Archaeology (3 hrs)
ARCH 192: Intro Archaeology Seminar (3 hrs)
ARCH 285: Technical Skills for Archaeologists II (3 hrs)
ENGR: 283: Technical Skills for Archaeologists (2 hrs)
Complete one course from:
ARCH 206: Intro to Near Eastern Archaeology (3 hrs)
ARCH 207: Intro to Egyptian Archaeology (3 hrs)
Complete one course from:
HIST 311: The Greeks and the East (3 hrs)
HIST 312: The Evolution of Rome (3 hrs)
ID 325: Alexander the Great (3 hrs)
Complete one course from:
ANTH 200: World Prehistory (3 hrs)
ARTH 208: Survey of Art I (3 hrs)
HIST 311: The Greeks and the East (3 hrs)
HIST 312: The Evolution of Rome (3 hrs)
HIST 313: Medieval Europe 410-1350 (3 hrs)
ID 250: Myths of the Greeks (3 hrs)
ID 325: Alexander the Great (3 hrs)
PHIL 211: Ancient Greek Philosophy (3 hrs)
Complete 9 hours from 300 level ARCH:
No more than 2 field practice (ARCH $340,394,395$ ) may count
toward this requirement.
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-
Complete 6 hours from 400 level Archaeology courses:
ARCH 400 may be counted toward this requirement, but majors may take any senior seminar; no more than one directed study (ARCH 493) may be applied to the 400 level requirement.
-

Free Electives 35 hours

39 Hours of 300/400 level courses

## Bachelor of Science

## Anthropology

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 112 level.
-
-

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- ARCH 400 - Senior Seminar (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (39 hours)
ANTH 207 - Cultural Anthropology (3 hrs)
ANTH 301 Special Topics: Intro to Physical (3 hrs)
ARCH 192 Intro to Arch Seminar (3 hrs)

Complete 9 hours from:
ANTH 310 Cultures of Native North America
ANTH 315 Indians of the Great Plains
ANTH 319 Peoples of Africa
ARCH 105 Introduction to Greek Archaeology
ARCH 106 Introduction to Roman Archaeology
ARCH 206 Introduction to Near Eastern Archaeology
ARCH 207 Introduction to Egyptian Archaeology
ARCH 309 The Etruscans
ARCH 311 Archaeology of Syro-Palestine
Complete 9 hours from:
ANTH 200 World Prehistory;
ANTH 301 Special Topics;
ANTH 416 Human Evolution;
ANTH 440 Linguistic Anthropology;
ANTH 453 Anthropology of Religion;
ANTH 494 Directed Study;
ARCH 320 Topics in Archaeology;
BIOL 310 History of Life;
BIOL 320 Evolution and Ecology (4 hrs.);
BIOL 331 Genetics (4 hrs.);
BIOL 450 Evolution;
SOC 230 Social Problems in the Modern World;
SOC 337 Social Aspects of Health and Health Care;
SOC 386 Death and Dying;
SOC 415 Globalization and the Environment;
SOC 438 Race and Ethnic Relations
Complete 9 From:
ANTH 496 Internship;
ANTH 497 Internship in Teaching Anthropology;
BIOL / EXSS 112 Human Anatomy and Physiology I (4 hrs.);
BIOL / EXSS 113 Human Anatomy and Physiology II (4 hrs.);
BIOL 415 Biostatistics Computational Biology (4 hrs.);
BIOL 425 Developmental Biology;
BIOL 455 Genomics;
COMM 210 Professional Speaking;
COMM 380 Intercultural Communication;
CJ 205 Introduction to Criminal Justice;
CJ 354 Introduction to Forensic Sciences;
PH 360 Community Health and Social Justice;
PSYC 245 Statistics for Psychologists (4 hrs.);
PSYC 246 Research Methods in Psychology (4 hrs.);
QM 227 Introduction to Statistics;
SOC 343 Social Research Methods (4 hrs.);
SOC 344 Introduction to Behavioral Statistics (4 hrs.);
TESL 300 Introduction to Linguistics

Free Electives 37 hours

39 Hours of 300/400 level courses

## Classical Studies

> Bachelor of Arts with a Major in Classical Studies

## Bachelor of Arts with a Major in Classical Studies and a Concentration in Language and Literature

The major in classical studies is an interdisciplinary liberal arts major intended for students whowishtostudy GreekandRomanantiquity withanemphasisonclassicallanguage,literature, and history. The major requires that students have a minimum of three years of either Greek or Latin, or two years of both Greek and Latin. Other classes will be selected from archaeology, history, philosophy,andworldliterature.Thesecourseswill provideabroadperspectiveonGreek and Roman civilization, while the facility that students develop with the classical languages enables them to use primary source material in their studies.

Studentsdeveloppowers ofcriticalanalysis,anappreciationofliterature,andanunderstanding of the documents and traditions which constitute the foundations of Western civilization. Themajor provides a superior liberal arts education offering excellent college preparationfora number of professional fields such as law or library science. The major also prepares students for graduate studies in classics or to obtain a master's degree in teaching Latin for preparatory and high schools. The minor will be of particular interest to students majoring in archaeology, literature, history, Biblical studies, or a foreign language.

Majorsareencouragedtospendatleastonesemesterabroad,eitheratHarlaxtonCollegeorat anotherapprovedstudyabroadprogramsuchasCollegeYearinAthensortheIntercollegiateCenter for Classical Studies in Rome. Harlaxton College is located in an area rich with remains of the Roman civilization in Britain. It is possible to spend a semester in England or even to attend studyabroad programs for an entire year and still complete all degree requirements within four years.

## Classical Studies Minor (18 hours)

The courses in Greek or Latin which satisfy the minor requirement also satisfy the University's foreign language requirement.

Atleastthree coursesinGreekorLatinnumbered 200 orabove;atleasttwo coursesfrom Archaeology $105,106,305,306,307,308,309,320,395,492$; at least one course from History 311, 312, Interdisciplinary 250, 325, Philosophy 211, Religion 210, 330

## Classical Languages Minor (18 hours)

In the classical languages minor, students gain facility in both classical languages, Greek and Latin.Studentschooseanarea of primary competencein oneclassicallanguage(GreekorLatin) and an area of secondary competence in the other classical language (or the other classical languageandHebrew).Classicallanguageminorsdevelopamasteryoftheclassicallanguages, powersofcriticalanalysis,anappreciation ofliterature,andanunderstanding ofthedocuments and traditions which constitute the foundation of Western civilization.

Primary competence: four courses in Greek or Latin numbered 200 or above
Secondarycompetence:twocoursesnumbered 200 oraboveintheotherclassicallanguageorthe course numbered 211 in the other classical language and Hebrew 112

## Bachelor of Arts

## CLASSICAL STUDIES

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- ARCH 400, HIST 490, PHIL 499, or REL 499

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (27 hours)
Complete 4* courses in Greek or Latin at the 200/300/400 level.
*2 of these courses may be used to fulfill Outcome 6 of the general education

Complete four courses from:
HIST 311: The Greeks and the East (3 hrs)
HIST 312: The Evolution of Rome (3 hrs)
ID 250: Myths of the Greeks (3 hrs)
ID 325: Alexander the Great (3 hrs)
PHIL 211: Ancient Greek Philosophy (3 hrs)
REL 210: Ancient Christianity (3 hrs)
REL 330: Paul and His Letters (3 hrs)
Complete three courses from:
ARCH 105: Intro to Greek Archaeology (3 hrs)
ARCH 106: Intro to Roman Archaeology (3 hrs)
ARCH 305: Greek Painted Pottery (3 hrs)
ARCH 306: Greek Architecture (3 hrs)
ARCH 307: Roman Architecture (3 hrs)
ARCH 308: Greek and Roman Sculpture ( 3 hrs )
ARCH 309: The Etruscans (3 hrs)
ARCH 320: Topics in Archaeology (3 hrs)
ARCH 395: Practicum in Archaeology (3-6 hrs)
ARCH 492: Topical Seminars in Archaeology (3 hrs)
Free Electives (46 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## CLASSICAL STUDIES <br> LANGUAGE AND LITERATURE SPECIALIZATION

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements

 (47 hours)Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- ARCH 400, HIST 490, PHIL 499, or REL 499

Overlay: Writing Across the Curriculum (4 courses)
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## Major Requirements (30 hours)

Complete 7* courses in Greek or Latin at the 200/300/400 level. Students must choose at least four courses in one language and at least two courses in another.
*2 of these courses may be used to fulfill Outcome 6 of the general education
Complete three courses from:
HIST 311: The Greeks and the East (3 hrs)
HIST 312: The Evolution of Rome (3 hrs)
ID 250: Myths of the Greeks (3 hrs)
ID 325: Alexander the Great (3 hrs)
PHIL 211: Ancient Greek Philosophy (3 hrs)
REL 210: Ancient Christianity ( 3 hrs )
REL 330: Paul and His Letters (3 hrs)
Complete two courses from:
ARCH 105: Intro to Greek Archaeology (3 hrs)
ARCH 106: Intro to Roman Archaeology (3 hrs)
ARCH 305: Greek Painted Pottery (3 hrs)
ARCH 306: Greek Architecture (3 hrs)
ARCH 307: Roman Architecture (3 hrs)
ARCH 308: Greek and Roman Sculpture (3 hrs)
ARCH 309: The Etruscans (3 hrs)
ARCH 320: Topics in Archaeology (3 hrs)
ARCH 395: Practicum in Archaeology (3-6 hrs)
ARCH 492: Topical Seminars in Archaeology (3 hrs)
Free Electives (43 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts with a Major in Art

Bachelor of Fine Arts with a Major in Art

Bachelor of Science with a Major in Art Education

Bachelor of Science with a Major in Art and Associated Studies

Bachelor of Science with a<br>Pre-art Therapy Concentration

## Bachelor of Science with a Major in Visual Communication Design

## Bachelor of Arts

The Bachelor of Arts degree with a major in art is offered to meet the needs of students interested in art as a discipline of study within a liberal studies education.

## Bachelor of Fine Arts

The Bachelor of Fine Arts degree with a major in art with studio area concentrations in ceramics, painting, and sculpture prepares students for graduate study and to enter the professional field as artists, teachers, designers, and other related professions.
Portfolio and Admission Requirements
BFA students are required to hold a minimum GPA of 2.7 in studio core art courses and submit a portfolio of their creative work for review by a faculty committee which will determine if admission to the BFA program will be granted. Portfolios should be presented for review during the semester following the student's completion of the core curriculum. A minimum of 18 hours in studio art and/or art history must be completed after full admission to the program and before graduation. Admission to the BFA degree program and graduation may not occur within the same academic year.

Graduation Requirements
Prior to graduation with a BFA degree, studio majors must meet the following requirements: Hold a minimum GPA of 2.7 in studio art courses, pass an exit review, and submit a display of their studio work for approval by an art faculty committee.

## Art Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.

## Art and Associated Studies

The Bachelor of Science degree with a major in art is designed for students who want to combine a general art major with an associated field of study such as archaeology, art history, business, communication, history, psychology, or literature.

## Pre-art Therapy Concentration

The Bachelor of Science degree with a pre-art therapy concentration is designed to prepare students for a master's degree program in art therapy or to work in a related field.

## Visual Communication Design

The Bachelor of Science degree with a major in visual communication design is designed for students who wish to pursue a career in art with an emphasis in computer technology.

## Studio Art Minor (20 hours)

The art (studio) minor is designed for students who desire a program of study for their own personal growth and enjoyment or for an adjunct to other major interests such as art history, archaeology, anthropology, business, communication, foreign languages and cultures, history, literature, philosophy, or religion.
Art 210, 220 or 221, 325; one course from Art 330, 340, 345; one course from Art 350, 360, 370; one course from Art History 208, 209; three hours in studio electives

Visual Communication Design Minor (18 hours)
The visual communication design minor is designed for students who prefer to supplement their interest in computers as the artist's tool.

Art 210, 213, 220 or $221,315,316,410$ or 417

## Bachelor of Arts

## ART

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
.
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- Art 401: Art and Culture

Overlays: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
ART 210: Design (3 hrs)
ART 220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 340: Painting (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
Complete one course from:
ART 330: Printmaking (3 hrs)
ART 345: Watercolor (3 hrs)
ART 350: Metalwork/Jewelry (3 hrs)

Studio Art Electives
Complete 13 hours from the following
ART 315: Typography (3 hrs)
ART 316: Publication Design (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 330: Printmaking (3 hrs)
ART 340: Painting (3 hrs)
ART 345: Watercolor (3 hrs)
ART 350: Metalwork/Jewelry (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
ART 410: Portfolio Preparation (3 hrs)
ART 417: Advanced Imaging/lllustration (3 hrs)
Complete 6 hours from 300 level ARTH or ARCH
-
.

Free Electives (30 hours)

39 Hours of 300/400 level course

## Bachelor of Fine Arts

## ART

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- Art 401: Art and Culture

Overlays: Writing Across the Curriculum (4 courses)
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Major Requirements (70 hours)
ART 210: Design (3 hrs)
ART 220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 340: Painting (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
ARTH 208: Survey of Art I (3 hrs)
ARTH 209: Survey of Art II (3 hrs)
ART 330: Printmaking (3 hrs) OR
ART 345: Watercolor (3 hrs) OR
ART 350: Metalwork/Jewelry (3 hrs)
Studio Areas: Complete 15 hours of repeatable courses from one specialization area

Painting
ART 340: Painting (3 hrs)
ART 345: Watercolor (3 hrs)
Ceramics
ART 360: Ceramics (3 hrs)
Sculpture
ART 370: Sculpture (3 hrs)
Complete an additional 12 hours of courses from two studio areas other than the studio specialization.
ART 214: Basic Photography (3 hrs)
ART 314: Creative Photography (3 hrs)
ART 315: Typography (3 hrs)
ART 316: Publication Design (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 330: Printmaking (3 hrs)
ART 350: Metalwork/Jewelry (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
ART 410: Portfolio Preparation (3 hrs)
ART 417: Advanced Imaging/lllustration (3 hrs)
Complete 7 hours from ART electives to total 57 ART hours
Complete 6 hours from ARTH or ARCH

Free Electives (3 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## ART EDUCATION

2023-2024 | 121 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: ( 6 hrs ) Linguistic and Cultural Competence in Language
-
$\cdot$
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
.
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
.
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
- Art 401: Art and Culture or EDUC 490: Schools in Changing

Society
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (81 hours)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 428: Reading in the Content Areas ( 3 hrs )
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)

Art Education Requirements
Art 102: Art in Elementary Schools (3 hrs)
ART 210: Design (3 hrs)
ART 220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 340: Painting (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
ART 497: Methods of Teaching Art (3 hrs)
Complete one course from: Other course from outcome 5
ARTH 208: Survey of Art I (3 hrs)
ARTH 209: Survey of Art II (3 hrs)

Complete 3 hours from 300 level ARTH:

- ARTh 386 or 389

Free Electives (7 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## Art and Associated Studies

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar
Outcome 2: ( 3 hrs ) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- Art 401: Art and Culture

Overlays: Writing Across the Curriculum (4 courses)
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-
-
-
ART 210: Design (3 hrs)
ART220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 340: Painting (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)

Complete one course from:
ART 330: Printmaking (3 hrs)
ART 345: Watercolor (3 hrs)
ART 350: Metalwork/Jewelry (3 hrs)
Complete 4 hours of ART electives.
-
-
Complete 6 hours from ARTH or ARCH.
-

Studio Areas:
Complete 9 hours of repeatable courses from one specialization
(Ceramics, Painting, or Sculpture) area below.
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Complete an additional 9 hours of studio courses
-
-

Associated Study:
Complete at least 9 hours from outside of Art:
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-

Complete 9 additional hours in associated study (9 hours in one area outside of the Department of Art):
-
-
-

Free Electives (10 hours)

39 Hours of 300/400 level courses

Major Requirements (69 hours)

## Bachelor of Science

## ART

Art Therapy Specialization
2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- ART 401: Art and Culture

Overlays: Writing Across the Curriculum (4 courses)
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Major Requirements (68 hours)
ART 201: Introduction to Art Therapy (3 hrs)
ART 210: Design (3 hrs)
ART 220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
ART 301: Creative Development/Art Therapy (3 hrs)
ART 325: Life Drawing (2 hrs)
ART 340: Painting (3 hrs)
ART 360: Ceramics (3 hrs)
ART 370: Sculpture (3 hrs)
ART 405: Art Therapy Seminar (2 hrs)
ART 495: Internship in Art (3-12 hrs)
PSYC 121 - Introduction to Psychology (3 hrs)
PSYC 226 - Child \& Adolescent Psychology (3 hrs)
PSYC 245 - Statistics for Psychology (4 hrs)
PSYC 259 - Abnormal Psychology (3 hrs)
PSYC 367 - Theories of Personality/Psychotherapy (3 hrs)
Complete one course from:
ART 330: Printmaking (3 hrs)
ART 345: Watercolor (3 hrs)
ART 350: Metalwork/Jewelry (3 hrs)
Complete 3 additional hours from PSYC:
-
Complete 9 hours of ART electives:
-
-
-
Complete 6 hours from ARTH or ARCH:
-
.
Free Electives (11 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## VISUAL COMMUNICATION DESIGN

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

- ARTH-208 or 209

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
utcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally and in Writing
.
Overlays: Writing Across the Curriculum (4 courses)
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-
-
-

Major Requirements (52 hours)
ART 210: Design (3 hrs)
ART 213: Computer Graphics (3 hrs)
ART 315: Typography (3 hrs)
ART 316: Publication Design (3 hrs)
ART 322: Digital Photography (3 hrs)
ART 410: Portfolio Preparation (3 hrs)
ART 417: Advanced Imaging/lllustration (3 hrs)
ART 490: Practicum in Art (1-3 hrs)
ART 495: Internship in Art (3-12 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
COMM 251: Principles of Multimedia (3 hrs)
COMM 312: Advertising Copy \& Layout (3 hrs)
COMM 352: Multimedia Strategies (3 hrs

Complete one course from:
ART 220: Drawing (3 hrs)
ART 221: Drawing (3 hrs)
Complete 6 hours of ART electives
-
Complete 6 hours from Art History (ARTH)
-
-
Free Electives (27 hours)
9 hours of electives must be from outside of ART and COMM

39 Hours of 300/400 level courses

## Biology

## Bachelor of Arts or Bachelor of Science with a Major in Applied Biology

Bachelor of Arts or Bachelor of Science with a Major in Applied Biology Education

Bachelor of Arts or Bachelor of Science with a Major in Professional Biology

The Bachelor of Arts and Bachelor of Science degrees with a major in professional biology provide background for further education in one of the health professions (including medicine, dentistry, optometry, and veterinary medicine) or for further graduate study in all specialized areas of the biological sciences. The Bachelor of Arts and Bachelor of Science degrees with a major in applied biology prepare students for careers as laboratory or research assistants, for high school teaching, or for government service. Both biology majors offer a broad knowledge of the biological sciences, including exposure to cell biology, developmental biology, ecology, evolution, genetics, microbiology, molecular biology, physiology, organismal biology, and systematics. Undergraduates are encouraged to conduct in-depth research and, depending upon career goals, student projects may involve topics from gene cloning to complex ecosystem interactions. Students pursuing the Bachelor of Arts must meet the foreign language proficiency requirements at the second-year level and may not earn more than 45 hours of biology credit toward graduation.

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.
Gulf Coast Research Laboratory Affiliation
In 1995 an affiliation was established with the Gulf Coast Research Laboratory of the University of Southern Mississippi in Ocean Springs. Students may obtain transfer credit through summer study in marine science areas such as marine ecology, marine invertebrate zoology, marine psychology, and oceanography. See Dr. Edwards for details.

Biology Minor (18 hours)
Biology 118, 119, 120; additional 200, 300, and 400 level courses in biology to total a minimum of 18 hours (of the additional courses, six hours must be 300- or 400-level biology courses)

## Certificates (16 hours)

The Department of Biology awards a certificate in each of four areas upon the completion of a minimum of 16 hours selected from among the courses listed in an area. Up to four hours of independentresearch (Biology 460) in a specific area may be applied toward the completion of the certificate requirements. Certificates are not reflected on the academic transcript.

Botany: Biology 215, 225, 305, 414, 428
Zoology: Biology 214, 333, 350, 425, 427, 434, 450
Field biology: Biology 214, 215, 320, 360, 414, 423
Microbiology: Biology 305, 331, 340, 110 or 430, 434, 442
Biotechnology:requiressuccessfulcompletionofadegreeprograminbiologyorchemistry, with the following courses: Biology 107, 119, 331, 340, 430; Chemistry 118.

CiSM Certificate (26 hours)
The following courses are required: Biology 118 or 119, Chemistry 118, Mathematics 221, Physics 210 and 220, Statistics 166 and 266, Interdisciplinary 121 and 122, and ChangeLab 300 or Statistics 300.

## Bachelor of Arts

## BIOLOGY - APPLIED

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (30 hours)
Must complete 29 hours of BIOL including BIOL 482
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
Complete one course from:
BIOL 110: Clinical Microbiology +1 cr. Indep. study ( 4 hrs )
BIOL 430: Microbiology (4 hrs)

7 hours from 200 level BIOL or higher:
-
-
-
-
-

Free Electives (43 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## BIOLOGY - APPLIED

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (37 hours)

Must complete 36 hours of BIOL including BIOL 482
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
Complete one course from:
BIOL 110: Clinical Microbiology + 1 cr. Indep. study (4 hrs)
BIOL 430: Microbiology (4 hrs)

14 hours from 200 level BIOL or higher:
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Free Electives (42 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## BIOLOGY - APPLIED EDUCATION

2023-2024 | 126 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (79 hours)
Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding ( 3 hrs )
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar ( 2 hr )
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 451: Methods of Teaching Science SH/JH/MS (2 hrs)
Biology Requirements
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
Complete one course from:
BIOL 110: Clinical Microbiology +1 cr . Independent study ( 4 hrs ) BIOL 430: Microbiology (4 hrs)
Complete 6 hours from 200 level BIOL or higher.
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Secondary Science Core
Complete 3 courses from outside the major. Courses may be used in conjunction with general education and major requirements.
Complete three courses from:
CHEM 118: Principles of Chemistry (4 hrs)
PHYS 121: Algebra Physics I (4 hrs)
ASTR 101: Descriptive Astronomy (3 hrs)
GEOG 230: Physical Geography (4hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## BIOLOGY - APPLIED EDUCATION

2023-2024 | 127 Hours Required

## Enduring Foundations General Education Requirements

 (41 hours)Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time.
Please see the automated degree audit on Student Planning for the most up-to-date program information.

## Bachelor of Arts

## BIOLOGY - PROFESSIONAL

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
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Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in
Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (37 hours)
Must complete 32 hours of BIOL including BIOL 482.
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
BIOL 331: Genetics (4 hrs)
BIOL 340: Cellular and Molecular Biology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 341: Organic Chemistry II (4 hrs)
6 hours from 200 level BIOL or higher:
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Free Electives (36 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## BIOLOGY - PROFESSIONAL

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
.
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- BIOL 482: Biology Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (45 hours)
Must complete 40 hours of BIOL including BIOL 482.
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
BIOL 331: Genetics (4 hrs)
BIOL 340: Cellular and Molecular Biology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 341: Organic Chemistry II (4 hrs)

14 hours from 200 level BIOL or higher:
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Free Electives (34 hours)

39 Hours of 300/400 level courses

## Bachelor of Science with a Major in Clinical Laboratory Science

A clinical laboratory scientist (medical laboratory scientist) is capable of performing, under the supervision of a pathologist or other qualified physician or laboratory director, the various chemical, microscopic, bacteriologic, and other medical laboratory procedures used in the diagnosis, study, and treatment of disease.

Students pursuing the clinical laboratory science major complete approximately 100 semester hours at UE (six semesters of course work) and then complete 12 months of study at a hospital endorsed by the National Accrediting Agency for Clinical Laboratory Sciences (NAACLS) and the American Society of Clinical Pathology (ASCP) of the American Medical Association. The first three years of study provide a solid foundation based on the natural sciences with an emphasis on biology and chemistry. The fourth year consists of combined classroom and laboratory studies that provide experience in clinical chemistry, hematology, immunohematology (blood banking), microbiology, serology/immunology/ virology, parasitology and mycology, urinalysis, and instrumentation. Completion of prerequisite courses at UE does not guarantee admission to a hospital program. Acceptance is based on academic performance, letters of recommendation, motivation, aptitude, work experience, and interviews.

Some students complete a four-year BS degree before entering the clinical year of training. An option for those students interested in a career in clinical laboratory science is to complete the four-year combined exercise science and clinical laboratory science degree, prior to the clinical experience during the fifth year.
Clinical Exercise Science Minor (24 hours)
The clinical exercise science minor prepares students for careers related to exercise in a clinical setting. The curriculum of the minor prepares students for the application of exercise and physical activity in those clinical and pathological situations where it has been shown to provide therapeutic or functional benefit.

## Bachelor of Science

## CLINICAL LABORATORY SCIENCE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (42 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
,
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus

Outcome 8: (8 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 121: Algebra Physics I (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (49 hrs)
HE 111: Medical Terminology (1 hr)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
BIOL 119: Intro Biology: Molecular Perspective (4 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 331: Genetics (4 hrs)
BIOL 430: Microbiology (4 hrs)
BIOL 434: Parasitology (4 hrs)
BIOL 442: Immunology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry (4 hrs
CHEM 370: Biochemistry I (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
Clinical (32 hrs)
EXSS 478: CLS Clinical
Credit granted upon successful completion of two semesters of clinical experience and a summer clinical. Prerequisite: Successful admission into clinical laboratory program.

39 Hours of 300/400 level course

British Studies provides an interdisciplinary survey of cultural and historical developments within British society from the earliest times to the present. It explains the political development of the various nations that make up the British Isles and the changing nature of the often-fractious relationship between and among those countries: England, Scotland, Wales, and (Northern) Ireland. The central theme of the required course at Harlaxton is national identity; it is concerned with and seeks to explain the nature of Britain historically, politically, culturally, and intellectually. The course helps students understand the protracted and difficult process by which the United Kingdom became unified.

Elements of the core course are integrated into Harlaxton's wide range of extracurricular activities, including the travel program. Through this holistic approach, students are encouraged to reflect on concepts of identity-national and individual-and the challenges posed by an increasingly globalized world. As part of the wider Harlaxton experience, British Studies supports students' development as responsible global citizens.

The required British Studies course aims that students will:

1) Acquire a clear understanding of major historical and cultural trends in Britain and Ireland;
2) Gain a greater sense of personal and social responsibility through intercultural knowledge and competence;
3) Develop a range of intellectual and practical skills, including:
a. inquiry/research and analysis
b. critical and creative thinking
c. written and oral communication
d. information literacy
e. teamwork and problem solving

A range of elective courses, to be taken either at Harlaxton or UE, further supports these objectives and also supplements and deepens the student's appreciation of British history and national identity and the U.K.'s political, artistic, cultural, intellectual and religious traditions.

British Studies Minor (18 hours)
6 hours from the following: BRIT 220/320/320H, BRIT 230/330/330H, BRIT 290, BRIT 295/395/495, ENGL 330 or HIST 491; 12 hours from the following: Art History H378, H379, H383, H387, H388; Education H498; English 231, 232, 233, 300, 350, 351, 370, 375, 380, 385; History 318, 319, 381, 383, 385, H491; Interdisciplinary 235, H280, H290; Political Science H385; Religion 250.

## British Studies Certificate (12 hours)

6 hours from the following: BRIT 220/320/320H, BRIT 230/330/330H, BRIT 290, BRIT 295/395/495, ENGL 330 or HIST 491; 6 hours from the following: Art History H378, H379, H383, H387, H388; Education H498; English 231, 232, 233, 300, 350, 351, 370, 375, 380, 385; History 318, 319, 381, 383, 385, H491; Interdisciplinary 235, H280, H290; Political Science H385; Religion 250.

## Chemistry

Bachelor of Arts or Bachelor of Science with a Major in Chemistry - Basic

Bachelor of Science with a major in Chemistry Basic Education

Bachelor of Arts or Bachelor of Science with a<br>Major in Chemistry -<br>Professional

Bachelor of Science with a Major in Chemistry - Business Administration

## Bachelor of Arts or Bachelor of Science with a Major in Biochemistry

Bachelor of Science with a Major in Environmental Science

Bachelor of Science with a Major in Environmental Administration

The University of Evansville is approved by the American Chemical Society for undergraduate professional training in chemistry. The professional chemistry major described below meets the guidelines formulated by the Committee on Professional Training of the American Chemical Society. The Department of Chemistry offers three chemistry majors, a co-op program for interested professional chemistry majors, and a major in biochemistry.

It is possible, with advanced planning, to spend a semester in England and still complete all degree requirements within four years by taking general education courses at Harlaxton College.

Chemistry Minor (20 hours)
Chemistry 118, 240, 280, 360; one from Chemistry 341, 351, or 370 and 371

## Environmental Studies

## Director: Arlen Kaufman

The environmental studies program provides degree opportunities in three different environmental career areas. These include the Bachelor of Science degree with a major in environmental science, the Bachelor of Science degree with a major in environmental administration, and a baccalaureate degree selected from any traditional major combined with those courses constituting the environmental studies minor.

Graduates with a major in environmental science are well prepared for a variety of career opportunities dealing with the complex environmental problems that confront our society. This major stresses a strong background in basic science combined with courses dealing specifically with environmental problems. It is intended for the person interested in laboratory and fieldwork or the general area of detection, measurement, and solution of environmental problems.

Environmental Administration emphasizes, as a vocational objective, a management position for a person familiar with the scientific aspects of environmental matters and the general political, social, and economic framework of our society. In addition, a general background is provided in public administration that should aid in advancement possibilities within public agencies.

Environmental Studies Minor (28 hours)
Thisprogramprovidesenvironmental perspectivestothoseentering conventionaloccupations where environmental awareness is important in decision-making and everyday life.
Biology 120, 320; Biology 423 or Chemistry 360; Chemistry 118, 240; Environmental Studies 360; Environmental Studies 103 or Biology 118; Geology 130

## Co-op Program

A cooperative education plan for chemistry or environmental majors is available as an alternative to the traditional four-year plan. The co-op plan combines classroom education with full-time work experience in industry. Please refer to Special Educational Opportunities located in the Degrees, Curriculum, Academic Opportunities section of the catalog.

## Bachelor of Arts

## CHEMISTRY - BASIC

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (49 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
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-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (8 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry*
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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CHEM 118: Principles of Chemistry (4 hrs)*
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II ( 5 hrs )
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hr.)
MATH 222: Calculus I (4 hrs)
Compete four hours from:
CHEM 452: Physical Chemistry II (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 473: Biochemistry II (3 hrs)
CHEM 474: Biochemistry II Lab (1 hr.)
CHEM 483: Inorganic Chemistry II (4 hrs)
Complete one course from:
PHYS 122: Algebra Physics II (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)

Free Electives (30 hours)

39 Hours of 300/400 level courses
*Satisfies both a general education and a major requirement for a total of 4 hours in one area only.

## Bachelor of Science

## CHEMISTRY - BASIC

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (43 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (8 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry*
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
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Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
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Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (41 hours)
CHEM 118: Principles of Chemistry (4 hrs)*
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II ( 5 hrs )
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hr.)
MATH 222: Calculus I (4 hrs)
Compete four hours from:
CHEM 452: Physical Chemistry II (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 473: Biochemistry II (3 hrs)
CHEM 474: Biochemistry II Lab (1 hr.)
CHEM 483: Inorganic Chemistry II (4 hrs)
Complete one course from:
PHYS 122: Algebra Physics II (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)

Free Electives (36 hours)

39 Hours of 300/400 level courses
*Satisfies both a general education and a major requirement for a total of 4 hours in one area only.

## Bachelor of Arts

## CHEMISTRY BASIC EDUCATION

2023-2024 | 140 Hours Required
Enduring Foundations General Education Requirements (49 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (8 hrs) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CHEM 499: Senior Capstone or EDUC 490: Schools in Changing Society
Overlay: Writing Across the Curriculum (4 courses)
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## Major Requirements (91 hours)

Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding ( 3 hrs )
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 451: Methods of Teaching Science SH/JH/MS (2 hrs)

## Chemistry Requirements

CHEM 118: Principles of Chemistry (4 hrs)
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II (5 hrs)
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hrs)
MATH 222: Calculus I (4 hrs)
Complete 4 hours from:
CHEM 452: Physical Chemistry II (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 473: Biochemistry II (3 hrs)
CHEM 474: Biochemistry II Lab (1 hrs)
CHEM 483: Inorganic Chemistry II (4 hrs)
Complete one course from:
PHYS 122: Algebra Physics II (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Secondary Science Core
Complete 3 courses from outside the major. Courses may be used in conjunction with general education and major requirements.

Complete 3 courses from:
BIOL 107: General Biology (4 hrs)
PHYS 121: Algebra Physics I (4 hrs)
ASTR 101: Descriptive Astronomy (3 hrs)
GEOG 230: Physical Geography (4hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## CHEMISTRY BASIC EDUCATION

2023-2024 | 134 Hours Required
Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
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Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (8 hrs) Scientific Literacy

- CHEM 118: Principles of Chemistry
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: ( 6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CHEM 499: Senior Capstone or EDUC 490: Schools in Changing Society
Overlay: Writing Across the Curriculum (4 courses)
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## Major Requirements (91 hours)

Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding ( 3 hrs )
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar ( 2 hr )
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 451: Methods of Teaching Science SH/JH/MS (2 hrs)
Chemistry Requirements
CHEM 118: Principles of Chemistry (4 hrs)
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II ( 5 hrs )
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hrs)
MATH 222: Calculus I (4 hrs)
Complete 4 hours from:
CHEM 452: Physical Chemistry II (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 473: Biochemistry II (3 hrs)
CHEM 474: Biochemistry II Lab (1 hrs)
CHEM 483: Inorganic Chemistry II (4 hrs)
Complete one course from:
PHYS 122: Algebra Physics II (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Secondary Science Core
Complete 3 courses from outside the major. Courses may be used in conjunction with general education and major requirements.

Complete 3 courses from:
BIOL 107: General Biology (4 hrs)
PHYS 121: Algebra Physics I (4 hrs)
ASTR 101: Descriptive Astronomy (3 hrs)
GEOG 230: Physical Geography (4hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## CHEMISTRY - PROFESSIONAL

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry*
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (53 hours)
CHEM 118: Principles of Chemistry (4 hrs)*
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II ( 5 hrs )
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 452: Physical Chemistry (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 483: Inorganic Chemistry II (4 hrs)
MATH 222: Calculus I (4 hrs)
MATH 323: Calculus III (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Complete one course from:
CHEM 371: Biochemistry I Lab (1 hr)
CHEM 493: Short Topics on Advanced Chemistry (1-3 hrs)
CHEM 495: Research (1-2 hrs)

Free Electives (26 hours)

39 Hours of 300/400 level courses
*Satisfies both a general education and a major requirement for a total of 4 hours in one area only.

## Bachelor of Arts

## CHEMISTRY - PROFESSIONAL

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry*
- PHYS 100, 121, or 210

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-
CHEM 118: Principles of Chemistry (4 hrs)*
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 341: Organic Chemistry II (5 hrs)
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 452: Physical Chemistry (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 483: Inorganic Chemistry II (4 hrs)
MATH 222: Calculus I (4 hrs)
MATH 323: Calculus III (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Complete one course from:
CHEM 371: Biochemistry I Lab (1 hr)
CHEM 493: Short Topics on Advanced Chemistry (1-3 hrs)
CHEM 495: Research (1-2 hrs)

Free Electives (20 hours)

39 Hours of 300/400 level courses
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.

## Bachelor of Science

## CHEMISTRY - BUSINESS ADMINISTRATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (43 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry*
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
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Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (42 hours)
ACCT 210: Intro to Financial Accounting (3 hrs)
CHEM 118: Principles of Chemistry (4 hrs)*
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
MATH 222: Calculus I (4 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
PHYS 122: Algebra Physics II (4 hrs) OR
PHYS 211: Calculus Physics II (4 hrs)

Free Electives (35 hours)

39 Hours of 300/400 level courses
*Satisfies both a general education and a major requirement for a total of 4 hours in one area only.

## Bachelor of Arts

## BIOCHEMISTRY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (49 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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.
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- BIOL 119: Intro to Biology: Molecular Perspective
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hours)

This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time.
Please see the automated degree audit on Student Planning for the most up-to-date program information.

## Bachelor of Science

## BIOCHEMISTRY

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (43 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- BIOL 119: Intro to Biology: Molecular Perspective
- PHYS 121: Algebra Physics I or PHYS 210: Calculus Physics I

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hours)
BIOL 120: Intro to Biology: Organismal Diversity (4 hrs)
BIOL 331: Genetics (4 hrs)
CHEM 118: Principles of Chemistry (4 hrs)
CHEM 201: Chemistry Seminar Attendance (0 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 341: Organic Chemistry II (5 hrs)
CHEM 301: Chemistry Seminar Attendance (0 hrs)
CHEM 351: Physical Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hr.)
CHEM 473: Biochemistry II (3 hrs)
CHEM 474: Biochemistry II Lab (1 hr.)
MATH 222: Calculus I (4 hrs)
PHYS 122: Algebra Physics II (4 hrs) OR
PHYS 211: Calculus Physics II (4 hrs)
Complete one course from:
BIOL 340: Cellular and Molecular Biology (4 hrs)
BIOL 427: Animal Physiology (4 hrs)
BIOL 430: Microbiology (4 hrs)
BIOL 442: Immunology (4 hrs)
Complete one course from:
CHEM 452: Physical Chemistry II (4 hrs)
CHEM 461: Instrumental Analysis (4 hrs)
CHEM 483: Inorganic Chemistry II (4 hrs)

Free Electives (23 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## ENVIRONMENTAL SCIENCE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7:Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 121: Algebra Physics I (4 hrs) OR PHYS 210: Calculus Physics I (4 hrs)
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
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Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
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Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hours)
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 280: Inorganic Chemistry I (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CE 374: Environmental Engineering I (3 hrs)
ES 360: Science of Environmental Pollutants (3 hrs)
ES 440: Environmental Law/Regulatory Policy ( 3 hrs )
ES 495: Environmental Studies Internship (3 hrs)
GEOL 130: Environmental Geology (3 hrs)
Complete one course from:
PHYS 122: Algebra Physics II (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Environmental Science Electives
12 hours of 300/400 level courses, chosen in consultation with the environmental studies program director.
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Free Electives (25 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## ENVIRONMENTAL ADMINISTRATION

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
.
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7:Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 121: Algebra Physics I (4 hrs) OR

PHYS 210: Calculus Physics I (4 hrs)
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
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Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hours)
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
ES 360: Science of Environmental Pollutants (3 hrs)
ES 440: Environmental Law/Regulatory Process (3 hrs)
ES 495: Environmental Studies Internship (3 hrs)
GEOL 130: Environmental Geology (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
LS 380: Administrative Law (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
PSCI 349: State and Local Government (3 hrs)

Complete one course from:
QM 227: Introduction to Statistics (3 hrs)
BIOL 415: Biostatistics (4 hrs)
ECON 300: Regression Analysis (3 hrs)
HSA 467: Statistics Appraisal/Evaluation (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
PSCI 212: Research Methods-Political Science (3 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
PSYC 246: Research Methods in Psychology (4 hrs)
SOC 235: Social Research Methods (4 hrs)
SOC 344: Introduction to Behavioral Statistics (4 hrs
Environmental Administration Electives
12 hours of 300/400 level courses, chosen in consultation with the environmental studies program director.
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Free Electives (25 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts or Bachelor of Science with a Major in Communication

Bachelor of Arts or Bachelor of Science<br>with a Major in Health Communication

Bachelor of Arts or Bachelor of Science with a Major in Sport Communication

## Bachelor of Science with a major in Creative Technology

The Department of Communication offers Bachelor of Arts and Bachelor of Science degrees in communication

This major prepares students for a variety of related professional careers involving communication. Students receive cross-training in various media and communication skills. To acquire practical experience in the area of their choice, students are required to earn both practicum and internship credits. They are also required to earn either a minor or a specialization in an area outside communication. Communication courses are scheduled to allow students to attend Harlaxton College without disrupting their course sequences and graduation schedule.

Communication Minor (18 hours)
Communication 130, 485; two from 200-level Communication and two from 300-level Communication classes.

Creative Technology Minor (21 hours)
Required (12 hrs)MUS 193, ART 213, COMM 251, CT 499;Choose 3 (9 hrs) ART 210:,, ART 316ART 322, ART 316, ART 322, ART 417, ART 492,COMM 240, COMM 340, COMM 345, COMM 355, MUS 293, MUS 393, MUS 493, THTR 221,THTR 331 or THTR 338

## Bachelor of Arts

## COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements
(47 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- COMM 488: World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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COMM 120: Information Gathering and Distribution (3 hrs)
COMM 130: Intro to Communication (3 hrs)*
COMM 210: Professional Speaking (3 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
(3 hrs)

COMM 251: Principles of Multimedia ( 3 hrs )
COMM 312: Media Design and Layout (3 hrs)
COMM 332: Advanced Writing and Editing (3 hrs)
COMM 345: Video Production (3 hrs)
COMM 380: Intercultural Communcation (3 hrs)
a

Practical Experience (4-12 hrs)
COMM 390: Practicum (2-8 hrs)
COMM 391: Professional Development ( 1 hr )
COMM 395: Internship (1-3 hr)

MINOR or Cognate (18 hours)
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Free Electives (15 hours)

39 Hours of 300/400 level courses)
NOTES:
*Satisfies both a general education and a major requirement for a COMM 325, COMM 335, and COMM 410 are recommended courses

## Bachelor of Science

## COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- COMM 488: World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (42 hours)
COMM 120: Information Gathering and Distribution (3 hrs)
COMM 130: Intro to Communication (3 hrs)*
COMM 210: Professional Speaking (3 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
COMM 221: Media Writing ( 3 hrs)
COMM 240: Live Events (3 hrs)
COMM 251: Principles of Multimedia (3 hrs)
COMM 312: Media Design and Layout (3 hrs)
COMM 314: Integrated Communication Campaigns (3 hrs)
COMM 332: Advanced Writing and Editing (3 hrs)
COMM 345: Video Production (3 hrs)
COMM 380: Intercultural Communcation (3 hrs)
COMM 483: Media Theory and Research ( 3 hrs )
COMM 485: Media Law and Ethics (3 hrs)
Practical Experience (4-12 hrs)
COMM 390: Practicum (2-8 hrs)
COMM 391: Professional Development (1 hr)
COMM 395: Internship (1-3 hr)
MINOR or Cognate (18 hours)
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Free Electives (15 hours)

39 Hours of 300/400 level courses)
NOTES:
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
COMM 325, COMM 335, and COMM 410 are recommended courses

## Bachelor of Arts

## HEALTH COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
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Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through 212 level.
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- One from: BIOL 100, BIOL 107, CHEM 100, CHEM 108, or CHEM 118
- One from: ES 103 or NEUR 125

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- COMM 488 World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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NOTES:
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
COMM 325 and COMM 335 are recommended courses

## Bachelor of Science

## HEALTH COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: ( 6 hrs ) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- One from: BIOL 100, BIOL 107, CHEM 100, CHEM 108, or CHEM 118
- One from: ES 103 or NEUR 125

Outcome 9: ( 6 hrs ) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- COMM 488: World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hours)
COMM 120: Information Gathering and Distribution (3 hrs)
COMM 130: Intro to Communication (3 hrs)*
COMM 210: Professional Speaking (3 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
COMM 221: Media Writing (3 hrs)
COMM 240: Live Events (3 hrs)
COMM 251: Principles of Multimedia (3 hrs)
COMM 312: Media Design and Layout (3 hrs)
COMM 314: Integrated Communication Campaigns (3 hrs)
COMM 332: Advanced Writing and Editing (3 hrs)
COMM 345: Video Production (3 hrs)
COMM 380: Intercultural Communcation (3 hrs)
COMM 483: Media Theory and Research (3 hrs)
COMM 485: Media Law and Ethics (3 hrs)
COMM 410: Health Communication (3 hrs)
HSA 405: Health Care Systems: Issues (3 hrs)
HSA 414: Health Care Management Theory/HR (3 hrs)
HSA 420: Health Care Planning/Marketing (3 hrs)
PH 190: Intro to Public Health (3 hrs)
PH 195: Global Health Issues (3 hrs)
Practical Experience (4-12 hrs)
COMM 390: Practicum (2-8 hrs)
COMM 391: Professional Development (1 hr)
COMM 395: Internship (1-3 hr)
Free Electives (15 hours)

39 Hours of 300/400 level courses

## NOTES:

*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
COMM 325 and COMM 335 are recommended courses

## Bachelor of Arts

## SPORTS COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through 212 level.
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- COMM 488 World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hours)
COMM 120: Information Gathering and Distribution (3 hrs)
COMM 130: Intro to Communication (3 hrs)*
COMM 210: Professional Speaking (3 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
COMM 221: Media Writing (3 hrs)
COMM 240: Live Events (3 hrs)
COMM 251: Principles of Multimedia ( 3 hrs )
COMM 312: Media Design and Layout (3 hrs)
COMM 314: Integrated Communication Campaigns (3 hrs)
COMM 332: Advanced Writing and Editing (3 hrs)
COMM 345: Video Production (3 hrs)
COMM 380: Intercultural Communcation (3 hrs)
COMM 483: Media Theory and Research (3 hrs)
COMM 485: Media Law and Ethics (3 hrs)
COMM 325: Sports Promotion (3 hrs)
COMM 335: Sports Writing (3 hrs)
QM 160: Data Analytics (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
One approved Business elective (3 hrs)
Practical Experience (4-12 hrs)
COMM 390: Practicum (2-8 hrs)
COMM 391: Professional Development (1 hr)
COMM 395: Internship (1-3 hr)
Free Electives ( 15 hours)

39 Hours of 300/400 level courses

NOTES:
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
COMM 410 Recommended course

## Bachelor of Science

## SPORTS COMMUNICATION

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: ( 6 hrs ) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication* -

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- COMM 488 World Media Systems (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hours)
COMM 120: Information Gathering and Distribution (3 hrs)
COMM 130: Intro to Communication (3 hrs)*
COMM 210: Professional Speaking (3 hrs)
COMM 211: Advertising and Promotional Strategy (3 hrs)
COMM 221: Media Writing (3 hrs)
COMM 240: Live Events (3 hrs)
COMM 251: Principles of Multimedia (3 hrs)
COMM 312: Media Design and Layout (3 hrs)
COMM 314: Integrated Communication Campaigns (3 hrs)
COMM 332: Advanced Writing and Editing (3 hrs)
COMM 345: Video Production (3 hrs)
COMM 380: Intercultural Communcation (3 hrs)
COMM 483: Media Theory and Research (3 hrs)
COMM 485: Media Law and Ethics (3 hrs)
COMM 325: Sports Promotion (3 hrs)
COMM 335: Sports Writing (3 hrs)
QM 160: Data Analytics (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
One approved Business elective (3 hrs)
Practical Experience (4-12 hrs)
COMM 390: Practicum (2-8 hrs)
COMM 391: Professional Development (1 hr)
COMM 395: Internship (1-3 hr)
Free Electives (15 hours)

39 Hours of 300/400 level courses

NOTES:
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
COMM 410 Recommended course

## Bachelor of Science

## CREATIVE TECHNOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through 112 level.
-
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- COMM 130: Intro to Communication*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CT 499: Creative Technology Capstone (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (55/56 hours)
CHNG 101: Creative Problem Solving
MUS 193: Intro. To Music Technology
COMM 251: Principles of Multimedia
CS 101: Intro to Computer Science or
EE 101: Intro to Electrical Engineering
ART 213: Intro to Computer Graphics
THTR 110: Intro to Theatre
MKT 325: Principles of Marketing
ACCT 210: Intro to Financial Accounting

Complete 3 hours from the following:
ART 210: 2D Design,
ART 316 (Publication Design)
ART 322 (Digital Photography)
Complete 2 hours from the following:
APM (Instrument of Choice: Guitar, Keyboard, Drum Set),
THTR 221 (Production Techniques)
COMM 345 (Video Production)
Complete 6 hours from across 2 disciplines
ART
ARTH 208: Survey of Art,
ART 220: Drawing
ART 315: Typography
ART 325: Life Drawing
ART 340: Painting
MUSIC
MUS 141
MUS 142
MUS 155
APM (any)
MUS 355
MUS 356
CREATIVE WRITING
WRTG 204: Copy Editing
WRTG 207: Intro to Short Story
WRTG 211: Creative Non-Fiction
Creative Technology Electives (22 hrs)
THTR 221: Production Techniques
COMM 240: Live Events
MUS 129, 229, 329, 429: Ensemble
ART 410: Portfolio Preparation
ART 417: Advanced Imaging \& Illustration
ART 492: Motion Graphic Design
MUS 293: Electronic Music Media
MUS 393: Audio Recording II
MUS 493: Audio Recording III
COMM 312: Media Design \& Layout
COMM 340: Sound Reinforcement/ Recording for Live Events
COMM 345: Video Production
COMM 355: Multimedia Sound
THTR 338: Sound Design for Stage
MGT 380: Special Topics (Entrepreneurship)
MKT 385: Digital Marketing
PSYC 265: Applied Creativity \& Design
Seminar/Project Courses ( 6 hrs )
CHNG 310: ChangeLab
ART 490: Crescent
CT 497: Creative Technologies Internship
Free Electives (15 hours)
39 Hours of 300/400 level courses

## English and Creative Writing

Faculty: Baines, Cirino (Chair), Griffith, Hochwender, Mullins, Nikolidakis, Petrosillo

## Bachelor of Arts with a Major in Writing

## Bachelor of Fine Arts with a Major in Creative Writing

Bachelor of Arts<br>with a Major in Literature

Bachelor of Science with a Major in English Education

The Department of English and Creative Writing offers majors and minors in writing and literature for students preparing for careers in such fields as writing, teaching, publishing, business, librarianship, law, medicine, ministry, and diplomacy. Courses are also available for non-majors seeking personal enrichment or wishing to expand their powers of written expression. The Bachelor of Arts degree may be earned in writing or literture and the Bachelor of Fine Arts degree may be earned in creative writing. Requirements for students in English preparing for secondary education are outlined in the College of Education and Health Sciences section.
Harlaxton College in Grantham, England
Study at Harlaxton College can be especially valuable for a writing student. Courses on Shakespeare and the English novel, along with several electives in literature, are offered most semestersatHarlaxton(seewww.harlaxton.evansville.edu).Special programsareoftenarranged at the Royal Shakespeare Theatre in Stratford-upon-Avon, and visits to locales of significant authors and works are readily arranged.
Writing Minor (21 hours)
Writing 204, 205, and five or more courses from 206, 207, 306, 307, 308, 309, 390, 490 or 495

Literature Minor (21 hours)
English 223, 231, 232, 241, 242, 350; one English elective

## Bachelor of Science with a Major in English Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.

## Bachelor of Fine Arts

## CREATIVE WRITING

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- WRTG 480: Senior Seminar in Creative Writing

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hours)
Complete 60 hours from any combination of available courses in writing and literature, including interdisciplinary 200 (International Cinema) and interdisciplinary 205 (American Cinema).

Free Electives (19 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## ENGLISH EDUCATION

2023-2024 | 122 Hours Required

Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
.
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
- 

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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## Major Requirements (81 hours)

Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 453: Methods of Teaching English SH/JH/MS (2 hrs)
English Language Arts Requirements
COMM 210: Professional Speaking (3 hrs)
ENGL 210: Approaches to Literature I ( 3 hrs )
ENGL 231: Masterpieces of British Literature I (3 hrs)
ENGL 232: Masterpieces of British Literature II (3 hrs)
ENGL 241: Major American Writers I (3 hrs)
ENGL 242: Major American Writers II (3 hrs)
ENGL 340: Contemporary World Literature (3 hrs)
ENGL 350: Shakespeare (3 hrs)
ENGL 351: The British Novel (3 hrs) OR
ENGL 352: The Young Adult Novel (3 hrs)
ENGL 353: The American Novel (3 hrs)
WRTG 204: Copy Editing (3 hrs)
WRTG 205: Introduction to Creative Writing (3 hrs)
WRTG 211: Introduction to Creative Nonfiction (3 hrs)
Complete one course from:
ENGL 122: Modern World Literatures (3 hrs)
ENGL 223: World Classics
Complete one course from:
ENGL 340: Contemporary World Literature (3 hrs)
ENGL 445: Seminar in Literary Criticism (3 hrs)

39 Hours of 300/400 level courses

## Bachelor of Arts

## LITERATURE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements
(47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
ENGL 120: Intro to Literature I (3 hrs)
ENGL 231: Masterpieces of British Literature I (3 hrs)
ENGL 232: Masterpieces of British Literature II (3 hrs)
ENGL 241: Major American Writers I (3 hrs)
ENGL 242: Major American Writers II (3 hrs)
ENGL 350: Shakespeare (3 hrs)
Complete 9 hours of British Literature from:
ENGL 300: Early English Writers (3 hrs)
ENGL 310: The Renaissance \& 17th Century (3 hrs)
ENGL 351: The British Novel (3 hrs)
ENGL 370: Age of Enlightenment (3 hrs)
ENGL 375: The Romantic Movement (3 hrs)
ENGL 380: The Victorian Period (3 hrs)
ENGL 385: The Twentieth Century (3 hrs)
Complete 9 hours from 300/400 level ENGL:

- ENGL 223: World Classics (may substitute for one of these additional courses.)
- ENGL 330: Special Topics in Literature (may be taken up to three times, if different topic)
- Courses may also be chosen from the British Literature list above

Free Electives (37 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## WRITING

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- WRTG 480: Senior Seminar in Creative Writing

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
ENGL 241: Major American Writers I (3 hrs)
ENGL 242: Major American Writers II (3 hrs)
ENGL 350: Shakespeare (3 hrs)
WRTG 204: Copy Editing (3 hrs)

Complete one additional literature course (3 hrs)
Complete 21 hours from:
WRTG 205: Introduction to Creative Writing (3 hrs)
WRTG 206: Introduction to Poetry (3 hrs)
WRTG 207: Introduction to Short Story (3 hrs)
WRTG 211: Introduction to Creative Nonfiction (3 hrs)
WRTG 306: Short Story Writing (3 hrs)
WRTG 307: Poetry Writing (3 hrs)
WRTG 309: Genre Fiction (3 hrs)
WRTG 310: Editing and Publishing (3 hrs)
WRTG 311: Advanced Creative Nonfiction (3 hrs)
WRTG 330: Special Topics in Writing (3 hrs)
WRTG 390: Screenwriting (3 hrs)
WRTG 490: Writing Workshop (3 hrs)
WRTG 494: Writing Internship (1-6 hrs)
WRTG 495: Creative Writing Independent Study (1-9 hrs)
Free Electives (37 hours)

39 Hours of 300/400 level courses

Bachelor of Arts with a Major in Spanish

Bachelor of Arts with a Major in Spanish with a Medical Spanish Specialization

Bachelor of Science with a Major in Spanish Education

## Bachelor of Arts with a Major in International Stud-

In keeping with the global focus of the University of Evansville, the Department of Foreign Languages and Cultures offers an array of degree programs. Students may elect a full liberal arts major or minor in French, German, or Spanish as well as an education major in Spanish Further options include classes in Greek and Latin. A classical studies major and minor and a classical languages minor are also offered. Students are encouraged to combine a language major with an additional major such as History, International Studies, Environmental Studies, Archaeology, Global Business, Public Health Administration, Creative Writing, etc. These complementary degrees provide graduates with an edge to compete in a global market.

International studies is an interdisciplinary major that rests on the understanding that twenty-first century problems and careers are not restricted to single disciplines. Each student has unique talents, desires, needs, and career goals that need not be forced into traditional academic boundaries. The curriculum offers a strong foundation in international affairs, political science, economics, and foreign languages and cultures. Each major must study abroad for one semester or complete at least a semester-long internship or work experience approved by the director. If the student chooses a semester of study, an academic load of 12 semester hours must be completed. Nine semester hours of this work should be upper-division courses approved in advance by the director. A semester at Harlaxton or the University of Evansville's summer programs in Asia, Latin America, or the Middle East can satisfy this requirement.

## Classical Languages Minor (18 hours)

In the classical languages minor, students gain facility in both classical languages, Greek, and Latin. Students choose an area of primary competence in one classical language (Greek or Latin) and an area of secondary competence in the other classical language (or the other classical language). Classical language minors develop a mastery of the classical languages, powers of critical analysis, an appreciation of literature, and an understanding of the documents and traditions which constitute the foundation of Western civilization. The requirements are primary competence in Greek or Latin - four courses numbered 200 or above; secondary competence - two courses numbered 200 or above in the other classical language or the course numbered 211 in the other classical language.

French, German, or Spanish Minor (18 hours)
Foreign language and culture minor s are required to take 18 hours at the 200-level and above in the target language. French/German/Spanish minors take 211, 212, 12 hours at the 300/400-level. FREN 311 is a prerequisite for all French upper-level courses. GERM 311 or 312 is a prerequisite for all upper-level German courses. SPAN 312 is a prerequisite for all upper-level Spanish courses. French, German, and Spanish minors who take FLC 401 as their capstone course must present their senior thesis in the target language as part of FLC 401.

## Medical Spanish Minor (18 hours)

The medical Spanish minor requires 18 credit hours, which includes the following specific courses: SPAN 211, 212, 312, 325, 350, and another 300/400-level Spanish course. SPAN 312, 325 , and 350 must be taken at UE.

## International Studies Minor (18 hours)

One from Political Science 100 or 160; one from Political Science 361, 362, 363, 369, 435, 461; one from Political Science 320, 360, 380, H385, 459, 461, 489

Three courses, in consultation with the director, from anthropology, archaeology, history, modern foreign languages and cultures, religion, and world literature; no more than two courses may be taken from any one subject; British Studies 282 or 382 (Harlaxton) may substitute for two courses toward this requirement

Secondary Education Teaching Minors
Grades 9-12. Students may not count 111 or 112 toward the minor.
In addition to the University's general education requirements, foreign language minors are required to take 24 hours at the 200-level and above. An approved study abroad program of at least six semester hours is highly recommended. Those courses replace University of Evansville courses.

French (24 hours): 211, 212, and 18 hours beyond
German ( 24 hours): 211, 212, and 18 hours beyond
Spanish (24 hours): 211, 212, and 18 hours beyond

Intercultural Comptence Certificate ( 9 hours)
Complete the following courses: COMM 380; FLC 360; FLC 361.

## Course Summaries

## Beginning and Intermediate Language Sequence

Beginning foreign language courses $(111,112)$ introduce the student to the four skills of speaking, listening, reading, and writing, with emphasis on cultural awareness. Students may be required to do additional work with audio-visual media, or computer-assisted practice.
Intermediate foreign language courses $(211,212)$ are designed for the student who already has a good grasp of the elements of the language and is somewhat advanced in the four skills of speaking, listening, reading, and writing. Students placed in these courses usually have had three or four years of high school foreign language or have made an appropriate score on the proficiency test. Intermediate foreign language courses continue development of speaking and listening skills and stress growth in the areas of reading, composition, and cultural awareness. Students may be required to do additional work with a foreign language teaching assistant, audio-visual media, or computer-assisted practice.

## Advanced Courses

Advanced courses are at the 300 -level and 400 -level courses. Courses are offered in rotation and address culture, literature, language analysis, linguistics, business, politics, society, and cinema. All courses emphasize conversation, composition, and reading skills within a cultural context. Lectures and assignments are in the target language.
Please refer to the back of the catalog for individual course descriptions and prerequisites.

## Bachelor of Arts

## INTERNATIONAL STUDIES

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
.
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
-
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-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (48 Hours)
In addition to course requirements, majors must study abroad for one semester or complete a semester-long internship.

ECON 101: Principles of Macroeconomics (3 hrs)
ETH 100: Social Justice Theories (3 hrs)
FLC 360: Language and Intercultural Competence (3 hrs)
PH 195: Global Health Issues (3 hrs)
ENGL 340: Contemporary World Literature (3 hrs)
Complete one course from:
PSCI 100: World Politics (3 hrs)
Complete one course from:
QM 227: Introduction to Statistics (3 hrs)
PSCI 318: Research Methods in Political Science (3 hrs)
SOC 343: Social Research Methods (3 hrs)
Area Concentration - 15 hours from one area

## LANGUAGE REQUIREMENTS

Complete three years of college-level competency in one foreign language or two years of college-level competency in two foreign languages.

ADDITIONAL MAJOR REQUIREMENTS
Complete one of the following:
BRIT 282 and BRIT 382: The British Experience
If the student can't go to Harlaxton, she/he will replace those credits by taking more credits in her/his concentration area.
Free Electives (22 hours)

39 Hours of 300/400 level courses

## AREA CONCENTRATIONS

Complete 15 hrs from one area. No more than two courses may be selected from one area and courses used to satisfy the core requirement may not be used to satisfy the area concentration.

## World Politics Concentration

PSCI 190/290/390 Topics in Politics (3 hrs)
PSCI 320 Comparative Politics Seminar (3 hrs)
PSCI 343 Politics \& the Media ( 3 hrs .)
PSCI 360 Politics of Middle East (3 hrs)
PSCI 361 US Foreign Policy (3 hrs)
PSCI 362 International Security (3 hrs)
PSCI 363International Law and Organization (3 hrs)
PSCI 369: Terrorism and Counterterrorism (3 hrs)
PSCI 376 Historical and Contemporary Political Thought (3 hrs)
PSCI 380 LatinAmerican Politics(3 hrs)
PSCI H385 Modern British Politics (3 hrs)
PSCI 435 Human Rights (3 hrs)

PSCI 489 European Politics (3 hrs)
PSCI 459 Asian Politics (3 hrs)
PSCl 461Politics of the Global Economy (3 hrs)
PSCI 490: Topics in Politics (3 hrs)
PSCI 495 Senior Seminar in Political Science (3hrs)

International Business Concentration
ACCT 210 Introduction to Financial Accounting (3 hrs.)
ACCT 347 International Accounting (3 hrs)
ECON 102 Principles of Microeconomics (3 hrs)
ECON 425 International Trade (3 hrs)
ECON 435 International Monetary Economics (3 hrs)
LSCM 315 Introduction to Logistics and Supply Chain (3 hrs)
LSCM 350 Humanitarian Logistics (3 hrs)
LSCM 360 Global Logistics (3 hrs)
MGT 331 International Business Strategy ( 3 hrs )
MGT 392 Managing Global Relationships (3 hrs)
MKT 477 International Marketing (3 hrs)
BUS 365 Contemporary European Business (3 hrs)
FIN426: International Financial Management (3 hrs)

Global Health Concentration
SPAN 325 Medical Spanish (3 hrs)
SPAN 350 Medical Spanish II (3 hrs)
SOC 386 Death and Dying (3 hrs)
SOC 337 Social Aspects of Health and Health Care (3 hrs)
HSA 405 Health Care Systems (3 hrs)
PH 360 Community health and social justice (3 hrs)
COMM 410 Health Communication (3 hrs)
HSA 406 Jurisprudence/Ethics Health Care (3 hrs)

International History Concentration
HIST 111 World History to 1500 (3 hrs)
HIST 112 World History since 1500 (3 hrs)
HIST 317 Napolean to Bismarck Europe ( 3 hrs )
HIST 318 First World War) (3 hrs)
HIST 319 Second World War (3 hrs)
HIST 438 War, Death and Memory (3 hrs)
HIST 381 Modern Britain (3 hrs)
HIST 383 Modern Scotland (3 hrs)
HIST 322 The French Revolution (3 hrs)
HIST 323 US and the Middle East (3 hrs)
HIST 345 US Foreign Policy since 1776 ( 3 hrs )
HIST 379 Africa and British Imperialism (3 hrs)
HIST 450 Decolonization of Africa (3 hrs)
HIST 349 Cold War (3 hrs)
ID H290 Britain and Europe (3 hrs)
ID H365 Issues in Contemporary Britain (3 hrs)
GEOG 120 World Regional Geography (3 hrs)
GEOG 240 Cultural Geography (3 hrs)
World Culture Concentration
SPAN 320 Social Issues in Hispanic Societ (3 hrs)
SPAN 321 Introduction to Hispanic Literature (3 hrs)
SPAN 333 Introduction to Hispanic Culture (3 hrs)
SPAN 433 Hispanic Civilization (3 hrs)
SPAN 438 Spanish Seminar (3 hrs)

SPAN 458 Introduction to Hispanic Pragmatics (3 hrs)
SPAN 450 Introduction to Hispanic Linguistics (3 hrs)
FRENCH 315 Introduction French Literature (3 hrs)
FRENCH 316 Quebec/Francophone Studies (3 hrs)
FRENCH 317 Introduction to French Theater (3 hrs)
FRENCH 318 Translation (3 hrs.)
FRENCH 33 Introduction to French/Francophone Cultures (3 hrs)
FRENCH 415 Topic in French Literature (3 hrs)
FRENCH 434 French Civilization (3 hrs)
FRENCH 438 French Seminar (3 hrs)
GERM 312 Topics in German Studies (3 hrs)
GERM 321 Survey of German Literature to 1830 ( 3 hrs .)
GERM 322 Survey of German Literature ( 3 hrs )
GERM 333 Introduction to German Culture (3 hrs)
GERM 414 20th, 21st Century Literature ( 3 hrs )
GERM 433 German Civilization (3 hrs)
ID 220 The Holocaust Revisited (3 hrs)
ID 200 International Cinema (3 hrs)
TESL 200 Second Language Acquisition (3 hrs)
COMM 380 Intro to Intercultural Communication (3 hrs)
COMM 488 World Media Systems (3)
GEOG 240 Cultural Geography (3 hrs)
FLC 201 International Road Film (3 hrs)
FLC 230 Ethnic/Racial Representations (3 hrs)
FLC 301 Topics in German, Austrian, Swiss Studies
FLC 333 Topics in Diaspora Studies
FLC 361 Global Citizenship (3 hrs)
FLC 401 Senior Seminar (3 hrs)
FLC 420 Foreign Languages \& Cultures Internship (1-3 hrs)
ENG 223 World Classics (3 hrs)
ENG 344 Masterpieces of Russian Literature (3 hrs)
ANTH 207 Cultural Anthropology (3 hrs.)
ANTH 319 Peoples of Africa ( ( 3 hrs .)
ANTH 416 Human Evolution (3 hrs.)
ARCH 100 Great Discoveries in Archaeology (3 hrs)
ARCH 105 Introduction to Greek Archaeology (3 hrs)
ARCH 106 Introduction to Roman Archaeology (3 hrs)
ARCH 206 Introduction to Near Eastern Archaeology (3 hrs)
ARCH 207 Introduction to Egyptian Archaeology (3 hrs)
Global Civic Engagement/Global Social Justice
PSYC 431 Stereotyping, racism and prejudice (3 hrs)
PSYC 416 Human sexuality (3 hrs)
SOC 230 Social problems in the Modern World (3 hrs)
SOC 415 Globalization and Environment (3 hrs)
FLC 230 Ethic/Racial Representations (3 hrs)
REL 201 Religious Ethics (3 hrs)
REL 375 Religion, Gender and Culture (3 hrs)
ANTH 453 Anthropology of Religion (3)
ETH 200 Social Justice Movements (3 hrs)
PSCI 440 Environmental Law \& Policy (3 hrs.)
ES 440 Environmental Law/Regul Proc ( 3hrs.)
CJ 420 International Crime \& Justice ( 3 hrs .)
PH 360 Community health and social justice ( 3 hrs )

This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time. Please see the automated degree audit on Student Planning for the most up-to-date program information.

## Bachelor of Arts

## SPANISH

2018-2019| 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: Linguistic and Cultural Competence in Language

- SPAN 111: Elementary Spanish I (3 hrs)
- SPAN 112: Elementary Spanish II (3 hrs)
- SPAN 211: Intermediate Spanish I (3 hrs)
- SPAN 212: Intermediate Spanish II (3 hrs)

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- FLC 401 - Language/Culture/Literature

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
Courses below also satisfy Outcome 6 of the Enduring Foundations General Education program. At least 6 hours of coursework must be taken in the target language in an approved study abroad program. It is highly recommended that student complete more than the six hours minimum.

SPAN 312: Conversation and Composition ( 3 hrs )*must be at UE SPAN 321: Intro to Hispanic Literature ( 3 hrs )* must be at UE

Complete one course from (must be taken at UE):
SPAN 410: Spanish Practical Phonetics (3 hrs)
SPAN 450: Introduction to Spanish Linguistics (3 hrs)
SPAN 458: Introduction to Hispanic Pragmatics (3 hrs)
Complete 12 hours from 300 level Spanish:
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Complete 9 hours from 400 level Spanish:
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Complete a second language through 112 level:
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Free Elective (37 hours)

39 Hours of 300/400 level courses

NOTES

- Majors are required to complete the ACE certificate through career services before the end of their senior year.
- All majors (even double majors or double degrees) must take FLC 401 including the senior portfolio. This course is taught in Englishanddoes notcounttowardsthe 400 -level requirement. The prerequisite for this course is a literature course taken at UE.
- FLC 420 ( $1-3$ credits) and internships abroad as well as in the US will count if they meet the target language requirements.
- A linguistics course taken at UE is required.


## Bachelor of Arts

## SPANISH - MEDICAL SPANISH SPECIALIZATION

2018-2019| 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: Linguistic and Cultural Competence in Language

- SPAN 111: Elementary Spanish I (3 hrs)
- SPAN 112: Elementary Spanish II (3 hrs)
- SPAN 211: Intermediate Spanish I (3 hrs)
- SPAN 212: Intermediate Spanish II (3 hrs)

Outcome 7: (3 hrs) Quantitative Literacy
.
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- FLC 401: Language/Culture/Literature

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (39 hours)
At least 6 hours of coursework must be taken in the target language
inanapprovedstudyabroad program.Itishighly recommendedthat
student complete more than the six hours minimum.
SPAN 312: Conversation and Composition (3 hrs)
SPAN 321: Intro to Hispanic Literature (3 hrs)*must be at UE
SPAN 325: Medical Spanish I (3 hrs)*must be at UE
SPAN 350: Medical Spanish II (3 hrs)*must be at UE
Complete one course from (must be taken at UE):
SPAN 410: Spanish Practical Phonetics (3 hrs)
SPAN 450: Introduction to Spanish Linguistics (3 hrs)
SPAN 458: Introduction to Hispanic Pragmatics (3 hrs)
Complete 3 hours from the following:
COMM 410: Health Communication (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
FLC 420: Foreign Languages and Cultures (1-3 hrs)
HSA 405: Health Care Systems Issues and Trends (3 hrs)
PH 190: Introduction to Public Health (3 hrs)
PH 195: Global Health Issues (3 hrs)
SOC 337: Social Aspects of Health and Health Care (3 hrs)
CHNG course taught by FLC faculty and medical related (3 hrs)
Complete 3 hours from 300-level Spanish:
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Complete 12 hours from 400-level Spanish:
    .
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    .
Complete a second language through 112-level:
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Free Elective (34 hours)

39 Hours of 300/400 level courses

NOTES

- Majors are required to complete the ACE certificate through career services before the end of their senior year.
- All majors (even double majors or double degrees) must take FLC 401 including the senior portfolio. This course is taught in Englishanddoes notcounttowardsthe400-level requirement. The prerequisite for this course is a literature course taken at UE.
- A linguistics course taken at UE is required.


## Bachelor of Science

## SPANISH EDUCATION

2023-2024 | 130 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language

- SPAN 111: Elementary Spanish I (3 hrs)
- SPAN 112: Elementary Spanish II (3 hrs)

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- FLC 401 - Language/Culture/Literature

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 83 hours)
Professional Education Requirements
PSYC 226 - Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar ( 2 hr )
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3
hrs)
EDUC 454: Methods of Teaching Foreign Lang. SH/JH/MS (2 hrs)
Spanish Requirements
SPAN 211: Intermediate Spanish I (3 hrs)
SPAN 212: Intermediate Spanish II (3 hrs)
Complete 15 hours from:
SPAN 312: Conversation and Composition (3 hrs)
SPAN 314: Business Spanish (3 hrs)
SPAN 320: Social Issues in Hispanic Society (3 hrs)
SPAN 321: Introduction to Hispanic Literature (3 hrs)
SPAN 333: Introduction to Hispanic Culture (3 hrs)
SPAN 335: Foreign Language Study Abroad*
SPAN 350: Medical Spanish II (3 hrs)
SPAN 435: Foreign Language Study Abroad*
*SPAN 335 and 435 may repeated with content change.
Complete 12 hours from:
SPAN 410: Spanish Practical Phonetics (3 hrs)
SPAN 411: Advanced Spanish Grammar (3 hrs)
SPAN 433: Hispanic Civilization (3 hrs)
SPAN 438: Spanish Seminar (3 hrs)*
SPAN 450: Introduction to Spanish Linguistics (3 hrs)
SPAN 458: Introduction to Hispanic Pragmatics (3 hrs)
FL 420: Foreign Language Internship (3-6 hrs)
*SPAN 438 may repeated with content change.
Complete a second language through 112 level:
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Elective Credit (5 hours)

39 Hours of 300/400 level courses

# Gender and Women's Studies Minor 

The Gender and Women's Studies minor has two major goals: offer an interdisciplinary program of study in GWS and to promote the understanding of gender and women's issues in an informed curriculum that reflects new scholarship and applications. The objective of the gender and women's studies minor is to encourage students to analyze the roles, perspectives, and contributions of women and to examine the influences of gender on historic and contemporary life. Through examining women's history, present conditions, and future possibilities, students will come to understand how gender is socially constructed. The curriculum consists of three categories of courses: (1) department courses that take women or gender as their primary focus, are based on recent scholarship, are interdisciplinary in nature, and are offered directly by the gender and women's studies program; (2) core courses offered by academic departments that take women or gender as their primary focus and are based on recent scholarship; and (3) affiliated courses which are not gender and women's studies courses but have significant gender and women's studies content.

## Harlaxton College in Grantham, England

The British studies course at Harlaxton College includes lectures and seminar discussions on roles of women and other gender-related issues in successive epochs of British and European history. The opportunity for travel and observation of gender and women's issues, conditions, and opportunities is rich at Harlaxton.
Gender and Women's Studies Minor (18 hours)
Gender and women's studies minors must pursue a major in a primary discipline.
Curriculum: GWS 101 and five additional courses from department, core, and affiliated courses; at least two of the five additional courses must be from either department or core courses
Department Courses
Gender and Women's Studies 101, 492, 493
New courses meeting the criteria of either core or affiliated may be added for inclusion in the program. Certain departmental special topics courses, approved for women's studies, may also be included within the course of study. The following are tentative offerings. Please consult the class schedule for current approved offerings.
Core Courses
(See the appropriate department for course descriptions.)
ARCH 415, ARTH 492*, HIST 320, 380*, 428; LS 420, PSCI 326, REL 340, 375, SOC 335, 435, SPAN 438*. *These courses can be repeated with a change in topic.

## Affiliated Courses

(See the appropriate department for course descriptions.)
ANTH 207, ENGL 348, ETH 301, HIST 418, 380*, ID 255, PHIL 317, 321, PSYC 229, REL 305, 345, SOC 350, 438, 460, THTR 395. CHNG 310-05, ENGL 223, ETH 100, ETH 200, PSYC 431, THTR $364^{*}$ These courses can be repeated with change in topic.

# History, Politics, and Social Change 

Faculty: Byrne, Green (Harlaxton), MacLeod (Chair), Stein, Dion

## Bachelor of Arts or Bachelor of Science with a Major in Ethics and Social Change

Bachelor of Arts with a Major in History

Bachelor of Arts or Bachelor of Science with a Major in History Education

> Bachelor of Arts or Bachelor of Science with a Major in Political Science

The main objective of study in history is to acquire an understanding and an appreciation of the historical world in which we live. History courses explore the past so that students will be better equipped to explain the complexities of the world in our time through exploring the characteristics and impact of each age in the past. The ultimate goal is to help students understand the problems they face, appreciate the richness of the human experience, and act with reason and judgment.

Students with a degree in history will be proficient in the areas of analysis, critical thinking, finding and using evidence, and both written and oral communication skills. Earning the degree is excellent preparation for graduate studies in history or related fields as well as for law school. Additionally, history majors will also be prepared for careers in diverse areas such as education, business, government, politics, or journalism.

These goals can also be advanced through a semester of study at Harlaxton College or a similar study abroad program. History courses are offered each semester at Harlaxton (see www.harlaxton.evansville.edu). This is a wonderful opportunity not just to study history in class, but also to visit the very sites where many important historical events took place. It is possible, with advanced planning, to spend a semester abroad and still complete all degree requirements within four years.

Political Science is an academic discipline that seeks to understand the exercise of power in a variety of settings. The discipline is organized into four main areas of study, or subfields such as American Politics, Comparative Politics, International Relations, and Political Theory. Political Science makes students good candidates for a job in almost any area, including business, finance, consulting, government work, the foreign service, and teaching. Political Science is also a good credential for those who plan to apply for graduate education in law, business, social work, education, international affairs, political science itself, or other social sciences.

The ethics and social change major combines academic study with field experience in order to equip students to address complex problems in local communities and the world. The program takes a multidisciplinary approach to allow students to complement an ethics core with concentrations in two other areas, thereby facilitating a possible double major with one of the two areas of concentration. Students may choose from a variety of concentration pairings to create a program tailored to individual values and interests. Fieldwork is built directly into the curriculum providing ample opportunities to get involved and make a real difference in the world.

## Bachelor of Arts in History Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.

## Bachelor of Science in History Education

successful completion of this degree qualifies students for teacher certification in Indiana and most other states.

History Minor (21 hours)
Seven courses in history (no more than two at the 100 level and at least one at the 400 level)

Students majoring in a variety of disciplines (e.g. business, communication, political science, or pre-law) will find history courses relevant to their studies and are encouraged to consider taking a history minor.

Ethics Minor (18 hours)
Ethics 121 or Philosophy 121; Religion 201 (both of these entrylevel courses must be completed with a grade of B- or above); Ethics 499; Three courses from: Communication 485; Criminal Justice 440; Exercise and Sport Science 310; Health Services Administration 406; History 438; Philosophy 241, 316, 317, 321, 450, 301 or 459 (dependent on topic); Religion 305, 350, 445. Other courses may apply with the approval of the director of the program.
Ethics and Social Change Minor (18 hours)
Choose two of the following: ETH-100, ETH-200, and ETH 201; ETH-300; CHNG-310 Ethics and Social Change Action Project (3x; 1 credit hour each); Choose one of the following: CHNG 301, PSYC 265, LDR 425, CHNG 310 (Community Race Project or Project Citizen); Any CHNG 310.

## Political Science Minor (18 hours)

Political Science 100, 143, 160; Political Science 376; one course from Political Science 320, 360, 361, 362, 363, 369, 380, 435, 459, 461, 489; one course from Political Science 312, 313, 326, 343, 344, 345, 349.

## Race and Ethnicity Studies Minor

An interdisciplinary minor in which students critically examine the complexity and constructions of race and ethnicity in different socio-historical and cultural contexts. The minor includes experiential education in which direct experience with racial/ ethnic issues is supported by critical analysis. Students complete a common core and work with an advisor to select from a range of elective courses which include options in the humanities, social sciences, education, and public health. The minor prepares students from a wide variety of majors to engage an increasingly diverse world as informed, ethical citizens.

The Race and Ethnicity Studies minor requires the completion of 18 credit hours consisting of a common core, experiential education, and two electives.

Religion 275, Psychology 431, Sociology 438; 3 hours of antibias workshop or pre-approved Changelab class, internship or undergradate research; and 6 hours of elective courses from Anthropology 310, 315, 319, Communication 380, Education 385, English 361, Ethics 200, French 333, Gender and Womens Studies 101, History 321, 323, 343, 349, Publich Health 360, Philisophy 321, 450, Psychology 229, Religion 120, 305, 345, Race and Ethnicity Studies 492, 493, Spanish 333, 320, or 433.

## Bachelor of Arts

## ETHICS AND SOCIAL CHANGE

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
.
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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Outcome 7:Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Introduction to Sociology (3 hrs)* or PSCI-143 American National Government and Politics (3 hrs)
.
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
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Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- ETH 499: Ethics and Social Change (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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39 Hours of 300/400 level courses
NOTES

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- All majors (even double majors or double degrees) must take ETH 499.


## Bachelor of Science

## ETHICS AND SOCIAL CHANGE

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
.
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Introduction to Sociology (3 hrs)* or

PSCI-143 American National Government and Politics (3 hrs)
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- ETH 499: Ethics and Social Change (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hours)
CHNG 101: Transformative Action (3 hrs))
ETH 100: Social Justice Theories (3 hrs)
ETH 200: Social Justice Movements (3 hrs)
ETH 201: Comparative Religious Ethics (3 hrs)
ETH 300: Writing for Social Justice and Social Change (3 hrs)
Complete 6 hrs of ChangeLab
CHNG 310: Ethics and Social Change Action Project
Complete one of the following:
PSCI 326: Women and American Politics (3 hrs)
REI 275: Race and Religion (2 hrs)
REL 375: REligion, Gender, and Culture (3 hrs)
SOC-435: Sex, Gender and Sexualities (3 hrs)
SOC 438: Race and Ethnic Relations (3 hrs)
Complete one course from:
CHNG 310: Community Race Project (3 hrs)
CHNG 310: Project Citizen (3 hours)
Complete one course from:
PSCY 265: Applied Creativity (3 hrs)
LDR 425: Design Thinking for Org Change (3 hrs)
Complete 6 hours from ChnageLab 310 or ETH-375 and ETH 475
Concentration Requirement
Students must complete two concentrations of 15 hours each in
consultation with the Director of the Ethics Program or an ESC
advisor (36 hours total). See Student Planning for Specific courses
that may apply toward the concentration. Concentration options
include:

- Business Administration
- Cognitive Science
- Communication
- Criminal Justice
- Environmental Studies
- Gender and Women's Studies
- Legal Studies
- Political Science
- Psychology
- Race and Ethnicity Studies
- Sociology or Social Work (not both)
Col

Free Electives (25 hours)

39 Hours of 300/400 level courses
NOTES

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- All majors (even double majors or double degrees) must take ETH 499.


## Bachelor of Arts

## HISTORY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language

Complete courses or proficiency through the 212 level.
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- HIST 490 - Senior Seminar in History

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
HIST 290: Approaches to History (3 hrs)

Complete 9 hours of HIST

- No more than 6 hrs from 100 level courses
- No more than 3 hours from HIST 492

Complete 9 hours from:
HIST 311: The Greeks and the East (3 hrs)
HIST 312: The Evolution of Rome (3 hrs)
HIST 313: Medieval Europe 410-1350 (3 hrs)
HIST 314: Renaissance and Reformations: Europe 1350-1648 (3
hrs)
HIST 317: Europe 1800-1890 (3 hrs)
HIST 318: The First World War (3 hrs)
HIST 319: Second World War (3 hrs)
HIST 320: Women's Lives Before Modern Age (3 hrs)
HIST 321: Islam/West in Middle Ages (3 hrs)
HIST 322: French Revolution (3 hrs)
HIST 324: Modern China \& Japan Fr 1660 (3 hrs)
HIST H378: Britain and Mid East to 1922 (3 hrs)
HIST H379: Africa and British Imperialism (3 hrs)
HIST 381: Modern Britain 1815-Present (3 hrs)
HIST 383: Modern Scotland, 1707-Today (3 hrs)
HIST 385: Ireland and the Irish Diaspora (3 hrs)
HIST 418: War, Politics, \& Gender (3 hrs)
HIST 438: War, Death, Memory 1914-39 (3 hrs)
HIST 450: Decolonization Africa 1919-90 (3 hrs)
Complete 9 hours from:
HIST 323: US \& Middle East 1919-Present (3 hrs)
HIST 340: Crime/Punishment/Law in Early Amer (3 hrs)
HIST 341: Class, Comm, Race Col N Amer (3 hrs)
HIST 343: Civil War \& Reconstruction (3 hrs)
HIST 344: The American Revolution (3 hrs)
HIST 345: US Foreign Policy Since 1776 (3 hrs)
HIST 348: Great Crash / Depression (3 hrs)
HIST 349: Cold War America: 1945-1990 (3 hrs)
HIST 351: Atlantic World Since 1492 (3 hrs)
HIST 354: History of the Caribbean to 1900 ( 3 hrs )
HIST 428: Family Conflict 19th Century America (3 hrs)
HIST 429: Rural Life Europe/North America (3 hrs)
Complete 6 hours from 400 level HIST (may not include HIST 490 or 492)
-
Free Electives (37 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## HISTORY - EDUCATION

2018-2019 | 128 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

- HIST 111, HIST 112, HIST 141, or HIST 142

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- HIST 490: Senior Seminar in History

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (72 hours)
Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)

EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar ( 2 hr )
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 461 Methods of Teaching Social Studies SH/JH/MS (2 hrs)
History Requirements
HIST 290: Approaches to History (3 hrs)
Complete one course from:
HIST 141: American History to 1865 (3 hrs)
HIST 142: American History since 1865 (3 hrs)
Complete one course from:
HIST 111: World History to 1500 (3 hrs)
HIST 112: World History since 1500 (3 hrs)
Complete three courses from:
HIST 313: Medieval Europe 410-1350 (3 hrs)
HIST 314: Modern West: Europe 1350-1648 (3 hrs)
HIST 317: Europe 1800-1890 (3 hrs)
HIST 318: The First World War (3 hrs)
HIST 319: Second World War (3 hrs)
HIST 320: Women's Lives Before Modern Age (3 hrs)
HIST 321: West/Islam in Middle Ages (3 hrs)
HIST 322: French Revolution (3 hrs)
HIST 324: Modern China \& Japan Fr 1660 (3 hrs)
HIST H378: Britain and Mid East to 1922 (3 hrs)
HIST H379: Africa and British Imperialism (3 hrs)
HIST 381: Modern Britain 1815-Present (3 hrs)
HIST 383: Modern Scotland, 1707-Today (3 hrs)
HIST 418: War, Politics, \& Gender (3 hrs)
HIST 438: War, Death, Memory 1914-39 (3 hrs)
HIST 450: Decolonization Africa 1919-90 (3 hrs)
HIST 482: Ireland 1700-1925 (3 hrs)
Complete three courses from:
HIST 323: US \& Middle East 1919-Present (3 hrs)
HIST 341: Class, Comm, Race Col N Amer (3 hrs)
HIST 343: Civil War \& Reconstruction (3 hrs)
HIST 345: US Foreign Policy Since 1776 (3 hrs)
HIST 348: Great Crash / Depression (3 hrs)
HIST 349: Cold War America: 1945-1990 (3 hrs)
HIST 352: Dictatorship/Democracy Latin America (3 hrs)
HIST 353: Mexico: Conquest to Present (3 hrs)
HIST 448: Mexican Revolution, 1911-1917 (3 hrs)
Complete 6 hours from 400 level HIST (may not include HIST 490 or 492).
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Social Studies Concentration
History Education majors must complete a concentration in either
Economics, Political Science, Psychology, Sociology, or General
Social Studies. Complete one of the following:
Economics
ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
ECON 300/400 level elective (3 hrs)
Political Science
PSCI 100: World Politics (3 hrs) or
PSCI 160: Intro to International Relations (3 hrs)
PSCI 143: American National Government and Politics (3 hrs)

PSCI 300/400 level elective (3 hrs)
Psychology
PSYC 121: Introduction to Psychology (3 hrs) or
PSYC 226: Child \& Adolescent Psychology (3 hrs)
PSYC 229: Social Psychology (3 hrs)
PSYC 259: Abnormal Psychology (3 hrs)

Sociology
SOC 105: Introduction to Sociology (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 300/400 level elective (3 hrs)

General Social Studies
Complete one course from three of the four disciplines:

1. Economics

ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
ECON 300/400 elective (3 hrs)
2. Political Science

PSCI 100: World Politics (3 hrs)
PSCI 143: American National Government and Politics (3 hrs)
PSCI 160: Intro to International Relations (3 hrs)
Any 300/400 PSCl elective (3 hrs)
3. Psychology

PSYC 121: Introduction to Psychology (3 hrs)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
PSYC 229: Social Psychology (3 hrs)
PSYC 259: Abnormal Psychology (3 hrs)

## 4. Sociology

SOC 105: Introduction to Sociology (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
Any 300/400 SOC elective (3 hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## HISTORY EDUCATION

2023-2024 | 122 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

- HIST 111, HIST 112, HIST 141, or HIST 142

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- HIST 490: Senior Seminar in History

Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (78 hours)
Professional Education Requirements
PSYC 226 - Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar (1 hr)

EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School
(3 hrs)
EDUC 461 Methods of Teaching Social Studies SH/JH/MS (2 hrs)
History Requirements
HIST 290: Approaches to History (3 hrs)
Complete one course from:
HIST 141: American History to 1865 (3 hrs)
HIST 142: American History since 1865 (3 hrs)
Complete one course from:
HIST 111: World History to 1500 (3 hrs)
HIST 112: World History since 1500 (3 hrs)
Complete three courses from:
HIST 313: Medieval Europe 410-1350 (3 hrs)
HIST 314: Modern West: Europe 1350-1648 (3 hrs)
HIST 317: Europe 1800-1890 (3 hrs)
HIST 318: The First World War (3 hrs)
HIST 319: Second World War (3 hrs)
HIST 320: Women's Lives Before Modern Age (3 hrs)
HIST 321: West/Islam in Middle Ages (3 hrs)
HIST 322: French Revolution (3 hrs)
HIST 324: Modern China \& Japan Fr 1660 (3 hrs)
HIST H378: Britain and Mid East to 1922 (3 hrs)
HIST H379: Africa and British Imperialism (3 hrs)
HIST 381: Modern Britain 1815-Present (3 hrs)
HIST 383: Modern Scotland, 1707-Today (3 hrs)
HIST 418: War, Politics, \& Gender (3 hrs)
HIST 438: War, Death, Memory 1914-39 (3 hrs)
HIST 450: Decolonization Africa 1919-90 (3 hrs)
HIST 482: Ireland 1700-1925 (3 hrs)
Complete three courses from:
HIST 323: US \& Middle East 1919-Present (3 hrs)
HIST 341: Class, Comm, Race Col N Amer (3 hrs)
HIST 343: Civil War \& Reconstruction (3 hrs)
HIST 345: US Foreign Policy Since 1776 (3 hrs)
HIST 348: Great Crash / Depression (3 hrs)
HIST 349: Cold War America: 1945-1990 (3 hrs)
HIST 352: Dictatorship/Democracy Latin America (3 hrs)
HIST 353: Mexico: Conquest to Present (3 hrs)
HIST 448: Mexican Revolution, 1911-1917 (3 hrs)
6 hours from 400 level HIST. May not include HIST 490 or 492.
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Social Studies Concentration
History Education majors must complete a concentration in either
Economics, Political Science, Psychology, Sociology, or General
Social Studies. Complete one of the following:
Economics
ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
ECON 300/400 level elective (3 hrs)

Political Science
PSCI 100: World Politics (3 hrs) or
PSCI 160: Intro to International Relations (3 hrs)
PSCI 143: American National Government and Politics (3 hrs)

PSCI 300/400 level elective (3 hrs)
Psychology
PSYC 121: Introduction to Psychology (3 hrs) or
PSYC 226: Child \& Adolescent Psychology (3 hrs)
PSYC 229: Social Psychology (3 hrs)
PSYC 259: Abnormal Psychology (3 hrs)

Sociology
SOC 105: Introduction to Sociology (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 300/400 level elective (3 hrs)

General Social Studies
Complete one course from three of the four disciplines:

1. Economics

ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
ECON 300/400 elective (3 hrs)
2. Political Science

PSCI 100: World Politics (3 hrs)
PSCI 143: American National Government and Politics (3 hrs)
PSCI 160: Intro to International Relations (3 hrs)
Any 300/400 PSCl elective (3 hrs)
3. Psychology

PSYC 121: Introduction to Psychology (3 hrs)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
PSYC 229: Social Psychology (3 hrs)
PSYC 259: Abnormal Psychology (3 hrs)

## 4. Sociology

SOC 105: Introduction to Sociology (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
Any 300/400 SOC elective (3 hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## POLITICAL SCIENCE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: ( 6 hrs ) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
$\cdot$
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- PSCI 495: Senior Seminar in Political Science

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (36 hours)
PSCI 100: World Politics (3 hrs)
PSCI 143: American Nat'I Govt \& Politics (3 hrs)
PSCI 160: Introduction to International Relations (3 hrs)
PSCI 318: Research Methods in Political Science (3 hrs)
PSCI 376: History of Contemporary Political Thought (3 hrs)
PSCI 495: Senior Seminar Political Science (3 hrs)
Complete 3 hours from - American Politics:
PSCI 312: Political Parties/Elections (3 hrs)
PSCI 313: Congress \& Legislative Process (3 hrs)
PSCI 326: Women \& American Politics (3 hrs)
PSCI 343: Politics \& the Media (3 hrs)
PSCI 344: Political Opinion \& Behavior (3 hrs)
PSCI 345: American Constitutional Law (3 hrs)
PSCI 349: State \& Local Government (3 hrs)
Complete 3 hours from International Relations:
PSCI 361: U.S. Foreign Policy (3 hrs)
PSCI 362: International Security (3 hrs)
PSCI 363: Int'I Law \& Organization (3 hrs)
PSCI 369: Terrorism and Counterterrorism (3 hrs)
PSCI 435: Human Rights Seminar (3 hrs)
PSCI 440: Environmental Law \& Policy (3 hrs)
PSCI 461: Politics of Global Economy (3 hrs)
Complete 3 hours from - Comparative Politics:
PSCI 320: Comparative Politics Seminar (3 hrs)
PSCI 360: Politics of the Middle East (3 hrs)
PSCI 380: Latin American Politics (3 hrs)
PSCI H385: Modern British Politics (3 hrs)
PSCI 459: Asian Politics (3 hrs)
PSCI 489: European Politics (3 hrs)
Political Science Electives (9 hours)
-
-
-
Free Electives (43 hours)

39 Hours of 300/400 level courses

## Bachelor of Art

## POLITICAL SCIENCE

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: ( 12 hrs ) Linguistic and Cultural Competence in Language.
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- PSCI 495: Senior Seminar in Political Science

Overlay: Writing Across the Curriculum (4 courses)
-
-
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-

Major Requirements (36 hours)
PSCI 100: World Politics (3 hrs)
PSCI 143: American Nat'I Govt \& Politics (3 hrs)
PSCI 160: Intro International Relations (3 hrs)
PSCI 318: Research Methods in Political Science (3 hrs)
PSCI 376: History of Contemporary Political Thought (3 hrs)
PSCI 495: Senior Seminar Political Science (3 hrs)
Complete 3 hours from - American Politics:
PSCI 312: Political Parties/Elections (3 hrs)
PSCI 313: Congress \& Legislative Process (3 hrs)
PSCI 326: Women \& American Politics (3 hrs)
PSCI 343: Politics \& the Media (3 hrs)
PSCI 344: Political Opinion \& Behavior (3 hrs)
PSCI 345: American Constitutional Law (3 hrs)
PSCI 349: State \& Local Government (3 hrs)
Complete 3 hours from International Relations:
PSCI 361: U.S. Foreign Policy (3 hrs)
PSCI 362: International Security (3 hrs)
PSCl 363: Int'l Law \& Organization (3 hrs)
PSCI 369: Terrorism and Counterterrorism (3 hrs)
PSCI 435: Human Rights Seminar (3 hrs)
PSCI 440: Environmental Law \& Policy (3 hrs)
PSCI 461: Politics of Global Economy (3 hrs)
Complete 3 hours from - Comparative Politics:
PSCI 320: Comparative Politics Seminar (3 hrs)
PSCI 360: Politics of the Middle East (3 hrs)
PSCI 380: Latin American Politics (3 hrs)
PSCI H385: Modern British Politics (3 hrs)
PSCl 459: Asian Politics (3 hrs)
PSCI 489: European Politics (3 hrs)
Political Science Electives (9 hours)
-
-
-
Free Electives (37 hours)
39 Hours of 300/400 level courses

## Interdisciplinary Studies

## Bachelor of Arts or Bachelor of Science with a Major in Interdisciplinary Studies

The interdisciplinary studies major allows students more flexibility in designing their major than any other program. Within an interdisciplinary studies major, students select courses that either more precisely meet their professional or personal educational goals or anticipate future trends in employment markets.

An interdisciplinary studies major consists of an integrated series of courses selected from at least two established University academic disciplines. An advisor from each academic discipline will be assigned to the student, with one primary advisor chosen by the advisors in each discipline and the student. Students will devise, in consultation with their academic advisors, an academic program suited to an area of special interest. Because the student must be involved in planning this major, the student will need to think critically about personal and professional goals and articulate reasons for pursuing this major. Although in principle any area of academic investigation may constitute the subject of an interdisciplinary studies major, such a major would ordinarily be defined in one of three ways:

- An area of the world, geographically, politically, or culturally prescribed, such as American Studies, Latin American Studies, Asian Studies, European Studies, British Studies;
- A period of time in history of some part of the world such as the Enlightenment, the Renaissance, the Middle Ages; or
- A specific problem that is treated in several disciplines such as the concept of social justice, revolutionary movements, and the concept of energy.

The minimum credit requirement for a major in interdisciplinary studies is 39 hours selected from two established academic disciplines. It is desirable for the student to select approximately 20 hours from each discipline, but at least 15 hours must come from each discipline. More than two established academic disciplines may be chosen, but at least 15 hours must be earned from each discipline chosen. Of the total hours earned in each discipline, at least 9 hours must be in upper division courses (i.e., 300 - or 400 -level courses), and the total number of upper division hours must be at least 24 . Courses from each discipline may be chosen in consultation with advisors to meet personal and professional goals of the student. Courses should fulfill the University of Evansville writing requirements, and the proposal should address the University's learning objectives. University General Education requirements must be satisfied with courses outside any of the chosen disciplines, with the exceptions of foreign language and the senior seminar. Each candidate for a bachelor's degree with a major in interdisciplinary studies must have a GPA of at least 2.0 in the 39 hours of interdisciplinary studies major courses as well as a 2.0 GPA overall.
Students taking the interdisciplinary studies major will prepare a list of courses to be completed and a letter to the Interdisciplinary Studies subcommittee. The letter will include the student's personal and professional goals and describe how the interdisciplinary studies major will enable the student to attain those goals. The letter also will identify the student's advisors. The subcommittee will review the letter and the course plan and either approve or disapprove the plan. The subcommittee recommends that the application for the interdisciplinary studies major be completed by the end of the sophomore year to ensure that sufficient time is left for successful completion of the major. The Interdisciplinary Studies Subcommittee has final say on the integrity of the proposed major and may choose not to consider proposals submitted after the end of the sophomore year. The student may appeal the decision of the subcommittee regarding approval of a plan and review of a plan to the Admissions and Standards Committee.

The list of courses developed by the student and the advisors may include a list of courses from which the student will complete the requirements for that discipline rather than an exhaustive list of courses. For example, the list of courses from a discipline may include courses that total 24 credits, and the student must complete at least 15 credits from that list. This allows for some flexibility in scheduling without requiring a formal modification to the plan. After the plan is approved by the subcommittee and filed with the Registrar, any deviations from the plan require approval by the subcommittee.

## 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

## Additional foreign language

- 6 hours: Bachelor of Arts requires proficiency in or completion of a foreign language through the course numbered 212
An interdisciplinary studies major consists of an integrated series of courses selected from at least two established University academic disciplines. An advisor from each academic discipline will be assigned to the student, with one primary advisor chosen by the advisors in each discipline and the student. Students will devise, in consultation with their academic advisors, an academic program suited to an area of special interest. Because the student must be involved in planning this major, the student will need to think critically about personal and professional goals and articulate reasons for pursuing this major. Although in principle any area of academic investigation may constitute the subject of an interdisciplinary studies major, such a major would ordinarily be defined in one of three ways:
- An area of the world, geographically, politically, or culturally prescribed, such as American Studies, Latin American Studies, Asian Studies, European Studies, British Studies;
- A period of time in history of some part of the world such as the Enlightenment, the Renaissance, the Middle Ages; or
- A specific problem that is treated in several disciplines such as the concept of social justice, revolutionary movements, and the concept of energy.

The minimum credit requirement for a major in interdisciplinary studies is 39 hours selected from two established academic disciplines. It is desirable for the student to select approximately 20 hours from each discipline, but at least 15 hours must come from each discipline. More than two established academic disciplines may be chosen, but at least 15 hours must be earned from each discipline chosen. Of the total hours earned in each discipline, at least 9 hours must be in upper division courses (i.e., 300- or 400 -level courses), and the total number of upper division hours must be at least 24 . Courses from each discipline may be chosen in consultation with advisors to meet personal and professional goals of the student. Courses should fulfill the University of Evansville writing requirements, and the proposal should address the

University's learning objectives. University General Education requirements must be satisfied with courses outside any of the chosen disciplines, with the exceptions of foreign language and the senior seminar. Each candidate for a bachelor's degree with a major in interdisciplinary studies must have a GPA of at least 2.0 in the 39 hours of interdisciplinary studies major courses as well as a 2.0 GPA overall.

Students taking the interdisciplinary studies major will prepare a list of courses to be completed and a letter to the Interdisciplinary Studies subcommittee. The letter will include the student's personal and professional goals and describe how the interdisciplinary studies major will enable the student to attain those goals. The letter also will identify the student's advisors. The subcommittee will review the letter and the course plan and either approve or disapprove the plan. The subcommittee recommends that the application for the interdisciplinary studies major be completed by the end of the sophomore year to ensure that sufficient time is left for successful completion of the major. The Interdisciplinary Studies Subcommittee has final say on the integrity of the proposed major and may choose not to consider proposals submitted after the end of the sophomore year. The student may appeal the decision of the subcommittee regarding approval of a plan and review of a plan to the Admissions and Standards Committee.

The list of courses developed by the student and the advisors may include a list of courses from which the student will complete the requirements for that discipline rather than an exhaustive list of courses. For example, the list of courses from a discipline may include courses that total 24 credits, and the student must complete at least 15 credits from that list. This allows for some flexibility in scheduling without requiring a formal modification to the plan. After the plan is approved by the subcommittee and filed with the Registrar, any deviations from the plan require approval by the subcommittee.

# Bachelor of Science in Actuarial Science 

Bachelor of Arts or<br>Bachelor of Science with a Major in Mathematics

Bachelor of Science with a Major in Applied Mathematics

Bachelor of Science<br>with a Major in Predoctoral Mathematics

Bachelor of Science in Statistics and Data Science

## Bachelor of Science with a Major in Math Education

Courses in mathematics and statistics are designed to develop quantitative reasoning skills, conceptual understanding, computational skills, and the ability to apply mathematical and statistical techniques to address real-world problems. Students may pursue four options in Mathematics - a Bachelor of Arts with a major in mathematics, a Bachelor of Science with a major in mathematics (appropriate for students seeking certification to teach mathematics at the senior high, junior high, and middle school levels), a Bachelor of Science with a major in applied mathematics, and a Bachelor of Science with a major in predoctoral mathematics. In addition, the department offers a Bachelor of Science in Actuarial Science and a Bachelor of Science degree in Statistics and Data Science. Alternatively, students may pursue a minor in mathematics or take mathematics and statistics courses to support work in other areas.

## Mathematics

The mathematics major is designed for students seeking an exposure to advanced mathematics as part of a broad-based liberal arts curriculum. It is particularly suitable for students interested in pursuing graduate study in mathematics or related disciplines.

## Applied Mathematics

The applied mathematics major offers a firm foundation in applied mathematics by combining a rigorous program of study in mathematics with a concentration in one or more fields of application - disciplines in which mathematical tools are used to solve real-world problems. Since this program provides for both a sound mathematical education and the development of highly marketable practical skills, graduates receiving this degree are prepared for either immediate employment or continued study at the graduate level.

## Predoctoral Mathematics

The predoctoral major prepares mathematically gifted students for graduate study leading to a PhD in the mathematical sciences. The curriculum is highly advanced, with an emphasis on the development of independent learning skills. Students are expected to participate in undergraduate research and to complete the department's professional development program. Students in this program are assigned a faculty mentor who supervises all aspects of the student's academic development. Only the most highly qualified applicants are admitted to the predoctoral program.

## Statistics and Data Science

This program is grounded in the mathematically rigorous tradition of classical, applied statistics while incorporating cutting-edge techniques and tools in the emerging field of data science. The program is designed to equip students with the quantitative, technical, and communication skills necessary to tease out forward-looking, predictive insight from data to help organizations make better decisions. Statistics courses in the curriculum are project-driven, with an emphasis on the analysis of real-world data using statistical methods implemented by powerful statistical software.

## Mathematics Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.
Mathematics Minor (20 hours)
Mathematics 221,222; at leastfour mathematics courses numbered 300 or above; Engineering 390(AppliedEngineeringMathematics) andPhysics305(MathematicalPhysics) maybeapplied towards this total.
Statistics and Data Science Minor (18 hours)
Statistics 266,267,300; a programming course (such as Computer Science 205 or 210) or a computationally intensive course (such as Quantitative Methods 160) approved by the Chair of the Department of Mathematics; 6 hours of 300/400-level courses that are either applied statistics courses offered by the Mathematics Department or statistically intensive courses (such as Economics 300, Biology 415, Quantitative Methods 227)approved by the Chair of the Department of Mathematics.

Calculus Sequence
The complete calculus sequence through multivariable calculus is
Mathematics 221, 222, 323. A one-semester survey of calculus is provided by Mathematics 134. Be advised that Mathematics 134 does not satisfy the prerequisitefor Mathematics 222, and credit will notbe given for both Mathematics 134 and 221.
Credit by Examination
The Department of Mathematics adheres to the University policy on credit by examination. Students may not earn credit by examination in any mathematics course listed as prerequisite for a course in which they already have credit.

CiSM Certificate (26 hours)
The following courses are required: Biology 118 or 119, Chemistry 118, Mathematics 221, Physics 210 and 220, Statistics 166 and 266, Interdisciplinary 121 and 122, and ChangeLab 300 or Statistics 300.

## Bachelor of Science

## ACTUARIAL SCIENCE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (42 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
utcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
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-
-

Major Requirements (57 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
MATH 330: Financial Mathematics (3 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 431: Long Term Act Models I (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
Statistics courses
STAT 166: Intro to R for Data Science (1 hr)
STAT 266: Introduction to Statistics with R (3 hrs)
STAT 361: Linear Models (3 hrs)
STAT 362: Machine Learning (3 hrs)
Business courses
ACCT 210: Introduction to Financial Accounting (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
Choose two of the following three Finance courses:
FIN 427: Financial Derivatives (3 hrs)
FIN 462: Investments (3 hrs)
FIN 478: Risk Management (3 hrs)
Career development
EXED 090: Building a Professional Image (0 hrs)
Computer courses
CS 205: Programming for the Sciences OR CS 210: Fundamentals of Programming I (3 hrs) Choose one course from:
CS 215: Fundamentals of Programming II (3 hrs)
MATH 373: Numerical Methods (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
STAT 267: Experimental Design (3 hrs)
Free Electives (21 hours)
Recommended electives:
MATH 432: Long Term Act Models II (3 hrs)
STAT 493: Statistical Modeling (3 hrs)
FIN 362: Corporate Financial Policy (3 hrs)

39 Hours of 300/400 level courses

## Bachelor of Arts

## MATHEMATICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(48 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
.
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
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-
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-

Major Requirements (32 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 420: Advanced Calculus (3 hrs)
MATH 445: Abstract Algebra (3 hrs)
Complete 6 hours from 300/400 level MATH:
Complete 6 hours from computer courses:
Courses must be approved by advisor.

Free Electives (40 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## MATHEMATICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language

Major Requirements (35 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 420: Advanced Calculus (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
Complete one course from:
MATH 425: Complex Variables (3 hrs)
MATH 445: Abstract Algebra (3 hrs)
Complete 6 hours from 300/400 level MATH:
Complete 6 hours from computer courses:
Courses must be approved by advisor.

Free Electives (43 hours)

39 Hours of 300/400 level courses
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-

## Bachelor of Science

## APPLIED MATHEMATICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
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-
-

Major Requirements (53 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 373: Numerical Methods (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
Complete 6 hours of 300/400 level MATH.
-
-
Complete 6 hours of computer courses.
Courses must be approved by advisor.
-
FIELD OF APPLICATION/SPECIALIZATION
Students must select a Field of Application/Specialization from the options below. Required courses for each are listed on the following page.

Business Administration
Computer Science
Economics
Environmental Studies
Other
Free Electives (15-25 hours)

39 Hours of 300/400 level courses

## APPLIED MATHEMATICS

## FIELDS OF APPLICATION/SPECIALIZATION

## Business Administration

ACCT 210: Introduction to Financial Accounting (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
6 credits of 300/400 level business courses:

Computer Science
CS 210: Fundamentals of Programming I (3 hrs)
CS 215: Fundamentals of Programming II (3 hrs)
CS 220: Logic Design \& Machine Organization (3 hrs)
CS 290: Object-Oriented Design (3 hrs)
9 credits of 300/400 level computer science courses.

## Economics

ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
ECON 300: Regression Analysis (3 hrs)
ECON 345: Intermediate Microeconomics (3 hrs)
ECON 346: Intermediate Macroeconomics (3 hrs)
ECON 400: Econometrics (3 hrs)

Environmental Studies
BIOL 320: Evolution and Ecology (4 hrs)
CHEM 118: Principles of Chemistry I (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
ES 360: Science of Environmental Pollutants (3 hrs)
GEOL 130: Environmental Geology (3 hrs)
Complete one course from:
BIOL 108: General Zoology (3 hrs)
BIOL 109: General Botany (3 hrs)
Complete one course from:
BIOL 432: Ecology (3 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
Complete one course from:
BIOL 118: Modern Biology: Environmental Perspective (3 hrs)
ES 103: Fundamentals of Environmental Science (3 hrs)

Applied Math - Other Options
Other options include biology, chemistry, physics, or cognitive science. See Self-Service Student Planning for specific course requirements. A field of application in an area of special interest may also be chosen with the approval of the department.

## Bachelor of Science

## PREDOCTORAL MATHEMATICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-

Major Requirements (47 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 420: Advanced Calculus (3 hrs)
MATH 445: Abstract Algebra (3 hrs)
Complete 6 hours of 300/400 level MATH.
Complete one course from:
MATH 373: Numerical Methods (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
Complete 9 hours of MATH.
Independent Study courses selected in consultation with faculty.
-
-
-
Complete 6 hours of computer courses.
Courses must be approved by advisor.

- CS 210: Fundamentals of Programming I (3 hrs)

Free Electives (31 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## STATISTICS AND DATA SCIENCE

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)
Major Requirements (38 hours)
MATH 222: Calculus II (4 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 365: Probability (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
STAT 166: Intro to R for Data Science (1 hr)
STAT 266: Intro to Statistics with R (3 hrs)
STAT 267: Experimental Design (3 hrs)
STAT 300: Data Analysis in the Real World (3)
STAT 361: Linear Models (3 hrs)
STAT 362: Machine Learning (3 hrs)
STAT 474: Techniques for Large Data Sets (3 hrs)
STAT 493: Statistical Modeling (3 hrs)
Complete one course from:
CS 205: Programming for the Sciences ( 3 hrs)
CS 210: Fundamentals of Programming I (3 hrs)
Complete 3 hours from a computer-based course.
Course must be approved by Math Chair.
- 

Free Electives (40 hours)

39 Hours of 300/400 level courses

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- STAT 493: Senior Seminar:Statistical Modeling

Overlay: Writing Across the Curriculum (4 courses)
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## Bachelor of Science

## MATHEMATICS EDUCATION

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (42 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MATH 495: Senior Seminar: Math Modeling

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (74 hours)
Professional Education Requirements
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - JH/Middle School (3 hrs)
EDUC 456: Methods of Teaching Math SH/JH/MS (2 hrs)
Mathematics Requirements
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 355: Foundations of Geometry (3 hrs)
MATH 365: Probability (3 hrs)
MATH 370: Discrete and Combinatorial Math (3 hrs)
MATH 420: Advanced Calculus (3 hrs)
MATH 466: Mathematical Statistics (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
MATH 425: Complex Variables (3 hrs) OR
MATH 445: Abstract Algebra (3 hrs)
CS 205: Programming for the Sciences (3 hrs) OR
CS 210: Fundamentals of Programming I (3 hrs

Free Electives (4 hours)

39 Hours of 300/400 level courses

# Bachelor of Music in Music Education 

Bachelor of Music<br>with a Major in Performance

## Bachelor of Music in Music Therapy

Bachelor of Science with a Major in Music emphasis in Music Management available

Department of Music curricula are designed to prepare students for professional careers in music, to give all students opportunities to understand themselves and the world around them through participation and study of music, and to contribute to the artistic and cultural life of the University and broader community.

The department offers the following degrees: Bachelor of Music with majors in performance, music education, and music therapy; Bachelor of Science with a major in music; and Bachelor of Science with a major in music and an emphasis in music management. Auditions are required for entry into all degree programs.

The department has been a member of the National Association of Schools of Music since 1948. Entrance and graduation requirements are in accordance with published regulations of NASM.

## Requirements

Participation in the appropriate major ensemble is required each semester the student is enrolled (with the exception of students enrolled at Harlaxton or in student teaching). Students may be assigned to participate in additional ensembles depending on the needs of the department as determined by the faculty. Part-time fifth-year seniors who are no longer receiving a music scholarship are exempt from this requirement.

Students enrolled in applied music are expected to appear frequently in workshop recitals. The actual number of performances is determined through consultation with the student's applied teacher.

All students enrolled in music ensembles are responsible for obtaining appropriate formal attire for concerts, particularly University Choir, University Bands, and University Symphony Orchestra; see specific course syllabi. Check the Music Student Handbook or contact the instructor for more information.

The music faculty considers attendance at recitals to be of great importance in the development of musicianship and requires recital attendance. Students must enroll in Recital Attendance (Music 100, 101, 200 etc.) each semester in residence. Specific recital attendance requirements and guidelines are described in the Music Student Handbook.

All non-keyboard music majors must enroll in class piano (or, if placed, in applied piano) as the minor instrument requirement until the appropriate piano proficiency requirements are completed for each respective degree. Once piano proficiencies are successfully completed, remaining minor credit hour requirements may be fulfilled by study of any instrument or voice. Piano class enrollment should begin at the same time as Music 141 (Diatonic Harmony).

It is the responsibility of the student to be aware of departmental regulations and procedures as identified in this catalog and the Music Student Handbook.

## Music Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states. The program includes vocal, instrumental, or all area emphases (vocal and instrumental) and prepares students for certification at the P-12 levels for each
chosen discipline.

## Performance

This degree is designed for students who wish to pursue a career in performance or a related field. It is the most music-intensive degree offered. Students are admitted to the program conditionally pending completion of comprehensive juries at the end of the freshman and sophomore years. Acceptance is highly selective to promote student success.

## Music Therapy

This degree prepares musicians for careers in music therapy. The curriculum emphasizes the study of music and music therapy, as well as the behavioral sciences. This program is fully approvedbytheAmericanMusicTherapy Association,makingstudentseligibletotaketheboard certification exam after successful completion of course work and a six-month music therapy internship.

## Music Therapy Equivalency Program

This program is for individuals who have already completed a degree in a field related to musictherapy (musiceducation, music performance, etc.). Although no degree is awarded, the completion of this program and a six-month music therapy internship qualifies the student to take the board certification exam.

## Earn Two Degrees: Music Therapy and Music Education

This program is for students interested in combining their skills and talents as music therapists and music educators. A particular combination of courses ensures the requirements for both degrees are met. All course work and student teaching are completed in five years, followed by a six-month music therapy internship. The degrees lead toward becoming a credentialed music therapist and earning an Indiana teacher certificate in vocal or instrumental music (K-12).

## Music

This major integrates the study of music within a liberal arts curriculum. It provides an appropriate background for students wishing to pursue advanced degrees in music theory, musicology, composition, and music librarianship. The music content of the degree is flexible, making it ideal for combining with degrees in non-music fields.

## Emphasis in Music Management

This major combines music and business studies for the student interested in working in the music industry (retail, arts management, music technology). The music and business courses are supplemented with electives in each area to allow for the development of individual interests.

## Music Studies Minor (20 hours)

This curriculum allows the major in another area with a strong interest in music to obtain a minor in music studies.
Music 140 or 141, 142, 355, 356
Applied music - 4 hours: One hour per semester for four semesters
Major ensemble-4hours:One hour per semesterfor four semesters

## Suzuki Violin Pedagogy Certificate (12 hours)

The Suzuki pedagogy certificate can be earned through a 12-hour program that offers comprehensive teacher training in Suzuki Talent Education ${ }^{\text {"I }}$ to violinists pursuing any degree in music. The program includes six semesters of classroom study, observation of experienced teachers, and practicum teaching in the University of Evansville Suzuki Violin Program. Upon completion, participants receive a certificate that may be registered with the Suzuki Association of the Americas.

Music 260, 261, 360, 361, 460, 461

## Jazz Studies Certificate (12 hours)

The jazz studies certificate is a 12-hour program that includes the performance of jazz as well as jazz music analysis, composition and arrangement of jazz music, and learning the art of improvisation. The jazz studies certificate is open to any UE student who has completed the prerequisite courses and has also received permission from the instructor(s).
Music 158, 243, 245, 341, six semesters of Music 113-413 Jazz Ensemble I (for a total of 3 hours)

## Musical Theatre Certificate (12 hours)

Music 159, 143, three semesters of APM 124-424 Musical TheatreJazz Ensemble I (for a total of 3 hours), four semesters of MUS 130-430 or MUS 138-438 Choir or Opera Mainstage (for a total of 4 hours)

## Performing Ensembles

The Department of Music sponsors performing ensembles open to music and non-music majors alike. These ensembles perform regularly in concert on and off campus. All UE students are encouraged to participate. Some ensembles require an audition at the beginning of the semester. Interested students should contact the Department of Music for additional information.

Vocal ensembles include University Choir, Mixed Chorus, Women's Chorus, and Kantorei. Opera Main Stage provides theatrical performing opportunities for music and non-music majors.

Instrumental ensembles include Wind Ensemble, University Band, Aces Brass, and University Symphony Orchestra. Jazz ensembles include two full-size bands and small combos.

Chamber music opportunities include brass choir, a large string ensemble, woodwind quintet, string quartets, and piano trios. Like-instrument groups include percussion, guitar, flute, clarinet, trumpet, low brass, and other ensembles.
Additional information is included in the "Course Offerings and Descriptions" section of this catalog.

## Bachelor of Music

## MUSIC EDUCATION - INSTRUMENTAL

2023-2024 | 130 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements ( 89 hours)
Education Core
Minimum GPA of 3.0 required in the following courses for admission to student teaching
EDUC 150: Foundations/Diversity in American Education (3 hrs)
EDUC 363: Princ \& Strategies Teaching Secondary Schools (3 hrs) MUS 370: Elem. Methods/Materials in Gen. Music (3 hrs) MUS 373: Methods/Materials in Instrumental Music (3 hrs) EDUC 435: Supervised Teaching Seminar (2 hr)
MUS 260: Suzuki Pedagogy (2 hrs) OR

MUS 476: Marching Band Techniques (2 hrs)
Music Requirements
MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 142: Chromatic Harmony (3 hrs)
MUS 171: Foundations of Music Education (3 hrs)
MUS 241: Introduction to Form (3 hrs)
MUS 242: Post-Tonal Theory (3 hrs)
MUS 262: Woodwind Tech \& Pedagogy I (1 hr)
MUS 263: Brass Tech \& Pedagogy I (1 hr)
MUS 264: Percussion Techniques ( 1 hr )
MUS 265: String Tech \& Pedagogy I (1 hr)
MUS 271: Pract School Music Experiences (2 hrs)
MUS 272: Woodwind Tech \& Pedagogy II (1 hr)
MUS 273: Brass Tech \& Pedagogy II (1 hr)
MUS 275: String Tech \& Pedagogy II (1 hr)
MUS 346: Orchestration (2 hrs)
MUS 350: Conducting I (3 hrs)
MUS 351: Conducting II (2 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
MUS 357: Topics in Music History and Culture (3 hrs)
Complete 9 hours from:
MUS 478: Student Teaching in Music (4.5-6 hrs)
MUS 479: Student Teaching in Music (6-12 hrs)
Applied Music
Complete 14 hours of your major instrument.
100, 200, 300, and 400-level
Complete 4 hours of Piano.
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105,
204, 205
Ensembles
Complete 7 hours of ensembles.
Major ensemble participation is a requirement of each semester of residency. One hour must be at 400 level.
100, 200, 300, and 400-level
Recital

- Students must complete MUS 100-400/101-401 Recital Attendance for 0 hours
- Students must complete a Senior Recital (. 5 hrs )


## Complete Piano Proficiency

MUS-PROF 1 (0 hrs)
MUS-PROF 2 ( 0 hrs )

39 Hours of 300/400 level courses

## Bachelor of Music

## MUSIC EDUCATION - VOCAL

2023-2024 | 127 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (86 hours)

## Education Core

Minimum GPA of 3.0 required in the following courses for admission to student teaching.
EDUC 150: Foundations/Diversity in American Education (3 hrs)
EDUC 363: Princ \& Strategies Teaching Secondary Schools (3 hrs)
MUS 370: Elem. Methods/Materials in Gen. Music (3 hrs)
MUS 372: Methods/Materials in Choral Music (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)

## Bachelor of Music

## MUSIC EDUCATION - VOCAL AND INSTRUMENTAL

2023-2024 | 142 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (101.5 hours)
Education Core
Minimum GPA of 3.0 required in the following courses for admission to student teaching
EDUC 150: Foundations/Diversity in American Education (3 hrs)
EDUC 363: Princ \& Strategies Teaching Secondary Schools (3 hrs)
MUS 370: Elem. Methods/Materials in Gen. Music (3 hrs)
MUS 372: Methods/Materials in Choral Music (3 hrs)
MUS 373: Methods/Materials in Instrumental Music (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
MUS 260: Suzuki Pedagogy (2 hrs) OR

MUS 476: Marching Band Techniques (2 hrs)
Music Requirements
MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 102: Diction I (1 hr)
MUS 103: Diction II (1 hr)
MUS 142: Chromatic Harmony (3 hrs)
MUS 171: Foundations of Music Education (3 hrs)
MUS 236: Guitar \& Voice Tech I (1 hr)
MUS 241: Introduction to Form (3 hrs)
MUS 242: Post-Tonal Theory (3 hrs)
MUS 262: Woodwind Tech \& Pedagogy I ( 1 hr )
MUS 263: Brass Tech \& Pedagogy I ( 1 hr )
MUS 264: Percussion Techniques (1 hr)
MUS 265: String Tech \& Pedagogy I (1 hr)
MUS 271: Pract School Music Experiences (2 hrs)
MUS 272: Woodwind Tech \& Pedagogy II (1 hr)
MUS 273: Brass Tech \& Pedagogy II (1 hr)
MUS 275: String Tech \& Pedagogy II (1 hr)
MUS 346: Orchestration (2 hrs)
MUS 350: Conducting I (3 hrs)
MUS 351: Conducting II (2 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
MUS 357: Topics in Music History and Culture (3 hrs)
MUS 474: Pedagogy of Applied Major (2 hrs)
Complete 9 hours from:
MUS 478: Student Teaching in Music ( $4.5-6$ hrs)
MUS 479: Student Teaching in Music (6-12 hrs)
Applied Music
Complete 14 hours of your major instrument.
$100,200,300$, and 400 -level
Complete 4 hours of Piano:
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105, 204, 205
Complete 2 hours of Voice:
Allowable courses include APM 123, 223, 323, 423

Ensembles
Complete 9 hours of ensembles
Major ensemble participation is a requirement of each semester of residency. 3 hours must be at 400 level.
$100,200,300$, and 400 -level
Recital

- Students must complete MUS 100-400/101-401 Recital Attendance for 0 hours
- Students must complete a Senior Recital (. 5 hrs )

Complete Piano Proficiency
MUS-PROF 1 (0 hrs)
MUS-PROF 2 ( 0 hrs )
39 Hours of 300/400 level courses

## Bachelor of Music

## PERFORMANCE

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (73 hours) MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 142: Chromatic Harmony (3 hrs)
MUS 241: Introduction to Form (3 hrs)
MUS 242: Post-Tonal Theory (3 hrs)
MUS 340: Counterpoint (3 hrs)
MUS 343: Form and Analysis (3 hrs)
MUS 350: Conducting I (3 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
MUS 357: Topics in Music History \& Culture (2 courses, 6 hrs max)
MUS 451: Lit of the Applied Major (2 hrs)
MUS 474: Pedagogy of Applied Major (2 hrs)
Applied Music - Complete 24 hours of your major instrument Note: Voice majors are required to complete 22 credits of APM as well as MUS 102 and MUS 103.

Complete 4 hours of a minor instrument.
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105, 204, 205

Complete 8 hours of ensembles.
Major ensemble participation is a requirement of each semester of residency.

Complete Piano Proficiency I
MUS-PROF 1 (0 hrs)
(Note: Voice majors must complete Piano Proficiency II)
MUS-PROF 2 ( 0 hrs )
Recital
Students must complete MUS 100-400/101-401 Recital Attendance for 0 hrs .

Students must complete a Junior Recital (half) and Senior Recital (full).

Free Electives (6 hours)

39 Hours of 300/400 level courses

## Bachelor of Music

## MUSIC THERAPY

2023-2024 | 125 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
utcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Introduction to Sociology (3 hrs)
- PSYC 121: Introduction to Psychology (3 hrs

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (83 hours)
MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 142: Chromatic Harmony (3 hrs)
MUS 241: Introduction to Form (3 hrs)
MUS 242: Post-Tonal Theory (3 hrs)
MUS 350: Conducting I (3 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
PSYC 225: Lifespan Development (3 hrs)

PSYC 259: Abnormal Psychology (3 hrs)
PSYC 333: Psychopathology in Children and Adolescents (3 hrs)
Complete the following with grade of C - or better:
MUS 184: Orientation to Music Therapy (3 hrs)
MUS 236: Guitar \& Voice Techniques I (1 hr)
MUS 237: Guitar \& Voice Techniques II (1 hr)
MUS 286: Approaches \& Materials in Music Therapy (3 hrs)
MUS 336: Introduction to Improv Methods (2 hrs)
MUS 384: Receptive/Comp Methods in Music Therapy (3 hrs)
MUS 386: Psychology of Music (3 hrs)
MUS 486: Music Therapy Research (4 hrs)
Complete the following with grade of B - or better:
MUS 188: Music Therapy Practicum (1 hr)
MUS 287: Music Therapy Practicum (1 hr)
MUS 288: Music Therapy Practicum (1 hr)
MUS 387: Music Therapy Practicum (1 hr)
MUS 388: Music Therapy Practicum (1 hr)
MUS 487: Music Therapy Practicum (1 hr)
Applied Music - Complete 13 hours of your major instrument. Note: Voice majors must complete 13 hours of APM as well as MUS 102 and MUS 103.

Complete 4 hours of a minor instrument.
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105, 204, 205

Complete 8 hours of ensembles.
Ensemble participation is a requirement of each semester of residency.

Complete Piano and Guitar Proficiency
MUS-PROF I (0 hrs)
MUS-PROF II (0 hrs)
MUS-GTR (0 hrs)
Recital
Students must complete MUS 100-400/101-401 Recital Attendance for 0 hrs
Students must complete a Senior Recital (half)
Clinical Training
Students must complete a six-month music therapy internship.

Free Electives (1 hour)
39 Hours of 300/400 level courses

## Bachelor of Science

## MUSIC MANAGEMENT

2023-2024 | 125 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
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Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
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Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (84 hours)
MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 142: Chromatic Harmony (3 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
MUS 391: Music Business Opportunities (2 hrs)
MUS 392: Intro to Music Business \& Technology (3 hrs)
ECON 101: Principles of Macroeconomics (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
MUS 390: Music Management Internship (5 hrs)

Complete 3 hours from 300/400 level MUS.

## Applied Music

Complete 14 hours of your major instrument. Voice majors must complete 14 hours of APM as well as MUS 102 \& 103.

Complete 2 hours of a minor instrument.
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105, 204

Complete 8 hours of ensembles.
Ensemble participation is a requirement of each semester of residency.

Piano Proficiency
MUS-PROF I (0 hrs)
Recital
Students must complete MUS 100-400/101-401 Recital Attendance for 0 hrs . Students must complete a Senior Recital (half)

39 Hours of 300/400 level courses

## Bachelor of Science

## MUSIC

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- MUS 498: Seminar in World Music

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (40 hours) MUS 140: Diatonic Harmony ( 5 hrs ) OR
MUS 141: Diatonic Harmony (3 hrs)
MUS 142: Chromatic Harmony (3 hrs)
MUS 355: History of Music I (3 hrs)
MUS 356: History of Music II (3 hrs)
Complete at least 7 hours from the following courses:
MUS 241: Introduction to Form (3 hrs)
MUS 242: Post-Tonal Theory (3 hrs)
MUS 340: Counterpoint (3 hrs)
MUS 343: Form and Analysis (3 hrs)
MUS 260: Suzuki Pedagogy I (2 hrs)
MUS 261: Suzuki Pedagogy II (2 hrs)
MUS 346: Orchestration (2 hrs)
MUS 350: Conducting I (3 hrs)
MUS 357: Topics Music History and Culture (2 topics, 6 hrs max)
MUS 451: Lit of the Applied Major (2 hrs)
MUS 474: Pedagogy of Applied Major (2 hrs)
Applied Music
Complete 8 hours of your major instrument
Complete 2 hours of your minor instrument.
Allowable courses include APM 115, 215, 315, 415; MUS 104, 105, 204, 205

Music Electives - 3-16 additional hours (max of 54 hours in music courses)
Choose any additional music courses from the Music Academic Requirements above, MUS 102 \& 103 (required for voice majors), 6 additional hours from applied major, 2 hours from MUS 204, 205, 262, 263, 264, 265, 266, or applied minor; MUS 155, 156, 158, 159, 171, 184, 243, 357 (2 topics, 6 hrs max), 392, and 476.

Complete Piano Proficiency
MUS-PROF I ( 0 hrs )
Complete 8 hours of ensembles.

Free Electives ( 39 hours)*
*A minimum of 25 hours of non-music courses

39 Hours of 300/400 level courses

## Physics

Faculty: Stamm (Chair), Braun, Luman, Fentress

Bachelor of Arts or Bachelor of Science with a Major in Physics

Bachelor of Arts<br>with a Major in<br>Physics Education

A major in physics provides a foundation in the most fundamental of the sciences. This can prepare one for graduate studies in physics or engineering; for a wide range of science-related careers in medicine, electronics, energy, or computer science; or for a career in teaching. Physics courses range from an introduction of basic principles to in-depth studies of the fundamental properties and behavior of energy and matter.

The Department of Physics offers the Bachelor of Science and Bachelor of Arts degrees. Students who plan a career in secondary education, or who wish to include physics as part of a broader liberal arts program, should consider the Bachelor of Arts degree. The Bachelor of Science degree is recommended for students considering a career as a physicist, engineer, or other professional scientist.

It is possible, with advanced planning, to spend a semester in England and still complete all degree requirements within four years by taking general education courses at Harlaxton College.

## Bachelor of Arts with a Major in Physics Education

Successful completion of this degree qualifies students for teacher certification in Indiana and most other states.
Physics Minor (21 hours)
Physics 210, 211, 213, 214, 305; one from Electrical Engineering 320, Physics 312, 401; one from Physics 416, 471; additional hours must be chosen from 300- or 400-level physics courses (not including Physics 499)
(Physics350willnotbeallowedasanelectiveforelectricalengineeringmajorswhoareminoring in physics.)
A co-op program leading to a Bachelor of Science degree with a major in physics is available. Under this program, a student usually works in industry or at a government laboratory during the summers and one semester. Call or write the chair of the Department of Physics for more information and an application.

## Bachelor of Arts

## PHYSICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(48 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (40 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
PHYS 210: Calculus Physics I (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
PHYS 213: Intro to Modern Physics (3 hrs)
PHYS 214: Modern Physics Lab ( 1 hr )
PHYS 305: Mathematical Physics (3 hrs)
PHYS 312: Classical Mechanics (4 hrs)
PHYS 401: Advanced Electromagnetics (4 hrs)
PHYS 416: Statistical Thermodynamics (3 hrs)
PHYS 471: Quantum Mechanics (3 hrs)
Physics Electives
Complete 3 hours to total 32 hours in Physics. Recommended courses are PHYS 195, 220, 221, 350, 421, and 427.
Free Electives (32 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## PHYSICS

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- 

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (52 hours)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
PHYS 210: Calculus Physics I (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
PHYS 213: Intro to Modern Physics (3 hrs)
PHYS 214: Modern Physics Lab ( 1 hr )
PHYS 305: Mathematical Physics (3 hrs)
PHYS 312: Classical Mechanics (4 hrs)
PHYS 401: Advanced Electromagnetics (4 hrs)
PHYS 414: Advanced Laboratory (3 hrs)
PHYS 416: Statistical Thermodynamics (3 hrs)
PHYS 471: Quantum Mechanics (3 hrs)
PHYS 494: Physics Seminar (1 hrs)
PHYS 499: Physics Research/Independent Study (1-4 hrs)
Complete one course from:
PHYS 220: Simulations for PHYS 210 ( 1 hr )
(taken concurrently with PHYS 210: Calculus Physics I)
PHYS 221: Simulations for PHYS 211 (1 hr)
(taken concurrently with PHYS 211: Calculus Physics II)
Complete one course from:
PHYS 340: Computational Physics (3 hrs)
PHYS 350: Electronics (4 hrs)
Physics Electives
Complete 6 credits to total 44 credits in Physics. Recommended courses are PHYS 190, 320, 322, 330, 331, 405, 421, 422, 423, 427.
-
Free Electives (26 Hours)

39 Hours of 300/400 level courses

NOTES

- Undergraduate Research - Undergraduate research is required for the BS degree in physics. The research may be completed on campus, under the direction of one of the University physics faculty members, or it may be completed off campus (typically, through the National Science Foundation's summer Research Experiences for Undergraduates program).


## Bachelor of Arts

## PHYSICS - EDUCATION

2023-2024 | 134 Hours Required

Enduring Foundations General Education Requirements (48 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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-
-
-
Outcome 7: (4 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- 

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Intro to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EDUC 490: Schools in a Changing Society (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-

Major Requirements (86 hours)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
EDUC 150: Foundations/Diversity in American Educ. (3 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 363: Principles \& Strategies, Secondary Schools (3 hrs)
EDUC 385: Multicultural Understanding ( 3 hrs )
EDUC 428: Reading in the Content Areas (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 436: Supervised Teaching SH/MS (12 hrs)
EDUC 443: Curriculum \& Learning - Junior High/Middle School (3 hrs)
EDUC 451: Methods of Teaching Science SH/JH/MS (2 hrs)
Physics Requirements
PHYS 210: Calculus Physics I (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
PHYS 213: Intro to Modern Physics (3 hrs)
PHYS 214: Modern Physics Lab (1 hrs)
PHYS 305: Mathematical Physics (3 hrs)
PHYS 312: Classical Mechanics (4 hrs)
PHYS 401: Advanced Electromagnetics (4 hrs)
PHYS 416: Statistical Thermodynamics (3 hrs)
PHYS 471: Quantum Mechanics (3 hrs)
MATH 222: Calculus II (4 hrs) OR
MATH 323: Calculus III (4 hrs) (MATH-324 recommended)
PHYS Elective (3 hrs)
Secondary Science Core
Complete 3 courses from outside the major. Courses may be used in conjunction with general education and major requirements.

Complete three courses from:
BIOL 107: General Biology (4 hrs)
CHEM 118: Principles of Chemistry ( 4 hrs )
ASTR 101: Descriptive Astronomy (3 hrs)
GEOG 230: Physical Geography (4hrs)

39 Hours of 300/400 level courses

## Professional Programs

Because of the fundamental nature and breadth of many of the disciplines offered by the University of Evansville, there are a number of programs available for the student intending to pursue a professional career. Most of these preprofessional preparatory programs are designed for the student to meet baccalaureate requirements although admission to some professional programs is available prior to completion of an undergraduate degree.

## Pre-Dentistry

A four-year baccalaureate program in liberal arts with significant work in the natural sciences at the University of Evansville is recommended as a prerequisite to seeking admission into dental school. Successful completion of the four-year curriculum satisfies admission requirements of most dental schools. Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

Common Pre-requisites for Admission to Dental School:
Biology (IU Dental requires 20 hours)
BIOL 107 or BIOL 119 (General Biology or Intro Biology - Molecular Perspectives)
BIOL 120 (Intro to Organismal Diversity)
BIOL 331 (Genetics)*
BIOL 430 or 442 (Microbiology or Immunology)
BIOL/EXSS 112 (Human Anat \& Phys I)
BIOL/EXSS 113 (Human Anat \& Phys II)
Chemistry (IU Dental requires 12 hours)
CHEM 118 (Principles of Chem)
CHEM 240 (Organic Chem I)
CHEM 341 (Organic Chem II)
CHEM 280 (Inorganic Chem)
CHEM 370/371 (Biochemistry \& lab)*
*Recommended courses, but not required
Physics
PHYS 121 (Algebra Physics I)
PHYS 122 (Algebra Physics II)
Social Science
PSYC 121 (Intro to Psychology) OR
COMM 130 (Intro to Communication)
Humanities
Choose at least 3 credit hours of Foreign Language, English composition, Literature, Philosophy, or History
NOTE:
Courserequirementsfordentalschoolsmayvary,pleasecheckanyschool ofinterestwebsite 100+ hours of job shadowing local dentists is recommended.
To be competitive - Maintain a GPA of 3.4 or higher, Score a 19 on DAT exam

## Pre-Law

Students planning to enter the legal profession are advised to pursue baccalaureate degree work in academic areas best suited to their interests. Law schools are most interested in students who can communicate effectively, read comprehensively, and think critically. Because admission requirements of law schools vary, students need to become acquainted with the admission process of the schools they hope to attend. Study in English, economics, foreign languages and cultures, history, legal studies, logic and philosophy, political science, and sociology is recommended. Most law schools do not require a specific pattern of courses, nor do they stipulate majors for concentrated study. A course of study should be carefully planned with the pre-law advisor and the Law School Admission Test should be taken in conjunction with application to law school. For more information, contact the pre-law advisor, Dr. Kevin Gray.

BIOL 415 (Biostatistics) or QM 227 (Statistics)

## Pre-Medicine

A student may be admitted to certain medical schools after three years of undergraduate work. However, pursuit of a fouryear baccalaureate program in liberal arts with significant work in the natural sciences at the University of Evansville is recommended as a prerequisite to seeking admission into medical school. Successful completion of the four-year curriculum satisfies admission requirements of most medical schools. A course of study should be carefully planned with the pre-medicine advisor, and the Medical College Admission Test should be taken at the appropriate time. Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

Common Pre-requisites for Admission to Medical School:

## Biology

BIOL 107 or BIOL 119 (General Biology or Intro Biology - Molecular Perspectives)

BIOL 120 (Intro to Organismal Diversity)
BIOL 331* (Genetics)
Chemistry
CHEM 118 (Principles of Chem)
CHEM 240 (Organic Chem I)
CHEM 280 (Inorganic Chem I)
CHEM 341 (Organic Chem II)
CHEM 370 (Biochemistry)
*Recommended for MCAT prep
Physics
PHYS 210 or 121 (Calc Physics I or Algebra Physics I)
PHYS 211 or 122 (Calc Physics II Algebra Physics II)
Mathematics
MATH 221 (Calculus I)* or MATH 134 (Survey of Calc)*
Sociology
SOC 105 or 230 (Intro to Sociology or Social Problems in the
Modern World)
Psychology
PSYC 121 (Intro to Psychology)
Ideally, courses should be completed before taking the MCAT exam
NOTE:
Course requirementsformedical schools may vary, pleasecheck any school of interest website

To be competitive - Maintain a GPA of 3.6 or higher, Score minimum 500 on MCAT exam

## Pre-Occupational Therapy

ContactthePre-ProfessionalHealthAdvisorwithquestionsFrancie Renschler.

## Common Pre-requisites for Admission to Occupational

Therapy Master's program:
Biology
BIOL/EXSS 112 (Human Anat \& Phys I)
BIOL/EXSS 113 (Human Anat \& Phys II)

## Social Science

PSYC 121 (Intro to Psychology)
PSYC 225 (Lifespan Developmental Psychology)
PSYC 259 (Abnormal Psychology) Health Sciences
HE 111 (Medical Terminology)
HS 205 (Pharmacology)
EXSS 356 (Biomechanics)
NOTE:
CourserequirementsforOTschoolsmayvary, pleasecheckanyschool of interest website
Application cycle is usually January - February before a fall start date
To be competitive - maintain a 3.5 GPA or higher

## Pre-Optometry

While most optometry schools will consider an applicant with three years of undergraduate work, the student who has completed a baccalaureate degree is in a more competitive position for admission. The curriculum presented at the University of Evansville meets the requirements of the Indiana University School of Optometry and most other schools in the Midwest, though students considering optometry should become familiar with expectations of optometry schools to which they may apply. Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

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Common Pre-requisites for Admission to Optometry School:
Biology
    BIOL 107 or BIOL }119\mathrm{ (General Biology or Intro Biology - Molec-
ular Perspectives)
    BIOL }120\mathrm{ (Intro to Organismal Diversity)
    BIOL }430\mathrm{ (Microbiology)
    EXSS }112\mathrm{ (Human Anat & Phys I)*
    EXSS }113\mathrm{ (Human Anat & Phys II)*
Chemistry
    CHEM }118\mathrm{ (Principles of Chem)
    CHEM 280 (Inorganic Chem I)
    CHEM 240 (Organic Chem I)
    CHEM 370 (Biochemistry)
Physics
    PHYS }121\mathrm{ (Algebra Physics I)
    PHYS }122\mathrm{ (Algebra Physics II)
Psychology
    PSYC }121\mathrm{ (Intro to Psychology)
    PSYC 245 (Statistics for Psychologists)
MATH
    3 credit hours of math MATH 221 or 134
Humanities
    credit hours of Foreign Language
    credit hours of arts and humanities
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6 credit hours of English Composition
*Recommended, but not required
Courserequirementsforoptometryschoolsmayvary, pleasecheck any school of interest website

Maintain a GPA of 3.6 and an OAT score of 326
Rolling admissions - plan to apply early!

## Pre-Pharmacy

Admission to a college of pharmacy generally requires satisfactory completion of two years of academic work in basic sciences and liberal arts. Because admission requirements vary, pre-pharmacy students should become acquainted with the specific admission requirements of the pharmacy college to which application will be made. The following suggested first-year curriculum meets the requirements of most pharmacy colleges in the Midwest. Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

Common Pre-requisites for Admission to Pharmacy School:
Biology
BIOL 107 or BIOL 118, 119 (General Biology or Intro Biology Molecular Perspectives)

BIOL 120 (Intro to Organismal Diversity)
BIOL 110 (Clinical Microbiology)
BIOL 442 (Immunology)
BIOL/EXSS 112 (Human Anat \& Phys I)
BIOL/EXSS 113 (Human Anat \& Phys II)
Chemistry
CHEM 118 (Principles of Chem)
CHEM 240 (Organic Chem I)
CHEM 280 (Inorganic Chemistry I)
CHEM 341 (Organic Chem II)
CHEM 370/371 (Biochemistry \& lab)
Physics
PHYS 121 (Algebra Physics I)
Math
MATH 221 (Calculus I)
MATH 222 (Calculus II)
Other
COMM 210 (Professional Speaking)
QM 227 (Introduction to Statistics) or Stats for your major such as BIOL 415 (Biostatistics)

FYS 112 (First Year Seminar)
ECON 102 (Principles of Microeconomics)
One Social Science class
NOTE:
To be competitive - Maintain a GPA of 3.0 or higher, C or better in pre-requisites

Course requirements for pharmacy schools may vary, please check any school of interest website

## Pre-Physician Assistant:

Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

Pre-requisites for Admission to UE Master of Physician Assistant Science:

Biology
BIOL 107 or BIOL 119* (General Biology or Intro Biology - Molecular Perspectives)

BIOL 110 or 430* (Clinical Microbiology or Microbiology)
BIOL/EXSS 112 (Human Anat \& Phys I)
BIOL/EXSS 113 (Human Anat \& Phys II)
Chemistry
CHEM 118 (Principles of Chem)
CHEM 280 (Inorganic Chem I)
CHEM 240 (Organic Chem I)
CHEM 341 (Organic Chem II)
Psychology
PSYC 121 (Intro to Psychology)
Social Science (one additional course)
Example: Anthropology, Cognitive Science, Communication, Economics, Gender/Women's Studies, Political Science, Sociology
Medical Terminology
HE 111 (Medical Terminology)
*Preferred course
NOTE:
To be competitive - Maintain GPA 3.6 or higher (minimum GPA 3.0), C or better in pre-requisites required, GRE Score minimum of 300 (Average for 2018 PA class was 307)
UE Master of PA program begins in January, so application cycle is April-July of previous year

## Pre-Ministry

Students planning to attend theological school or seminary for ministerial preparation work in close consultation with the pre-ministry advisor to plan a course of study which meets their individual needs and vocational goals. Pre-ministry students must choose a major (pre-ministry is not a major). What major students choose will depend upon which pre-ministry track or path they decide is right for them. Students choose from the preferred admission/advanced standing track, the alternative track, and (for Catholic students) the Catholic ministry track.
Preferred Admission/Advanced Standing Track
Students take a religion major, with special focus on biblical and theological study, and complete a New Testament Greek minor. This is the recommended course of study for students seeking preference in admission, preference in scholarship aid, and advanced standing at the seminary of their choice. Advanced standing can be awarded for up to one-quarter of the total credits needed for completion of the seminary degree, allowing qualified students either to shorten the length of time needed for completion of their program or to take more advanced courses (Association of Theological Schools, Educational Standards 7.4.13). Students also complete two internships, and meet regularly for interaction and mentoring with a professional active in ministry.
Alternative Track

Students choose a major in any field, working with the pre-ministry advisor to map out an overall course of study that contributes to their vocational formation. Majors in the humanities, such as archaeology, anthropology, art history, classical studies, economics, English, ethics and social change, foreign language, history, international studies, music, philosophy, political science, psychology, religion, sociology, and creative writing, are especially recommended. Students also complete at least one internship, and meet regularly with a professional mentor active in their chosen field of ministry. This track serves well students planning a vocation in ministry outside the mold of traditional pastoral ministry, as well as students considering the ministry but also weighing other career options.

## Catholic Ministry Track

This track serves students discerning a vocation to the priesthood, as well as students intending to pursue an M.A. in theology leading to certification as a lay ecclesial minister, such as director of religious education, catechist, director of worship and liturgy, pastoral associate, director of social ministries, or lay hospital chaplain. The student and the pre-ministry advisor work closely together with the diocesan vocations director or the director of the office of catechesis to map out an individual plan of study offering optimal preparation for the student's intended program of graduate study and vocational goals.

## Preprofessional Clinical Psychology

Offered through the Department of Psychology, this program prepares students for graduate study in clinical psychology. Clinical psychology involves the study of abnormal behavior, psychological assessment,andthepsychotherapeutictreatmentofchildren,adolescents, and adults. Students major in psychology with a clinical psychology specialization as outlined in the "Psychology" section of this catalog.

## Preprofessional Clinical Social Work

Offered through the Department of Psychology, this program prepares students for graduate study in clinical social work, a specialization within the social work profession. Clinical social work involves the psychotherapeutic treatment of children, adolescents, and adults. Students major in psychology with a clinical social work specialization as outlined in the "Psychology" section of this catalog.

## Preprofessional Social Work

This minor helps to prepare students for graduate study in social work. Admission requirements of graduate social work programs vary, but the courses included in the sociology major and preprofessional social work minor provide a solid foundation in the behavioral sciences and other areas related to the practice of social work. Course requirements are outlined in the "Law, Politics, and Society" section of this catalog.

## Pre-Veterinary Medicine

The admission requirements of veterinary medicine schools vary, but the University of Evansville's recommendations meet the requirements of the Purdue University School of Veterinary

Medicine as well as many other schools throughout the United States. Contact the Pre-Professional Health Advisor with questions, Francie Renschler.

Common Pre-requisites for Admission to Veterinary School:
Biology
BIOL 107 or BIOL 119 (General Biology or Intro Biology - Molecular Perspectives)

BIOL 120 (Intro to Organismal Diversity)
BIOL 331 (Genetics)
BIOL 430 (Microbiology)
BIOL/EXSS 112 (Human Anat \& Phys I)*
BIOL/EXSS 113 (Human Anat \& Phys II)*
Chemistry
CHEM 118 (Principles of Chem)
CHEM 240 (Organic Chem I)
CHEM 280 (Inorganic Chem I)
CHEM 341 (Organic Chem II)
CHEM 370 (Biochemistry)
Physics
PHYS 121 (Algebra Physics I)
PHYS 122 (Algebra Physics II)
*required for some/not all vet schools
Other
COMM 210 (Professional Speaking)
FYS 112 (English Composition)
Humanities Electives (3 semesters)
QM 227 (Introduction to Statistics) or Stats for your major such as BIOL 415 (Biostatistics)

Animal Nutrition (not offered at UE)
Courserequirementsforveterinaryschoolsmayvary,pleasecheck any school of interest website

Maintain a GPA of 3.3 (3.6 or higher in science courses); GRE or MCAT required for some Vet schools

Variety of clinical experience is expected

## Psychology and Behavior Science

Faculty: Becker, Campese, Gray, Hennon (Chair), Jones, Kopta, Plikuhn

## Bachelor of Arts or Bachelor of Science with a Major in Criminal Justice

## Bachelor of Science with a Major in Cognitive Science

## Bachelor of Science with a Major in Neuroscience

## Criminal Justice

Director: Gray
The criminal justice degree is designed for students who intend to work in a justice-related field such as private security, law enforcement, the courts, institutional or community corrections, or the juvenile justice system. The degree also prepares students for graduate work in the social sciences or for law school - especially in the area of criminal law. In addition to covering the major components of the system, course requirements for the degree also include criminological and sociological theory and the sociology research sequence.

## Cognitive Science

Director: Jones
Cognitive science is the general study of intelligence. It seeks to understand how thought processes function, how they might be instantiated in machinery, and how our cognitive initiatives relate to the brain. Researchers in cognitive science work in a variety of areas ranging from artificial intelligence and neurophysiology to cognitive psychology and the philosophy of mind. The cognitive science program at the University of Evansville was designed to prepare students for a range of possible vocations, many of which will require further study in graduate school. Indeed, most of our majors continue their studies by pursuing this path.

In keeping with the interdisciplinary spirit of cognitive science, majors are encouraged to add depth and breadth to their experience by the way they use the 40 to 45 elective credits permitted by the program. For instance, to supplement their degree, students often complete a second (or third) major, pick up additional minors, or design their own path through a variety of relevant courses. Additional majors that fit well with cognitive science include applied mathematics, biology, computer science, economics, neuroscience, philosophy, and psychology, depending on the particular methods requirement a student may select (see below).

All majors in cognitive science automatically meet the requirements for a minor in philosophy, though they must declare the philosophy minor along with the cognitive science major.

## Neuroscience

## Director: Lora Becker

Students interested in how the brain regulates thoughts and behavior may earn a Bachelor of Science degree with a major in neuroscience. This interdisciplinary program combines courses from psychology, biology, chemistry, and other sciences to understand the structure and function of the nervous system. Completion of this program, through consultation with one's academic advisor, prepares students for graduate training in neuroscience, including the behavioral, cognitive, or molecular fields. This program also fulfills admission requirements for most medical schools and other health care professional schools. Eventual career options include teaching and research as a university professor, employment with a pharmaceutical or biotechnology company as a research scientist, and practice as a physician or other health care provider.

## Psychology and Behavior Science

## Bachelor of Arts or Bachelor of Science with a Major in Psychology

Bachelor of Arts or Bachelor of Science with a Major in Sociology specialization in

Gerontology available

## Psychology

Psychology is the study of behavior as well as the mental, biological, and social processes related to behavior. As a science, psychology researches the causes of behavior; as a profession, it applies these findings to improve human health and well-being.

Students who major in psychology have preparation for a career in social services, criminal justice, business, industry, or public relations. They are also prepared for graduate studies in psychology or related fields such as law, business, social work, or counseling.

The Bachelor of Arts and Bachelor of Science degrees are offered with a major in psychology. Students pursuing the Bachelor of Arts degree may not earn more than 45 hours of psychology credit toward graduation and must meet foreign language proficiency requirements at the second-year level. For the Bachelor of Science degree, students must meet foreign language proficiency requirements at the first-year level. A minor in psychology is offered for students who want to gain helpful knowledge of behavior relevant to a wide range of fields including business, communication, public relations, criminal justice, education, health sciences, the humanities, law, and other social sciences.

## Sociology

Sociology is a behavioral sciences that describe and explain social behavior, while gerontology is an occupation in which knowledge from the behavioral sciences is applied to societal needs in aging, public health, and the life course.

Sociologists study how behavior is influenced by our social environment, including the informal groups and larger social organizations to which we belong. Anthropologists study cultural diversity in societies around the world. Sociologists, anthropologists, and gerontologists study such diverse topics as deviant behavior and crime, environmental studies, family related issues, aging, and health care. The knowledge developed is widely used in social planning and business.

The study of sociology and anthropology prepares students for a wide range of occupations in industry and government. Sociology and anthropology are excellent majors for individuals fascinated by groups and the social behavior of people. Sociology and anthropology majors are well-prepared to pursue graduate work in sociology, social work and counseling, criminal justice, law, public health, community outreach, cultural resource management, non-profit and governmental agencies, human resources and public relations, and research and data analysis. Career advancement in social work requires a master's degree, and the program is designed to provide students with the knowledge base required by social work graduate programs.

## Minors

Students majoring in such disciplines as business, public health, communication, nursing, psychology, political science, pre-law, or history will find departmental courses relevant to their studies and are encouraged to pursue one of the minors of the department.

## Anthropology Minor (18 hours)

Anthropology 200, 207 and 12 additional credits of anthropology courses.

## Criminal Justice Minor (18 hours)

Criminal Justice 205, 210 plus any four additional criminal justice courses. Cognitive Science Minor (18 hours)
Cognitive Science 111, 498; Neuroscience 125; and any three of the following: Neuroscience 357; Philosophy 345, 447, 451; Psychology 355, 366. Substitutions for the three elective courses are permitted with pertinent courses from other areas with the approval of the director of cognitive science. These can include courses from anthropology, biology, cognitive science, computer science, economics, education, engineering, mathematics, or other courses from philosophy or psychology.

## Cognitive Science Minor (18 hours)

Cognitive Science 111, 498; Neuroscience 125; and any three of the following: Neuroscience 357; Philosophy 345, 447, 451; Psychology 355,366 . Substitutions for the three elective courses are permitted with pertinent courses from other areas with the approval of the director of cognitive science. These can include courses from anthropology, biology, cognitive science, computer science, economics, education, engineering, mathematics, or other courses from philosophy or psychology.

## Legal Studies Minor (18 hours)

Legal Studies 125 and 345, two courses from Criminal Justice 342 (or Legal Studies 343), Law 201, or Political Science 363, and six hours from: ACCT-329, ACCT-330, CJ-380, CJ-420, LAW-300, LAW-302, LAW304, LAW-308, COMM-485, EXSS-310, PSYC-320, PSYC-420, PSCI-435,. EX-440, GT-409, HIST-340, or HSA-406.
Neuroscience Minor (20 hours)
Neuroscience 125, 126, 355, 360; and at least 11 hours from: Biology 333 ; Cognitive Science 498 ; Neuroscience $357,358,411$, or 499; Psychology 366, 450, or 466.

## Philosophy Minor (18 hours)

Eighteen hours in Philosophy, whcih may include Cognitive Science 498

Preprofessional Social Work Minor (21 hours)
Sociology 105, 230 or $330,335,386$ or 460, 438; Social Work 120, and Criminal Justice 410.

## Psychology Minor (18 hours)

Psychology 121 and a minimum of 15 hours in psychology electives, at least 6 of which are at the 300 - or 400 -level, selected in consultation with major advisor and psychology minor advisor
Social and Human Services Minor (21 hours)
Sociology 230 and Social Work 120, either Public Health 190 or 195, and twelve hours of elective credits selected in consultation
with the Sociology advisor. Courses must be from at least 2 disciplines: COMM 410, CJ 205, 360, 370, 380, 410, PSYC 225, 226, 259, 320, 379, PH 340, 360, 401, 415, 480, SOC 330, 335, 337, 386, 438, or 460 .

Sociology Minor (18 hours)
Sociology 105, 230 plus 12 additional credits of sociology courses; Anthropology 453 is also an option.
Gerontology Certificate (12 hours)
Four courses from: Gerontology 225, 401, 403, 405, 407, 410, 411, 496 or Sociology 460.
A Gerontology Certificate is awarded following completion of a prescribed course of study in gerontology. A certificate may be earned by professionals who are already involved in their careers or by current students as a part of their bachelor's degree. In past years, students in nursing, sociology, social work, music therapy, physical therapy, pre-medicine, and psychology have taken advantage of this opportunity to learn about aging. Completing a Gerontology Certificate requires 12 hours of interdisciplinary course work. As a rule, three course modules are offered each semester, including during the 10 -week summer session.
To find out more about the Gerontology Certificate program contact Dr. Mari Plikuhn, Director of the Gerontology Center at mp168@evansville.edu.
Pre-law Advising
Students planning to enter the legal profession are advised to pursue baccalaureate degrees in academic areas best suited to their interests. Law schools are most interested in students who can communicate effectively, read comprehensively, and think critically. Because admission requirements of law schools vary, students need to become acquainted with the admission process of the schools they hope to attend.
Study in English, economics, foreign language, history, legal studies, logic and philosophy, mathematics, political science, and sociology is recommended. Most law schools do not require a specific pattern of courses, nor do they stipulate majors for concentrated study; however, students must select an undergraduate major and complete requirements for that major in order to graduate. A course of study should be carefully planned with the prelaw advisor and the Law School Admission Test should be taken in conjunction with application to law school. For more information, contact the pre-law advisor, Dr. Kevin Gray.
Internships
Internships are available to majors of junior or senior standing who have completed the core courses. While internships are recommended for all sociology majors, certain GPA requirements must be met, and students must file an internship application with their advisor. For more details, please consult the Sociology Student Handbook.

## Bachelor of Arts

## CRIMINAL JUSTICE

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Intro to Sociology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- CJ 450: Senior Seminar in Criminal Justice (or SOC 450)

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Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (42 hours)
CJ 201: Prof Develop in Criminal Justice ( 1 hr )
CJ 205: Intro to Criminal Justice (3 hrs)
CJ 210: Deviance and Crime (3 hrs)
CJ 360: The Correctional System (3 hrs)
CJ 370: The Police (3 hrs)
CJ 410: Juvenile Delinquency (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 343: Social Research Methods (4 hrs)
SOC 438: Race and Ethnic Relations (3 hrs)
Complete one course from:
SOC 344: Introduction to Behavioral Statistics (4 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
Complete one course from:
SOC 327: Human Behavior/Social Environment (3 hrs)
PSYC 229: Social Psychology (3 hrs)
Complete one course from:
CJ 342: Criminal Law (3 hrs)
CJ 380: Courts and Justice (3 hrs)
Complete two courses from (minimum 4 hrs ):
CJ 342: Criminal Law (3 hrs)
CJ 380: Courts and Justice (3 hrs)
CJ 301: Special Topics - Criminal Justice (3 hrs)
CJ 354: Intro to Forensic Science (3 hrs)
CJ 420: International Crime and Justice (3 hrs)
CJ 440: Criminal Justice Ethics (3 hrs)
CJ 496: Internship (1-6 hrs)
PSYC 320: Psych and the Law (3 hrs)
PSYC 420 (3 hrs)
PSCI/LS 420 (3 hrs)
Free Electives (34 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## CRIMINAL JUSTICE

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Intro to Sociology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- CJ 450: Senior Seminar in Criminal Justice (or SOC 450)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (42 hours)
CJ 201: Prof Develop in Criminal Justice (1 hr)
CJ 205: Intro to Criminal Justice (3 hrs)
CJ 210: Deviance and Crime (3 hrs)
CJ 360: The Correctional System (3 hrs)
CJ 370: The Police (3 hrs)
CJ 410: Juvenile Delinquency ( 3 hrs )
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 343: Social Research Methods (4 hrs)
SOC 438: Race and Ethnic Relations (3 hrs)
Complete one course from:
SOC 344: Introduction to Behavioral Statistics (4 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
Complete one course from:
SOC 327: Human Behavior/Social Environment (3 hrs)
PSYC 229: Social Psychology (3 hrs)
Complete one course from:
CJ 342: Criminal Law (3 hrs)
CJ 380: Courts and Justice (3 hrs)
Complete two courses from (minimum 4 hrs):
CJ 342: Criminal Law (3 hrs)
CJ 380: Courts and Justice (3 hrs)
CJ 301: Special Topics - Criminal Justice (3 hrs)
CJ 354: Intro to Forensic Science (3 hrs)
CJ 420: International Crime and Justice (3 hrs)
CJ 440: Criminal Justice Ethics (3 hrs)
CJ 496: Internship (1-6 hrs)
PSYC 320: Psych and the Law (3 hrs)
PSYC 420 (3 hrs)
PSCI/LS 420 ( 3 hrs )
Free Electives (40 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## COGNITIVE SCIENCE

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading \& Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity -

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- PHIL 231: Symbolic Logic

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- NEUR 125: Intro to Behavioral Science
- 

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (38 hours)
COGS 111: Introduction to the Mind ( 3 hrs )
COGS 350: Brains, Bodies, and Environment (3 hrs_
COGS 498: Seminar in Cognitive Science (3 hrs)
NEUR 126: Neuroscience Techniques (2 hrs)
PHIL 445: History and Philosophy of Science (3 hrs)
PHIL 447: Mind, Brain and Action (3 hrs)
PSYC 201" Psychology- Field of Application (1 hr)
PSYC 355: Sensation and Perception (3 hrs)
PSYC 366: Cognitive Psychology (3 hrs)
PSCY 464: Psycholinguistics (3 hrs)

## Proseminar

Students may take the course for one hour of credit no more than three times.
COGS 100: Proseminar in Cognitive Science ( $0-1 \mathrm{hr}$ )
COGS 200: Proseminar in Cognitive Science ( $0-1 \mathrm{hr}$ )
COGS 300: Proseminar in Cognitive Science ( $0-1 \mathrm{hr}$ )
COGS 400: Proseminar in Cognitive Science (0-1 hr)
Methods
Complete one specialty area below.
Biology
BIOL 107: General Biology (4 hrs)
BIOL 320: Evolution and Ecology (4 hrs)
Computer Science
CS 210: Fundamentals of Programming I (3 hrs)
CS 215: Fundamentals of Programming II (3 hrs)
CS 290: Object Oriented Design (3 hrs) OR
CS 315: Software Engineering (3 hrs)
Economics
ECON 300: Regression Analysis (3 hrs)
ECON 400: Econometrics (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
Mathematics
MATH 365: Probability (3 hrs)
MATH 370: Discrete and Combinatorial Math (3 hrs)
MATH 373: Numerical Methods (3 hrs) OR
MATH 466: Mathematical Statistics (3)
Psychology
PSYC 245: Statistics for Psychologists (4 hrs)
PSYC 246: Research Methods in Psychology (4 hrs)
Data Science
STAT 266: Introductory Statistics with R (3 hrs)
STAT 267: Experimental Design (3 hrs)
STAT 361: Linear Models (3 hrs) OR
STAT 362 : Machine Learning (3 hrs)

Free Electives (41 hours)

39 Hours of 300/400 level coursesS

## Bachelor of Science

## NEUROSCIENCE

2023-2024 | 122 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

- PHIL 121 (ETH 121) or PHIL 317

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus or MATH 221: Calculus I

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry
- BIOL 119: Intro Biology: Molecular Perspectives

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
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Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (59 hours)
BIOL 120: Intro Biology: Organismal Diversity (4 hrs)
BIOL 331: Genetics (4 hrs)
BIOL 427: Animal Physiology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
CHEM 341: Organic Chemistry II (5 hrs)
CHEM 370: Biochemistry I (3 hrs)
CHEM 371: Biochemistry I Lab (1 hrs)
NEUR 125: Introduction to Neuroscience (3 hrs)
NEUR 126: Neuroscience Techniques (2 hrs)
NEUR 355: Sensation and Perception (3 hrs)
NEUR 360: Neuropharmacology (3 hrs)
NEUR 411: Molecular Neuroscience (3 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
PSYC 246: Research Methods in Psychology (4 hrs)
Complete one course from:
NEUR 479: Research in Neuroscience ( 0 hrs )
NEUR 489: Internship in Neuroscience (0)
TRACK
Complete 12 hours from one of the tracks below:
Behavioral Neuroscience Track
BIOL 333: Animal Behavior (3 hrs)
COGS 498: Seminar in Cognitive Science (3 hrs)
NEUR 499: Special topics in Neuroscience (1-3 hrs)
PSYC 259: Abnormal Psychology (3 hrs)
PSYC 366: Cognitive Psychology (3 hrs)
PSYC 450: Learning (3 hrs)
PSYC 466: Cognitive Development (3 hrs)
4 hours may be from one of the following:
PHYS 121: Algebra Physics I (4 hrs)
PHYS 122: Algebra Physics II (4 hrs)
PHYS 210: Calculus Physics I (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Molecular Neuroscience Track
BIOL 340: Cellular and Molecular Biology (4 hrs)
BIOL 425: Developmental Biology (4 hrs)
CHEM 360: Quantitative Analysis (4 hrs)
CHEM 473: Biochemistry (3 hrs)
CHEM 474: Biochemistry (1 hrs)
NEUR 499: Special topics in Neuroscience (1-3 hrs)
PSYC 416 Human Sexuality (3 hrs)
4 hours may be from one of the following:
PHYS 121: Algebra Physics I (4 hrs)
PHYS 122: Algebra Physics II (4 hrs)
PHYS 210: Calculus Physics I (4 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Free Electives (21 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## PSYCHOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(47 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- NEUR 125: Introduction to Neuroscience (min. grade of C-)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- PSYC 490: Senior Review and Thesis

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (39 hours)
PSYC 121: Intro to Psychology (3 hrs)
PSYC 201: Psych: Fields of Application (1 hr)
PSYC 229: Social Psychology (3 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
PSYC 246: Research Methods in Psychology (4 hrs)
PSYC 259: Abnormal Psychology (3 hrs)
NEUR 125: Introduction to Neuroscience (3 hrs)
Complete one course from:
PSYC 225: Lifespan Development (3 hrs)
PSYC 226: Child and Adolescent Psychology (3 hrs)
Complete 15 hours from PSYC
COGS 498 - Seminar in Cognitive Science can substitute for one of these courses.

Free Electives (34 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## PSYCHOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- NEUR 125: Introduction to Neuroscience (min. grade of C-)
- 

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- PSYC 490: Senior Review and Thesis

Overlay: Writing Across the Curriculum (4 courses)
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-

Major Requirements (39 hours)
PSYC 121: Intro to Psychology (3 hrs)
PSYC 201: Psych: Fields of Application (1 hr)
PSYC 229: Social Psychology (3 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
PSYC 246: Research Methods in Psychology (4 hrs)
PSYC 259: Abnormal Psychology (3 hrs)
NEUR 125: Introduction to Neuroscience (3 hrs)
Complete one course from:
PSYC 225: Lifespan Development (3 hrs)
PSYC 226: Child and Adolescent Psychology (3 hrs)
PSYCHOLOGY ELECTIVES
Complete an additional 15 hours in Psychology. COGS 498: Seminar in Cognitive Science can substitute for one of these courses.
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Free Electives (40 hours)

39 Hours of 300/400 level courses

## Bachelor of Arts

## SOCIOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)*
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Intro to Sociology (min. grade of C- required)*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- SOC 450: Senior Seminar in Sociology

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements (43 hours)*
SOC 105: Intro to Sociology (3 hrs)*
ANTH 207: Cultural Anthropology (3 hrs)
SOC 201: Professional Development Sociology ( 1 hr )
SOC 210: Deviance and Crime (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 343: Social Research Methods (4 hrs)
SOC 390: Principles of Sociological Theory (3 hrs)

SOC 438: Race and Ethnic Relations (3 hrs)
SOC 496: Internship (1 hr) OR
SOC 497: Internship in Teaching Sociology (1 hr)
Complete one course from:
SOC 327: Human Behavior Social Environment (3hrs)
PSYC 229 Social Psychology (3 hrs)
Complete one course from:
SOC 344: Introduction to Behavioral Statistics (4 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)

## SPECIALTY AREAS

Choose ONE of the following:

Anthropology Specialization (INACTIVE Specialization 2022)
Complete 12 hours from 300/400 level ANTH.
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-

## General Specialization

Complete 12 credits of 300/400 level SOC.
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-
-

Gerontology Specialization**
GT 401: Biology, Health \& Personality Dimensions of Aging (3 hrs)
GT 225: Lifespan Development (3 hrs)
GT 496: Internship (1 hr)
PH 190: Introduction to Public Health (3 hrs)
Complete 3 credits from:
GT 403: Later Life and Spirituality (3 hrs)
GT 405: Institutional Care and Geriatric Assessment (3 hrs)
GT 407: Economics of Aging and Social Policies (3 hrs)
GT-410: Special Topics in Gerontoloy (3 hrs)
GT-411: Aging and Elders in Film (3 hrs)
Complete 3 credits from:
HSA 405: Health Care Systems (3 hrs)
PH 401: Epidemiology (3 hrs)
SOC 337: Social Aspects Health/Care (3 hrs)
SOC 386: Death and Dying (3 hrs)
SOC 460: Aging and Society (3 hrs)

Free Electives (30 hours minimum)
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
** Gerontology specialization: Free Electives (27 hours)
39 Hours of 300/400 level courses

## Bachelor of Science

## SOCIOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
utcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- SOC 105: Intro to Sociology (min. grade of C- required)*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

- SOC 450: Senior Seminar in Sociology

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
Major Requirements (43 hours)
SOC 105: Intro to Sociology (3 hrs)*
ANTH 207: Cultural Anthropology (3 hrs)
SOC 201: Professional Development Sociology ( 1 hr )
SOC 210: Deviance and Crime (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 343: Social Research Methods (4 hrs)
SOC 390: Principles of Sociological Theory (3 hrs)
SOC 438: Race and Ethnic Relations (3 hrs)
SOC 496: Internship (1 hr) OR

SOC 497: Internship in Teaching Sociology (1 hr)
Complete one course from:
SOC 327: Human Behavior Social Environment (3hrs)
PSYC 229 Social Psychology (3 hrs)
Complete one course from:
SOC 344: Introduction to Behavioral Statistics (4 hrs)
PSYC 245: Statistics for Psychologist (4 hrs)
SPECIALTY AREAS
Choose ONE of the following:

Anthropology Specialization (INACTIVE Specialization 2022)
Complete 12 hours from 300/400 level ANTH.
-
-
-
General Specialization
Complete 12 credits of 300/400 level SOC.
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-
-
Gerontology Specialization**
GT 401: Biology, Health \& Personality Dimensions of Aging (3 hrs)
GT 225: Lifespan Development (3 hrs)
GT 496: Internship (1 hr)
PH 190: Introduction to Public Health (3 hrs)
Complete 3 credits from:
GT 403: Later Life and Spirituality (3 hrs)
GT 405: Institutional Care and Geriatric Assessment (3 hrs)
GT 407: Economics of Aging and Social Policies (3 hrs)
GT-410: Special Topics in Gerontology (3 hrs)
GT-411: Aging and Elders in Film (3 hrs)
Complete 3 credits from:
HSA 405: Health Care Systems (3 hrs)
PH 401: Epidemiology (3 hrs)
SOC 337: Social Aspects Health/Care (3 hrs)
SOC 386: Death and Dying (3 hrs)
SOC 460: Aging and Society (3 hrs)

Free Electives (36 hours minimum)
*Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
**Gerontology specialization: Free Electives ( 33 hours)
39 Hours of 300/400 level courses

# Bachelor of Fine Arts or Bachelor of Science with a Major in Theatre Performance 

Bachelor of Fine Arts or Bachelor of Science<br>with a Major in Theatre Design and Technology

Bachelor of Science with a Major in Stage Management

Bachelor of Science with a Major in Theatre Studies

## Bachelor of Science with a Major in Theatre Management

The courses of study in theatre are offered for students who plan careers in professional theatre or intend to continue their study at the graduate level and for those seeking an intellectual and aesthetic appreciation of theatre as a complement to a broad liberal arts and sciences education

## Theatre Admission Requirements

To seek admission into the Department of Theatre, new students must make formal application to the University as well as audition for or interview with the Department of Theatre faculty. This requirement applies also to transfer students and students currently enrolled at the University of Evansville who are seeking entry or re-entry into the department. Acceptance based on University admission requirements and the audition or interview will classify the new theatre student as provisional. Admission to full candidacy status for one of the several theatre degree programs will be granted after students have satisfactorily completed the specific number of lower-division courses. Students also are expected to demonstrate potential appropriate to the goals established for the degree and major they are pursuing. Although full candidacy will usually be granted at the end of the first year, circumstances may require earlier or later acceptance. All students and their degree programs will be reviewed annually by the theatre faculty. Retention is contingent upon the student having met the guidelines outlined in the Theatre Handbook and satisfactory completion of the review process.

## Bachelor of Fine Arts

The Bachelor of Fine Arts degree with a concentration in theatre is designed for students seeking professional training and desiring an intensive program in theatre curriculum. Students following this degree program pursue a course of study with a high degree of specialization in either theatre performance (acting or directing) or theatre design and technology (scene, light, costume, sound design, and technical direction). The philosophy of the BFA degree program is to encourage students to explore the total theatre experience by developing an overall view of theatre as an art form while perfecting specific career specializations within the liberal arts and sciences environment.

Theatre Performance Major: The primary emphasis of this curriculum is actor training with its attendant disciplines. Students may also develop a secondary emphasis in directing.

Theatre Design and Technology Major: Students are directed toward the development of design skills (scenic, lighting, sound, and costume) as well as technical theatre.

## Bachelor of Science

The Bachelor of Science degree with a concentration in theatre is designed for students who wish to concentrate in theatre as well as explore other disciplines. The curriculum allows the student to develop, with advisor approval, a broad-based educational program that meets individual desires and abilities. This degree is particularly suitable for students who wish to study theatre without confining themselves to a particular area of specialization, but it can also allow students to enhance areas of specialization with a closely related program of study (e.g., a theatre design student with an associated study in art or a theatre performance student with an associated study in literature). Students pursuing the BS degree choose one of five majors: theatre performance, theatre design and technology, stage management, theatre studies, or theatre management.

The Bachelor of Science with a major in stage management combines classes in theatre, management, and communications for the student interested in a career in stage management. This curriculum allows the student to develop a broad-based educational program that meets individual desires and abilities while specializing in stage management. Students are allowed to enhance this area of specialization with a closely related program of study through the requirement of an associated study.

The Bachelor of Science with a major in theatre studies allows students with broad interests in the theatre to explore an in-depth education in multiple areas of the theatre. The free electives allow for individual customization of this degree with additional courses in theatre or other areas of interest, including associated studies or minors.

The Bachelor of Science with a major in theatre management combines theatre, business, and communication studies for the student interested in a career in arts management and administration. Because of its dual emphasis, this program has different departmental requirements for general education, core curriculum, and theatre practicum, and it includes a minor in business administration.

## Bachelor of Fine Arts

## THEATRE PERFOMANCE

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 465: Senior Seminar in Theatre OR THTR 472: Acting VIII: Advanced Project
Overlay: Writing Across the Curriculum (4 courses)
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## Major Requirements ( 60 hours)

Foundational Courses ( 15 hrs .)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Pro-
cess Awareness (Select One)
THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories

Practicum Component (6 hrs.) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component (3 hrs.) (Select Two)
-THTR 363: Period Styles for Theatre: Architecture \& Décor
THTR 364: Period Styles for Theatre: Costume History
THTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Performance Core (18 hrs.)
THTR 172: Process Awareness
THTR 271: Acting III OR THTR 272: Acting IV (Select One):
THTR 371 Acting V
THTR 245: Dance I, THTR 246: Dance I, THTR 345: Dance II, OR
THTR 346: Dance II (Select One)
THTR 481: Directing I
ENGL 350: Shakespeare
APM 123, 124, 223, 224, 323, 324, 423, OR 424 (Select One)
Performance Electives (Acting, Dance, Voice, \& Directing) (6 hrs.)
-
-
Non-Performance Elective in Theatre (3 hrs.)
-

Theatre Electives ( 6 hrs.)
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Free Electives (19 hours)
Must include 3 credits from fine arts, outside of Theatre.

39 Hours of 300/400 level courses

This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time.
Please see the automated degree audit on Student Planning for the most up-to-date program information.

## Bachelor of Science

## THEATRE PERFORMANCE

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 465: Senior Seminar in Theatre OR THTR 472: Acting VIII: Advanced Project


## Overlay: Writing Across the Curriculum (4 courses)

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## Major Requirements (66 hours)

THTR 111: Fundamentals of Acting (3 hrs) OR
THTR 171: Acting I: Process Awareness (3 hrs)
THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories
Practicum Component (6 hrs.) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component (3 hrs.) (Select One)
THTR 363: Period Styles for the Theatre: Architecture \& Décor
THTR 364: Period Styles for the Theatre: Costume History
-HTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ENGL 350: Shakespeare
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Performance Core (12 hrs.)
THTR 112 Fundamentals of Acting OR THTR 172: Process
Awareness
THTR 271: Acting III OR THTR 272: Acting IV
THTR 245: Dance I OR THTR 246: Dance I OR THTR 345: Dance
II OR THTR 346: Dance II (Select One)
THTR 481: Directing I
APM 123, 124, 223, $224,323,324,423$, OR 424 (Select One)
Performance Electives (Acting, Dance, Voice, \& Directing) (9
hrs.)
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-
Associated Study Outside of Theatre (21 hrs.)
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Free Electives (13 hours)
Must include 3 credits from fine arts, outside of Theatre.
39 Hours of 300/400 level courses

## Bachelor of Fine Arts

## THEATRE DESIGN AND TECHNOLOGY

## 2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435: Senior Portfolios Career Prep OR THTR 465: Senior Seminar in Theatre

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (63 hours)
Foundational Courses (15 hrs.)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Pro-
cess Awareness (Select One)
THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories
Practicum Component (6 hrs.) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component (6 hrs.) Course 1
THTR 382: Dramaturgy II: Research Methods Course 2 (Select
One)
THTR 363: Period Styles for Theatre: Architecture \& Décor
THTR 364: Period Styles for Theatre: Costume History
THTR 381: Philosophies and Ethics of Theatre
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Design and Technology Core (15 hrs.)
THTR 120: Production Techniques
THTR 135: Graphic Communication for the Theatre
THTR 220: Production Techniques II OR THTR 221: Production
Techniques III OR THTR 225: Makeup OR THTR 226: Costume
Construction (Select One)
THTR 335: Scene Design OR THTR 336: Lighting Design OR
THTR 337: Costume Design (Select One)
ENGL 350: Shakespeare
Theatre Electives (21 hrs.)
-3-hr. Non-Design/Technology Elective in Theatre
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Free Electives (16 hours)
Must include 3 credits from fine arts, outside of Theatre.

## 39 Hours of 300/400 level courses

## Bachelor of Science

## THEATRE DESIGN AND TECHNOLOGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements
(41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: ( 6 hrs ) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
.

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435: Senior Portfolios Career Prep OR THTR 465: Senior Seminar in Theatre
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (66 hours)
Foundational Courses (15 hrs.)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Process
Awareness (Select One)
THTR 125: Introduction to Makeup & Costumes
THTR 130: Color & Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories
Practicum Component (6 hrs.) (Each course taken twice)
THTR 190:Theatre Practicum
THTR 290: Theatre Practicum
THTR 390:Theatre Practicum
Historical Component (3 hrs.)
THTR 382: Dramaturgy II: Research Methods
Design and Technology Core (12 hrs.)
THTR 120: Production Techniques
THTR 135: Graphic Communication for the Theatre
THTR 220: Production Techniques II OR THTR 221: Production
Techniques III OR THTR 225: Makeup OR THTR 226: Costume Con-
struction (Select One)
THTR 335: Scene Design OR THTR 336: Lighting Design OR THTR
337: Costume Design (Select One)
Theatre Electives - 9 hours
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Associated Study - 21 hours (outside of Theatre)
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Free Electives (16 hours)
Must include 3 credits from fine arts, outside of Theatre.

39 Hours of 300/400 level course

## Bachelor of Science

## STAGE MANAGEMENT

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435: Senior Portfolios Career Prep OR THTR 465: Senior Seminar in Theatre
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 72 hours)
Foundational Courses (15 hrs.)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Process
Awareness (Select One)
THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories

Practicum Component ( 6 hrs .) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 291: Theatre Practicum for Stage Managers
THTR 391: Theatre Practicum for Stage Managers
Historical Component (3 hrs.) (Select One)
THTR 363: Period Styles for Theatre: Architecture \& Décor
THTR 364: Period Styles for Theatre: Costume History
THTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ENGL 350: Shakespeare
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Stage Management Core (30-42 hrs.)
THTR 120: Production Techniques
THTR 135: Graphic Communication for the Theatre
THTR 220: Production Techniques II OR THTR 221: Production
Techniques III OR THTR 225: Makeup OR THTR 226: Costume Con-
struction (Select One)
THTR 335: Scene Design OR THTR 336: Lighting Design OR THTR
337: Costume Design (Select One)
THTR 350: Stage Management
THTR 400: Theatre Management
THTR 481: Directing
THTR 499: Internships in Theatre (0-12 hrs.)
ACCT 210: Intro to Financial Accounting
COMM 388: Organizational Communication
MGT 377: Organizational Behavior
Complete 21 hours outside of Theatre
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Free Electives (7 hours)
Must include 3 credits from fine arts, outside of Theatre.

39 Hours of 300/400 level courses

## Bachelor of Science

## THEATRE MANAGEMENT

## 2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

- PHIL 121: Introduction to Ethics

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435-Senior Portfolios Career Prep OR

THTR 465: Senior Seminar in Theatre, OR THTR 472: Acting III: Advanced Project
Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements (54 hours)
Foundational Courses ( 15 hrs .)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Process Awareness (Select One)
THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories

Practicum Component (4 hrs.)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component (3 hrs.) (Select One)
THTR 363: Period Styles for Theatre: Architecture \& Décor
THTR 364: Period Styles for Theatre: Costume History
THTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ENGL 350: Shakespeare
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Theatre Management Core ( 36 hrs .)
THTR 120: Production Techniques
THTR 400: Theatre Management
THTR 450: Arts Leadership
ACCT 210: Intro to Financial Accounting
ART 213: Computer Graphics
COMM 251: Principles of Multimedia
FIN 361: Fundamentals of Finance
LAW 201: Legal Environment of Business
MGT 377: Organizational Behavior
MKT 325: Principles of Marketing
QM 160: Introduction to Data Analytics
COMM 485: Media Law and Ethics OR THTR 499: Internships in Theatre (Select One)
MGT 306: Human Resources Ethics OR THTR 499: Internships in
Theatre
WRTG 204: Copy Editing
Theatre Electives ( 9 hrs .)
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-
-
300/400 Level Business Electives (6 hrs.)
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39 Hours of 300/400 level courses

## Bachelor of Science

## THEATRE STUDIES

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 102: Principles of Microeconomics
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435: Senior Portfolios Career Prep OR THTR 465: Senior Seminar in Theatre

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements (79 hours)
Foundational Courses ( 15 hrs .)
THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Process Awareness (Select One)

THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories

Practicum Component (6 hrs.) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component (6 hrs.) Course 1 (Select One) THTR 363: Period Styles for the Theatre: Architecture \& Décor THTR 364: Period Styles for the Theatre: Costume History THTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods Course 2 (Select One)
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Theatre Studies Core (24 hrs.)
THTR 112 Fundamentals of Acting OR THTR 172: Process Awareness (Select One)
THTR 120: Production Techniques I
THTR 135: Graphic Communication for the Theatre
THTR 172: Acting II: Process Awareness
THTR 335: Scene Design OR THTR 336: Lighting Design OR THTR 337: Costume Design (Select One)
THTR 350: Stage Management OR THTR 400: Theatre Management (Select One)
THTR 440: Director/Designer Collaboration
ENGL 350: Shakespeare
Theatre Elective (3 hrs.)
-
Free Electives ( 25 hours)

- 3-hr. Fine Arts course outside of Theatre
- 
- 

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39 Hours of 300/400 level courses

## Bachelor of Science

## DIRECTING AND DRAMATURGY

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- THTR 435: Senior Portfolios Career Prep OR THTR 465: Senior Seminar in Theatre
Overlay: Writing Across the Curriculum (4 courses)
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## Foundational Courses ( 15 hrs .)

THTR 111: Fundamentals of Acting OR THTR 171: Acting I: Process Awareness (Select One)

THTR 125: Introduction to Makeup \& Costumes
THTR 130: Color \& Design for Theatre
THTR 160: Dramaturgy I: Script Analysis
THTR 251: Introductory Survey of Theatre Histories

Practicum Component (6 hrs.) (Each course taken twice)
THTR 190: Theatre Practicum
THTR 290: Theatre Practicum
THTR 390: Theatre Practicum
Historical Component ( 6 hrs.) Course 1 (Select One)
THTR 363: Period Styles for the Theatre: Architecture \& Décor
THTR 364: Period Styles for the Theatre: Costume History
THTR 381: Philosophies and Ethics of Theatre
THTR 382: Dramaturgy II: Research Methods Course 2 (Select One)
ARTH 208: Survey of Art 1
ARTH 209: Survey of Art 2
BRIT 230: British Studies: Literature Perspective
BRIT 330: British Studies: Literature Perspective
ID 200: International Cinema
ID 250: Myths of the Greeks
MUS 155: Music and Film
MUS 156: Music in America
MUS 158: Jazz History
MUS 159: History of Musical Theatre
Directing and Dramaturgy Core (33 hrs.)
THTR 112 Fundamentals of Acting OR THTR 172: Process Awareness
THTR 120: Production Techniques I
THTR 135: Graphic Communication for the Theatre
THTR 335: Scene Design OR THTR 336: Lighting Design OR THTR
337: Costume Design
-THTR 350: Stage Management OR THTR 400: Theatre Management (Select One)
THTR 371: Acting V: Classical Texts OR ENGL 350: Shakespeare (Select One)
THTR 440: Director/Designer Collaboration
THTR 481: Directing I
THTR 482: Directing II
ART 213: Computer Graphics OR COMM 251: Principles of Multimedia (Select One)
COMM 380: Intercultural Communication

A ChangeLab Course (3 hrs.)
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Free Electives (13 hours)

39 Hours of 300/400 level courses

Bachelor of Arts with a Major in Art History

Bachelor of Arts with a Major in Philosophy

Bachelor of Science with a Major in Religion

The following programs became inactive in the fall of 2021. While they are inacitve programs there are still current students completing the programs but no new students are able to complete these programs.

## Art History

The art history major offers a baccalaureate degree as preparation for graduate study in art history or for careers related to the visual arts, as well as providing an excellent liberal arts education. The program is international in scope, offering study at the Evansville campus and Harlaxton College. Internships in major art institutions are recommended. The program offers an emphasis in ancient art and archaeology, Renaissance, Baroque, eighteenth, nineteenth, and twentieth century art, with hands-on experience in museum collections. Students are encouraged to begin their course of study with surveys of art (Art History 208 and 209) to establish a basis for more advanced courses. Independent study and seminar classes are also available to permit individual research projects supervised by a member of the faculty.

## Philosophy

Philosophy fosters an appreciation for the role of critical thinking in all aspects of life. It is a humanities-based discipline that makes students aware of perennial issues confronting human beings, particularly respecting their place within society, their claim to knowledge, and their commitment to values. As such, the philosophy major provides students with the tools they need to succeed in a variety of graduate programs, including philosophy, religion, political science, law, and business. The philosophy minor supplements other majors by affording students the opportunity to build their own program.

## Religion

A major in religion that allows students the opportunity to work closely with an advisor to select courses that meet their individual goals and interests. By doing so, the religion major provides outstanding preparation for seminary or graduate study in religion, an excellent foundation for pre-law or pre-medicine, a comprehensive education for work in nonprofit areas or various aspects of ministry, and a well-rounded liberal arts curriculum for those who find religious questions and issues compelling.

## Art History Minor (18 hours)

A minor in art history is recommended for students majoring in anthropology, archaeology, communication, English, history, international business, international studies, languages, nursing, philosophy, political science, religion, or in any area of study where a broad knowledge of Western culture is essential.

Art History 208, 209, 389; one from Archaeology 206, 207, 305, 306, 307, 308, 309, or 311; one from Art History H383, 384, or 385; one from Art History H378, H379, 386, or H387
New Testament Greek Minor (19 hours)
The department offers a minor in the language of the New Testament to develop skills in using ancient Greek to study and interpret biblical texts.
Greek 211, 212; one from Greek 351, 371, 411, or 421; Religion 320, 330; Religion 435, normally taken in conjunction with the upper level biblical studies course above

Religion Minor (18 hours)
The religion minor consists of any eighteen hours in religion. Students may take ETH 200 (Social Justice Movements), ANTH 453 (Anthropology of Religion), and/or GRK 371 (New Testament Greek Exegesis) toward their religion minor requirements
New Testament Greek Minor (19 hours)
The department offers a minor in the language of the New Testament to develop skills in using ancient Greek to study and interpret biblical texts.

Greek 211, 212; two from Greek 351, 371, 411, or 421; Religion 320, 330; Religion 435, normally taken in conjunction with the upper level biblical studies course above.

## Inactive Programs with in the College of Arts and Sciences

Philosophy Minor (18 hours) (inactive)
Eighteen hours in Philosophy, whcih may include Cognitive Science 498

## Bachelor of Arts

## ART HISTORY (inactive starting

## 2021)

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy -
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlays: Writing Across the Curriculum (4 courses)
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## Bachelor of Arts

## Philosophy (inactive starting

## 2021)

2023-2024 | 120 Hours Required

## Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlays: Writing Across the Curriculum (4 courses)
-
-
-
-

## Bachelor of Arts

## Religion (inactive starting 2021)

## 2023-2024| 120 Hours Required

## Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core, Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
Complete courses or proficiency through the 212 level.
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlays: Writing Across the Curriculum (4 courses)
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Major Requirements (30 hours)
Complete 30 hrs. from Religion. Courses should be selected in close consultation with advisor. At least 18 hrs . must be 300/400 level. Students may take ANTH 453, ETH 200, PHIL 240, and/or GRK 371 towards these requirements

Complete 18 hours from 300/400 REL:
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Complete 12 hours from any level REL:
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Free Electives (49 hours)

39 Hours of 300/400 level course

## College of Business and Engineering

## Beverly Brockman, Dean

The Schroeder Family of School of Business and Adminstration and School of Engineering and Computer Science have combined into one College. The following pages will provide more information about each school and their programs. The Center for Adult Education has also been included in the new College.

## SchroederFamily School ofBusiness Administration

## Beverly Brockman, Schroeder Family Dean

Business administration is an interdisciplinary field of study that leads to dynamic and rewarding careers in global commerce or public service. At the University of Evansville, the business major is based on four important principles. First, the curriculum embraces the spirit of traditional liberal arts and sciences education. Second, the content of the program is global in nature, recognizing the fact that world developments in trade and commerce have come to transcend the boundaries of nations and cultures. Third, degree requirements allow students to reach beyond the traditional limits of business courses to include other areas of study. Finally, students are required to complete internships and are encouraged to take advantage of work opportunities that connect their formal academic training with meaningful experiences in a variety of professional settings.

There is no practical limit to the range of career opportunities for students who prepare themselves carefully for the challenges of global business. In addition, the University of Evansville program offersexcellentpreparationforgraduatestudy inbusiness,law, anda variety of other fields.

## Mission Statement

We prepare undergraduate students in a liberal arts framework to become globally aware business professionals. We are distinctive in experiential learning, career support, and faculty scholarship in a balanced teacher-scholar environment.

## Statement of Principles

Consistent with the values and mission of the University, it is the objective of the Schroeder Family School of Business Administration to produce business alumni who have an integrated understanding of business principles and perspectives necessary for effective leadership. Consequently, students will:

- Master communication, organizational, and critical thinking skills
- Acquire a broad foundation in the liberal arts and sciences through general education together with a depth of knowledge in one or more disciplines of their choice
- Understand the ethical significance of their personal and professional decisions
- Understand the global nature of our world, learn about other cultures, and appreciate diversity and tolerance
- Have the opportunity to participate in international studies programs
- Understand the necessity of being actively involved through involvement in study, internships, and extracurricular activities


## Bachelor of Science in Accounting

Bachelor of Science in Business Administration with a Major in Finance

Bachelor of Science in Business Administration with a Major in Global Business

## Bachelor of Science in Business Administration with a Major in Logistics and Supply Chain Management

Bachelor of Science in Business Administration with a Major in Management

## Objectives of the Degree Programs

The Schroeder Family School of Business Administration offers degree programs in accounting, economics, and business administration.

The principal objective of our programs is to develop potential leaders who have a broad background in the liberal arts, possess an awareness of the social responsibilities of corporate leadership, and have thorough knowledge of fundamental tools of decision-making in a global context. The Bachelor of Science in Accounting degree is offered for students desiring careers in corporate or public accounting. The Bachelor of Science in Business Administration degree is offered with majors in finance, global business, logistics and supply chain management, management, and marketing.

## Requirements for Degree Programs

- Minimum Grade Policy: Students are required to (1) earn a grade of C- or better in the prerequisites for any upper-level Schroeder School courses outside of the business core; (2) earn a grade of C- or better in the prerequisites for MGT 497 (senior seminar); and (3) earn a grade of C- or better in MGT 497.
- Course Level Policy: Normally, students will not enroll in 200-level business courses before the third semester. After completion of the third semester, students may enroll in FIN 361, LSCM 315, MGT 311, MGT 377, or MKT 325 if prerequisites are satisfied. After completion of the fourth semester, students may enroll in other 300- and 400-level business courses for which prerequisites have been satisfied. Exceptions that permit earlier enrollments include but are not limited to the following:
- Students with formal plans to study at Harlaxton or in some other program of study abroad
- Students who wish to avail themselves of opportunities to take 300-and 400-level courses that are offered only on an alternate year basis and for which the alternate year scheduling cycle is stated with the catalog course description
- Students with exceptional preparation through advanced placement or credit by exam that warrants early enrollment
- Students who require preparation specific to the requirements of planned internships
- Minimum GPA requirement: Minimum 2.5 gpa required in each major area of study. A minimum 2.0 gpa must be maintained in the business administration core. Students must also satisfy the university's graduation requirement of 2.0 gpa for total program of study.
- On-line Policy: A maximum of four business core courses and two major courses may be completed online.
- Transfer Credit Policy: Transfer credit not accepted for any business school course previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.
- Double-counting of courses in the business core or across majors is not permitted.
- For transfer students, at least 50 percent of the business credit hours required for a degree from the Schroeder Family School of Business Administration must be earned at the University of Evansville.
- It is recommended that no more than 50 percent of a business student's total credit hours (excluding Economics 101, 102 and Quantitative Methods 160,227) be taken in the Schroeder Family School of Business.
- Students studying outside the Schroeder Family School of Business Administration and planning to earn more than 25 percent of their work in business and economics (excluding Economics 101, 102 and Quantitative Methods 160,227) must earn a Bachelor of Science in Accounting or a Bachelor of Science in Business Administration.

Bachelor of Science in Business Administration with a Major in Marketing

Bachelor of Science in Business Administration with a Major in Business Anatytics

## Bachelor of Science with a major in Intergrated Business and Engineer-

 ing
## Co-op Program in Business Administration

A cooperative education plan for accounting and business students is available as an alternative to the traditional four-year plan. The co-op plan combines classroom education with full-time work experience in the industry. Please refer to Special Educational Opportunities located in the Degrees, Curriculum, Academic Opportunities section in this catalog.

Business Administration Minor (21 hours)
Accounting 210; Economics 102; Finance 361; Management 377; Marketing 325; six hours of 300- or 400-level courses in the Schroeder Family School of Business Administration for which the student has satisfied the appropriate prerequisites. This excludes internship, independent study, and special topics courses.

In addition to the 21 hours for the minor, the student may take other business courses for which he or she has the appropriate prerequisites; however, no more than nine additional hours in business courses (excluding Economics 101, 102 and Quantitative Methods 160, 227) will apply toward graduation requirements.

## Accounting Essentials Certificate ( 12 hours)

Accounting 210; Accounting 211; Accounting 310; Accounting 311
This Certificate is unavailable to students earning a Bachelor of Science in Accounting degree.

## Advanced Accounting Essentials Certificate (12 hours)

Accounting 317; Accounting 329; Accounting 414; Accounting 300/400 elective
This Certificate is unavailable to students earning a Bachelor of Science in Accounting degree.
Business Essentials Certificate (12 hours)
Accounting 210; Economics 102; Management 377; Marketing 325
This certificate is unavailable to students earning one of the following:
Bachelor of Science in Accounting; Bachelor of Science in Business Administration; Bachelor of Science majoring in economics with a business support area; Business Administration minor.

## Global Business Certificate (12 hours)

Managment 331; 9 hours from Business 365, Economics 425, Economics 435, Finance 426, Logistics and Supply Chain Management 360, Management 392 and Marketing 477

This Certificate is unavailable to students earning a Bachelor of Science in Business Administration degree with a major in Global Business

Logistics and Supply Chain Management Certificate (12 hours)
Logistics and Supply Chain Management 315; 9 hours of Logistics and Supply Chain Management 300/400 electives

This certificate is unavailable to students earning a Bachelor of Science in Business Administration degree with a major in Logistics/Supply Chain Management.
Sales Certificate (9 hours)
Marketing 325; Marketing 330; Marketing 373
This certificate is unavailable to students earning a Bachelor of Science in Business Administration degree with a major in Marketing.

## Bachelor of Science in

## ACCOUNTING

2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (63 hours)
Business Administration Core
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
ACCT 321: Accounting Information Systems (3 hrs)
ACCT 398: Internship in Accounting (3 hrs)**
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400: Skills for Career Success Program (0 hrs)
Accounting Requirements (Double counting of courses across
majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
ACCT 310: Intermediate Accounting I (3 hrs)
ACCT 311: Intermediate Accounting II (3 hrs)
ACCT 317: Cost Accounting (3 hrs)
ACCT 329: Introduction to Taxation (3 hrs)
ACCT 414: Auditing (3 hrs)
Complete 6 hours 300/400 level accounting or business courses
Free Electives (20 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **ACCT 499 Professional Internship may be used to satisfy the requirement for ACCT 398. COOP 091 may be used to satisfy the ACCT 398 requirement but no credit hours will be awarded.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: BUSINESS ANALYTICS

2023-2024 | 124 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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-
-
Major Requirements (60 hours)
Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)

ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
BUS 398: Internship in Business (3 hrs)**
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400: Skills for Career Success Program (0 hrs)
Busienss Analytics Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
STAT 166: Intro to R for Data Science(1 hrs)
STAT 266: Intro to Statistics with R (3 hrs)
STAT 267: Experimental Design (3 hrs)
STAT 188: Data Visualization (3 hrs)
STAT 361: Linear Modeling (3 hrs) or
ECON 300: Regression Analysis (3 hrs)
QM 405: Applied Business Analytics (3 hrs)
Complete 3courses selected from:
ACCT/FIN 455: Financial Analytics(3 hrs)
ECON 400: Econometrics(3 hrs)
MKT 460: Marketing Analytics (3 hrs)
STAT 286: Polling \& Surveying (3 hrs)
STAT 300: Data Analysis in the Real World (3 hrs)
STAT 362: Machine Learning (3 hrs)
STAT 474: Techniques for Large Data Sets (3 hrs)

Free Electives (15 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: FINANCE

2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements ( 60 hours)
Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)

BUS 398: Internship in Business (3 hrs)**
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400: Skills for Career Success Program (0 hrs)
Finance Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
FIN 362: Corporate Financial Policy (3 hrs)
Complete 5 or more courses selected from:
FIN 426: International Financial Management (3 hrs)
FIN 427: Financial Derivatives and Alt. Investments (3 hrs)
FIN 462: Investments (3 hrs)
FIN 470: Financial Institutions and Markets (3 hrs)
FIN 478: Risk Management (3 hrs)
FIN 482: Financial Planning: Process \& Environment (3 hrs)
FIN 380: Special Topics in Finance (3 hrs)
FIN 395: Independent Study (3 hrs)
--May apply 3 hours maximum from the following:
FIN 383: Credit Analysis Lending Practicum I (3 hrs)
FIN 384: Credit Analysis Lending Practicum II (3 hrs)
FIN 385: Wealth Management Practicum I (2 hrs)
FIN 386: Wealth Management Practicum II (2 hrs)
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, LAW, LSCM, MGT, MKT or QM.

Free Electives (23 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: GLOBAL BUSINESS

2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

。
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-
Major Requirements (66 hours)

Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)

LAW 201: Legal Environment of Business (3 hrs) BUS 398: Internship in Business (3 hrs)**<br>FIN 361: Fundamentals of Finance (3 hrs)<br>LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)<br>MGT 311: Management Information Systems (3 hrs)<br>MGT 331: International Business Strategy (3 hrs)<br>MGT 377: Organizational Behavior (3 hrs)<br>MKT 325: Principles of Marketing (3 hrs)<br>BUS 400: Skills for Career Success Program (0 hrs)

Global Business Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
Complete 6 courses selected from the following:
BUS 365: Contemporary European Business Issues (3 hrs) ECON 425: International Trade (3 hrs)
ECON 435: International Monetary Economics (3 hrs)
FIN 426: International Financial Management (3 hrs)
LSCM 360: Global Logistics \& SCM (3 hrs)
MGT 392: Managing Global Relationships (3 hrs)
MKT 477: International Marketing (3 hrs)
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, FIN, LAW, LCSM, MGT, MKT, or QM.

Complete 6 hours of Foreign Language through the 212 level
-
-

Free Electives (17 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.

This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time.
Please see the automated degree audit on Student Planning for the most up-to-date program information.

Bachelor of Science in

## BUSINESS ADMINISTRATION: LOGISTICS AND SUPPLY CHAIN MANAGEMENT

## 2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
.
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-
Major Requirements (60 hours)
Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)

ACCT 211: Introduction to Managerial Accounting (3 hrs) LAW 201: Legal Environment of Business (3 hrs)
BUS 398: Internship in Business ( 3 hrs )**
FIN 361: Fundamentals of Finance ( 3 hrs )
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400: Skills for Career Success Program (0 hrs)
Logistics/Supply Chain Management Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
LSCM 320: Advanced Logistics Management (3 hrs)
LSCM 330: SCM Solutions with SAP (3 hrs)
Complete 4 or more courses from:
LSCM 340-Intro to Six Sigm (3 hrs)
LSCM 350: Humanitarian Logistics (3 hrs)
LSCM 360: Global Logistics \& SCM (3 hrs)
LSCM 370: E-Logistics (3 hrs)
LSCM 380: Special Topics in SCM (3 hrs)
LSCM 390: Contemporary Supply Chain Issues (3 hrs)
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, FIN, LAW, LSCM, MGT, or QM.

Free Electives (23 hrs)

## 39 Hours of 300/400 level courses

NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 can be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: MANAGEMENT

2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
.
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy

- QM 227: Introduction to Statistics (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements (60 hours)

## Business Administration Core

ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)

LAW 201: Legal Environment of Business (3 hrs)
BUS 398: Internship in Business ( 3 hrs )**
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400:Skills for Career Success Program ( 0 hrs )
Management Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
Complete 6 courses selected from the following:
MGT 306: Human Resources (3 hrs)
MGT 380: Special Topics in Management (3 hrs)
MGT 392: Managing Global Relationships (3 hrs)
MGT 395: Independent Study (1-3 hrs)
MGT 402: Compensation and Benefits (3 hrs)
MGT 412: Leadership (3 hrs)
MGT 430: Decision Making (3 hrs)
MGT 469-Entrepreneurship ( 3hrs)
MGT 475: Competitive Dynamics (3 hrs)
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, FIN, LAW, LCSM, MKT, or QM.

Free Electives (23 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of $C$ - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: MARKETING

2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
n QM 227: Introduction to Statistics (3 hrs)
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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-
-
Major Requirements (60 hours)

Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)

LAW 201: Legal Environment of Business (3 hrs)
BUS 398: Internship in Business ( 3 hrs )**
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 331: International Business Strategy (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
BUS 400: Skills for Career Success Program (0 hrs)
Marketing Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
MKT 330: Consumer Behavior (3 hrs)
MKT 492: Strategic Marketing Management (3 hrs)
Complete 4 or more courses selected from the following:
MKT 373: Personal Selling (3 hrs)
MKT 380: Special Topics in Marketing ( 3 hrs )
MKT 385: Digital Marketing (3 hrs)
MKT 395: Independent Study (3 hrs)
MKT 477: International Marketing (3 hrs)
MKT 490: Marketing Research (3 hrs)
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, FIN, LAW, LSCM, MGT, or QM.

Free Electives (23 hrs)

39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Bachelor of Science in

## INTERGRATED BUSINESS AND ENGINEERING

## 2023-2024 | 124 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowle -

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic

## Creativity

- 

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy
n MATH 221: Calculus I (4 hrs)
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior,

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Civic Knowledge
    - ECON 101: Principles of Macroeconomics*
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    -
    Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- IBE 497: Integrated Business \& Eng. Project)(Minimum grade C-)
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hours)

Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
BUS 200: Global Business Ethics (3)
QM 160: Introduction to Data Analytics (3 hrs)

ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
梱䛼 400: Skills for Career Success Program (0 hrs)
STAT 166: Introduction to R for Data Science (1 hr)
STAT 266: Introductory Statistics with R (3 hrs)
Engineering Core Requirements
ENGR 101: Intro. to Engineering (3 hrs)
ENGR 212: Statics (3 hrs)
ENGR 409: Eng. Economy \& Decision Making (3 hrs)
CM 110: Construction Graphics (3 hrs)
CS 210: Fundamentals of Programming I (3 hrs) or
ENGR 123: Programming for Engineers (3 hrs)
Two Courses from the following:
ENGR 232: Mechanics of Materials (3 hrs)
ENGR 213: Dynamics (3 hrs)
EE 210: Circuits (3 hrs)
CE 324: Construction Management (3 hrs)
CE 374: Environmental Engineering (3 hrs)
Intergrated Business and Engineering Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. .)
LSCM 340: Intro. to Six Sigma v
MGT 369: Entrepreneurship (3 hrs)
IBE 350: Project Management (3 hrs)
IBE 360: Sustainability in Business \& Eng. (3 hrs)
IBE 398: Internship* (3 hrs)
IBE 400: New Product Design \& Development (3 hrs)

Free Electives ( 6 hrs)

39 Hours of 300/400 level courses
NOTES:

- **COOP 091 may be used to satisfy BUS 398, but no credit hours are earned.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.
- A maximum of four business core courses and two major courses may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.


## Economics

Faculty: Bayar

## Bachelor of Science in Business <br> Administration with a Major in

 EconomicsEconomics combines the best in liberal arts education to prepare students for careers in industry, commerce, or public service. Students can major in economics by completing a Bachelor of Science degree. A minor in economics is also available.

The Bachelor of Science degree requires a supporting area of study in addition to the economics core. This degree provides a bridge between the liberal arts and sciences and a variety of attractive professional careers. A major in economics combines the best in liberal arts and sciences education with the expertise and training necessary for successful careers in all fields of industry, commerce, or public service. Economists occupy positions of leadership in every sector of American industry. An economics major provides preparation for careers in state, local, or federal government. In addition, a degree in economics is an excellent background for graduate school in business administration, health care administration, law, or public administration. Requirements for Degree Program

- Minimum Grade Policy: Students are required to (1) earn a grade of C- or better in the prerequisitesforanyupper-levelSchroederSchoolcoursesoutsideofthebusinesscore;(2) earn a grade of C- or better in ECON 497.
- Course Level Policy: Normally, students will not enroll in 200-level business courses before the third semester. After completion of the third semester, students may enroll in FIN 361, LSCM 315, MGT 311, MGT 377, or MKT 325 if prerequisites are satisfied. After completion of the fourth semester, students may enroll in other 300-and 400-level business courses for which prerequisites have been satisfied. Exceptions that permit earlier enrollments include but are not limited to the following:
- Students with formal plans to study at Harlaxton or in some other program of study abroad
- Students who wish to avail themselves of opportunities to take 300 - and 400 -level courses that are offered only on an alternate year basis and for which the alternate year scheduling cycle is stated with the catalog course description
- Students with exceptional preparation through advanced placement or credit by exam that warrants early enrollment
- Students who require preparation specific to the requirements of planned internships
- Minimum GPA requirement: Minimum 2.5 gpa required in each major area of study. Students must also satisfy the university's graduation requirement of 2.0 gpa for total program of study.
- On-line Policy:A maximum of six courses in the major requirements and supporting area combined may be completed online.
- Transfer Credit Policy: Transfer credit not accepted for any business school course previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.
- Accreditation rules for the Schroeder Family School of Business Administration stipulate for this degree that a maximum of ten courses with the prefix of ACCT, BUS, FIN, LSCM, MGT, or MKT can apply towards graduation requirements.
- Double-counting of courses in the business core or across majors is not permitted.
- For transfer students, at least 50 percent of the business credit hours required for a degree from the Schroeder Family School of Business Administration must be earned at the University of Evansville.
- It is recommended that nomorethan 50 percent ofabusiness student'stotal credithours (excluding Economics 101, 102 and Quantitative Methods 160, 227) be taken in the Schroeder Family School of Business.
- Students studying outside the Schroeder Family School of Business Administration and planning to earn more than 25 percent of their work in business and economics (excluding Economics 101, 102 and Quantitative Methods 160, 227) must earn a Bachelor of Science in Accounting or a Bachelor of Science in Business Administration.


## Bachelor of Science in

## BUSINESS ADMINISTRATION: ECONOMICS

2023-2024 | 124 Hours Required

## Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 134: Survey of Calculus (or MATH 221)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior,
Civic Knowledge

- ECON 101: Principles of Macroeconomics*
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing (Minimum grade of C -)

- MGT 497: Global Strategic Management (Minimum grade C-)

Overlay: Writing Across the Curriculum (4 courses)
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-
Major Requirements (48 hours)
Business Administration Core
ECON 101: Principles of Macroeconomics (3 hrs)*
ECON 102: Principles of Microeconomics (3 hrs)
BUS 100: Introduction to Business (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)

LAW 201: Legal Environment of Business (3 hrs)<br>BUS 398: Internship in Business (3 hrs)**<br>FIN 361: Fundamentals of Finance (3 hrs)<br>LSCM 315: Logistics/Supply Chain/Operations Mgt (3 hrs)<br>MGT 311: Management Information Systems (3 hrs)<br>MGT 331: International Business Strategy (3 hrs)<br>MGT 377: Organizational Behavior (3 hrs)<br>MKT 325: Principles of Marketing (3 hrs)<br>BUS 400: Skills for Career Success Program (0 hrs)

Economics Requirements (Double counting of courses across majors is not permitted. No hours of internship apply. Minimum 2.5 GPA required.)
ECON 345: Intermediate Microeconomics (3 hrs)
ECON 346: Intermediate Macroeconomics (3 hrs)
Complete 4 or more courses selected from the following:
ECON 300: Regression Analysis
ECON 320: Environmental Economics
ECON 372: Money and Banking
ECON 400: Econometrics
ECON 425: International Trade
ECON 435: International Monetary Economics
ECON 470: Financial Institutions and Markets
ECON 497: Research Seminar
ECON 380: Special Topics in Economics
ECON 395: Independent Study
--May substitute two 300/400 level courses (6 hours) with a prefix of ACCT, BUS, ECON, FIN, LAW, LSCM, MGT, or QM.

Free Electives (23 hours)
39 Hours of 300/400 level courses
NOTES:

- *Satisfies both a general education and a major requirement for a total of 3 hours in one area only.
- Accreditation rules for the Schroeder Family School of Business Administration stipulate for this degree that a maximum of ten courses with the prefix of ACCT, BUS, FIN, LSCM, MGT, or MKT can apply towards graduation requirements.
- A maximum of six courses in the major requirements and supporting area combined may be completed online.
- Transfer credit not accepted for any business school course (department ACBU course) previously failed or withdrawn from at UE. Appeals to this policy may be made to the Schroeder School Academic Standards Committee.
- Enrollment in upper level business school courses outside of the business administration core requires a grade of C - or better in their prerequisites.


# School of Engineering and Computer Science 

## Beverly Brockman, Dean

The School of Engineering and Computer Science offers baccalaureate degrees in the professional areas of civil engineering, computer engineering, electrical engineering, mechanical engineering, and computer science. A minor in engineering management is offered in conjunction with the Schroeder Family School of Business Administration. A Biomedical Option is available in Electrical Engineering and in Mechanical Engineering. The School also offers an Energy Engineering Certificate and a minor in computer science.

The mission of the School of Engineering and Computer Science is to provide high quality, personalized educational experiences in engineering or computer science to talented and motivated students who seek a baccalaureate degree.

All programs in the College of Engineering and Computer Science share certain goals:

- Graduates will know the fundamentals of mathematics, basic science, and engineering and/or computer science appropriate to their major discipline. Their level of knowledge will be sufficient to permit them to enter professional practice or to pursue advanced study and will serve as the basis for continued learning, both formally and informally.
- Graduates will possess certain skills, including, but not limited to, teamwork, communication skills, critical thinking, computer skills, problem solving, information management skills, and decision-making, as appropriate to their discipline. Their skill level will be sufficient to permit them to enter professional practice or to pursue advanced study.
- Programs will assist students in developing personal values. Emphasis is placed on ethical behavior, global-mindedness, active citizenship, and intellectual growth.
The curricula of the various programs provide an appropriate balance between humanities, fine arts and social sciences, the physical sciences and mathematics, the engineering sciences, and design and creative activities. Our programs are rich in proj-ect-based learning, team experiences, and close faculty-student interaction.

The civil engineering program, computer engineering program, electrical engineering program, and mechanical engineering program are accredited by the Engineering Accreditation Commission (EAC) of ABET, www.abet.org. The computer science program is accredited by the Computing Accreditation Commission (CAC) of ABET, www.abet.org.

The University has chapters of the engineering honor societies: Chi Epsilon for civil engineers, Eta Kappa Nu for electrical and computer engineers, Pi Tau Sigma for mechanical engineers, and Tau Delta Kappa for all branches of engineering and computer science. Membership is available in student chapters of the following national professional societies: American Society of Civil Engineers (ASCE), American Society of Mechanical Engineers (ASME), American Society of Heating, Refrigerating, and Air Conditioning Engineers (ASHRAE), Association for Computing Machinery (ACM), Institute of Electrical and Electronics Engineers (IEEE), Society of Automotive Engineers (SAE), and Society of Women Engineers (SWE).
Admission Requirements
Students who have explicitly demonstrated the ability and
preparation needed to successfully complete a degree program of their choice will be considered for admission. The number of students admitted to each degree program is limited by available space and resources to ensure a high quality, personalized, educational experience.

Admission to the School of Engineering and Computer Science is based on standardized test scores (SAT or ACT) and specific high school course work grades. Minimum acceptable test scores are 560 on the math portion of the SAT or 25 on the math portion of the ACT. Minimum high school preparation must include the following:

- Three-and-one-half years of mathematics comprising two years of algebra, one year of plane geometry, and one-half year of trigonometry with an average grade of B or better
- Two years of science including at least one year of chemistry with a laboratory and an average grade of $B$ or better
- Four years of English
- Applicants whose native language is not English must achieve a minimum TOEFL score of 70 or IELTS score of 6.0.
- Highly recommended additional high school course work includes:
- One or more years of physics
- Additional chemistry
- Additional mathematics such as analytic geometry, col lege algebra, calculus
- Two or more years of a foreign language

Students who do not meet these standards may be admitted with pre-engineering status. Pre-engineering students will concentrate on specific mathematics courses and other courses intended to prepare them for full admission into the program of their choice Full admission will typically be granted upon petition after achieving grades of $C$ or better in Mathematics 221 and Chemistry 118, and, for students whose native language is not English, demonstrating proficiency in English.

In some cases, an interview between an applicant and a faculty member will be considered in the admission and financial aid process. Other evidence of exceptional motivation will be considered in marginal cases such as related (high school) elective course work, hobbies, extracurricular activities, or a pre-engineering exploration program.

## Admission of Transfer Students

Application materials from transfer students are reviewed at two levels. At the university level, a minimum grade point average of 2.0 is required for acceptance. The Office of the Registrar reviews the overall record and determines the transfer status of general education and other non-technical courses. Materials are then sent to the Associate Dean of the School of Engineering and Computer Science. The associate dean determines the acceptability of any engineering (and sometimes mathematics or science) courses presented for transfer and also makes the decision to grant or deny admission to the program.
Students Currently Pursuing a Degree at the University of Evansville

Students currently pursuing a degree in engineering or computer science at UE may take courses elsewhere for transfer to UE. (See the "Academic Policies and Procedures" section of this catalog for the University policies regarding transfer work.) Normally, such courses will be taken during the summer or while the student is on a co-op assignment. For engineering courses at the 200 level or above, only those taken from EAC-ABET or CAC-ABET accredited programs may be transferred. Courses in mathematics, science, or general education may be transferred from any regionally accredited university or junior college. Any engineering courses must have the prior approval of the associate dean and the appropriate program directors. Generally, approval to take a required engineering course elsewhere will be granted only in exceptional circumstances.

## Credit for Courses Taken Elsewhere

Course work presented by an applicant for transfer of credit is carefully reviewed by the Office of the Registrar together with either the associate dean of engineering and computer science or the appropriate program directors. Only courses with a grade of $C$ ( 2.0 on a 4 point scale) or better may be transferred. Engineering courses taken from an EAC-ABET or CAC-ABET accredited program will be transferred when there is a clear correspondence with a UE course. Other courses (science, mathematics, and general education) may be transferred with a grade of $C$ or better if taken at a regionally accredited institution. An exception to this policy will be granted if a formal articulation agreement is in place. In all other cases of technical/engineering courses taken from non-EAC/CAC-ABET accredited programs, suitability for transfer is evaluated by review of the course syllabi and/or student's work. When a clear one-to-one correspondence exists with one or more of our engineering courses and the student has at least a grade of $C$, credit may be granted up to a maximum of 12 hours (or four courses), at the discretion of the assocaite dean or program director. High quality course work (with grade of $C$ or better) of obvious merit for an engineer but not corresponding to one of our courses may be accepted as technical electives or free electives up to a maximum of seven hours (two courses).

In the case of courses from non-U.S. schools, syllabi and student work are reviewed and, where apparent equivalence is found, credit may be granted on a conditional basis. The condition is generally in the form of requiring a C or better performance in one or more courses whose prerequisites include the work to be transferred.

Students requesting an exception to these policies may petition the Associate Dean of the School of Engineering and Computer

Science or the University's Admissions and Standards Committee, as appropriate.
Engineers at Harlaxton College
Harlaxton College study for one semester is highly recommended for engineering and computer science students. Normally, students are encouraged to plan for Harlaxton study during the fall semester of the second year. Some students may have additional options for scheduling Harlaxton study, including in the summer. Degree plans for engineering or computer science students that include study at Harlaxton are available from School of Engineering and Computer Science academic advisors. Students who wish to study at Harlaxton should begin planning with their academic advisor as early as possible.

## Personal Computers

All students in the School of Engineering and Computer Science are required to have a personal computer. Students who do not own a personal computer are strongly encouraged to acquire one during their first semester of full-time studies. Several specially equipped PCs are provided by the school to augment students' PCs; some of these and other PCs provided in the University's academic computing labs can be used on a time-available basis until students acquire their own PC. Incoming students should consult their academic advisor for information on required minimum PC specifications.
Degree Requirements
In addition to meeting all degree requirements of the University, students in the School of Engineering and Computer Science must meet specific departmental requirements described in the following sections. These include: University Enduring Foundations General Education requirements, courses required for each degree, and area electives chosen from approved course work for each degree.

Exceptions to requirements for degrees and policies of the School of Engineering and Computer Science may be approved when unusual and mitigating circumstances are present. Students may request approval for such exceptions by submitting an academic petition with the academic advisor's approval to the appropriate program director for consideration by the associate dean.

The degree programs in engineering and computer science can normally be completed in eight semesters of full-time study (potentially including one semester at Harlaxton College) by the entering student with adequate high school preparation or its equivalent.

## Co-op Program

A cooperative education plan for all programs is available as an alternative to the traditional four-year plan. The co-op plan combines classroom education with full-time work experience in industry. Please refer to Special Educational Opportunities located in the "Degrees, Curriculum, Academic Opportunities" section of this catalog.

Other Opportunities for Work Experience
Students desiring a smaller scale work experience may participate in an internship or concurrent co-op. In the School of Engineering and Computer Science, an internship is a full-time, paid work experience lasting at least 8 weeks. Most internship opportunities occur in the summer.

Concurrent co-op is a plan wherein full-time students work part time in a professional environment. Students carry a full-time course load and work eight to 15 hours per week. Concurrent co-op is most often used as a pre-co-op experience or as a post-co-op experience when employers wish to have former co-op students carry a work project to completion.

## Engineering Management and the Energy Engineering Certificate

A minor in engineering management is offered by the School of Engineering and Computer Science in cooperation with the Schroeder Family School of Business Administration.

The minor in engineering management has two sets of course requirements. One set complements a major in engineering or computer science; the other set complements a major in business administration or accounting. In order to earn the engineering management minor, the student must also earn the appropriate accounting, business, computer science, or engineering degree. The minor is especially appropriate for students seeking careers in operations, production management, construction management, or technical sales and marketing. It is also a means by which undergraduate engineering students can prepare for future graduate studies in either an MBA or graduate program in engineering management.
Engineering Management Minor (18 hours)
The following courses are required for students whose major is civil engineering, computer engineering, electrical engineering, mechanical engineering, software engineering or computer science.

Economics 101* or 102*; Engineering 390, 409; Business 100 or Communication 380; Management 331 or 377; Logistics and Supply Chain Management 315 or Civil Engineering 324

The following courses are required for students whose major is accounting or business administration.

Chemistry 118*; Civil Engineering 324 or 374; Engineering 101 or Electrical Engineering 210; Mathematics 134 or 221*; Mechanical Engineering 197; Physics 121* or 210*

## Energy Engineering Certificate (12 hours)

A certificate in energy engineering is available to students in the engineering programs. This certificate prepares engineers for careers in the energy industry. Students may earn the certificate by completing the following requirements:

Electrical Engineering 430; plus any three ofthe following:Civil Engineering 374;Electrical Engineering 330; Mechanical Engineering 463, 470, 472, 476; Civil Engineering 497 or Electrical Engineering 497 or Mechanical Engineering 497 (with an approved energy-focused project) or Cooperative Education 91-95 or Experiential Education 71-73 (with an approved energy-focused employer).
With careful curriculum planning including an approved energy-focused project or co-op, engineering students can earn an energy engineering certificate by taking no more than one additional course.

The Energy Engineering Certificate may also be earned by persons who already hold a degree in engineering. In this case the 497, Cooperative Education, and Experiential Education courses will not be counted towards the Certificate.

## Bachelor of Science in Civil Engineering

Bachelor of Science in Computer Engineering

Bachelor of Science in Computer Science

## Bachelor of Science in Construction Management

Bachelor of Science in Electrical Engineering

## Bachelor of Science in Mechanical Engineering

The School of Engieering and Computer Science offers five baccalaureate degrees: Bachelor of Science in Civil Engineering, Bachelor of Science in Computer Engineering, Bachelor of Science in Computer Science, Bachelor of Science in Electrical Engineering, and Bachelor of Science in Mechanical Engineering. The civil engineering,electrical engineering, computer engineering, and mechanical engineering programs are accredited by the Engineering Accreditation Commission (EAC) of ABET, www.abet.org. The computer science program is accredited by the Computing Accreditation Commission (CAC) of ABET, www.abet.org. Students in any of the baccalaureate degree programs may participate in cooperative education. The degree requirements for co-op students are the same as those shown below. The sequencing for the co-op program is described in the School of Engineering and Computer Science program description. Students who wish to enroll at Harlaxton College will follow a modified course schedule and should consult their academic advisor.

## Civil Engineering

Civil engineering is a profession focused on designing, building, and maintaining infrastructure that improves the quality of living while protecting public safety. Community, societal, and environmental needs are met through the planning, design, construction, and maintenance of public and private facilities. Civil engineers apply their technical knowledge and skills to diverse projects including buildings, foundations, dams, highways, tunnels, bridges, airports, harbors, flood protection facilities, water and wastewater treatment plants, and off-shore structures. Civil engineering career opportunities exist in industry, government, and the private sector. Practice areas include design, construction, project management, consulting, research, and teaching.

The civil engineering undergraduate program is designed to provide students with a personalized educational experience. Program educational objectives are:

- Graduates will be actively engaged in a professional career as a civil engineer or pursuing advanced study
- Graduates will understand professional practice issues and demonstrate a commitment to professional licensure and continuing education
- Graduates, guided by the principles of sustainable development and global interconnectedness, will understand how civil engineering projects affect society and the environment
The civil engineering curriculum prepares students to meet present and future challenges in the profession and to develop insight into economical, physical, social, and political constraints affecting the engineering decision-making process. Today's engineers must be adept at working in a global marketplace. To assist engineers in meeting that challenge, the University of Evansville provides students with an opportunity for an international experience at Harlaxton College. A student chapter of the American Society of Civil Engineers (ASCE) is sponsored by the department to support and encourage professional development. UE's award-winning ASCE chapter has been recognized as one of the best in the nation. Students may also participate in Chi Epsilon (the national civil engineering honor society) and the college-wide chapter of the Society of Women Engineers.

To be prepared to meet present and future challenges in the profession, students follow a curriculum that provides them with a broad body of knowledge and a comprehensive understanding of civil engineering fundamentals. This is achieved through a set of required core courses in the areas of materials, structural engineering, water resources engineering, geotechnical engineering, transportation engineering, construction engineering, surveying, and environmental engineering. In addition, the curriculum provides options for students to take upper-division elective courses in structural analysis, advanced structural design, engineering economics, engineering hydrology, environmental engineering, advanced pavement design and management, and special topics such as earth dams, open channel hydraulics, and advanced computer visualization and modeling.

Students are introduced to engineering design in the fall of their freshman year in Engineering 101. The freshmen in this course closely interact with a faculty member who is also the student's advisor. Past freshman projects include the design of balsa wood bridges and retaining walls. Upperclassmen interact with freshmen as course assistants.
After students gain an understanding of fundamental concepts, design education is continued during the junior year through a variety of design projects such as a steel frame walkway in Civil Engineering 341 and a concrete baseball bat in Civil Engineering 331. Design is heavily emphasized in senior-level civil engineering required and elective courses and is
developed through the use of both individual projects and design teams. Students utilize computer software in several design exercises: slope stability software in Civil Engineering 438; structural analysis software to design reinforced concrete structures in Civil Engineering 342; hydraulic engineering software to design spillways and bridges in Civil Engineering 469, and rainfall-runoff modeling software to design sustainable, environmentally compliant storm water management facilities in Civil Engineering 468. The design projects become progressively more complex leading up to the year-long senior capstone design project in Civil Engineering 495/497. Students work on multifaceted projects, such as dams, bridges, buildings, roadways, trails, storm water management facilities, athletic complexes, and green infrastructure. In order to obtain a broad design experience and exposure to practical design criteria, students interact with design professionals, base their designs on national and international building codes and standards, prepare engineering reports and design drawings, make presentations at conferences, and prepare applications for local, state, and federal permits at the completion of the senior project.

After completing the civil engineering curriculum, students have 34 credit hours in basic mathematics and science and approximately 72 credit hours in engineering topics, depending on electives chosen in the senior year. The engineering topics are divided into approximately two-thirds engineering science and one-third engineering design. The allocation between engineering science and design prepares civil engineering graduates to enter the practice of engineering or to further their education in graduate school.

## Computer Engineering

Computer engineering bridges the areas of electrical engineering and computer science. Computer engineering graduates are sought by industries involved with industrial automation and embedded computer systems. The program in computer engineering provides an in-depth understanding of those topics in electrical engineering that are related to the design and use of computers as well as those topics in computer science that deal with software design and implementation, particularly those applications that involve real-time operation. Computer engineers typically design systems that have dedicated computers of which the user is largely unaware. Some typical computer engineering applications are engine controllers and body computers in automobiles, numerous computer controlled appliances such as the VCR, microwave oven, washing machine, and industrial automation including industrial robots. The computer engineering curriculum provides a broad-based understanding of both hardware and software and their interaction, as well as an opportunity to study particular aspects in more depth. Computer engineering is a rapidly changing area and to be effective in the profession, computer engineers must be open to the continuous learning of new concepts and ideas. At the same time, the computer engineer must be a responsible and ethical member of society.

Computer engineering is a challenging field. Career opportunities are available in manufacturing, research, and development. The bachelor's degree can also provide access to graduate school where students can continue their professional studies. The curriculum in computer engineering is purposefully broad and places a high value on creativity, invention, the continual learning of new concepts, and the ethical practice of the profession.

The first two years of the program provide a firm foundation in mathematics, natural science, basic engineering analysis, and design, and an appreciation for the humanities and social sciences. The technical part of the first two years provides instruction in the C++ programming language, data structures, electric circuit analysis, computer aided design and simulation, and the logical design of digital circuits. Laboratories emphasize the use of computers and provide instruction in current methods of software design and in the use of basic instrumentation common to the profession.

The last two years of the program are project oriented. Students take project labs in which they design and invent hardware and software to meet specifications. Many students work one-onone with professors. Class sizes for upper level electives range from as small as four students to as large as 25 . Through area elective choices, students majoring in computer engineering may concentrate their studies in the areas of digital systems and controls, computer hardware and architecture, artificial intelligence, graphics, or systems programming. In addition to the design labs that are required, most courses at the junior and senior level have semester-long projects as part of the homework for the class. Many projects require teamwork. During the senior year, every computer engineering student is required to complete a year-long senior design project that is often industrially sponsored. During the first semester, the student writes a proposal and does a preliminary design. This design is subject to a design review process and a formal presentation of the ideas and concepts is required. During the second semester, the student completes the design and constructs the final product.

## Computer Science

The computer science curriculum prepares students for all areas of the computer industry, for industrial positions where computers are applied, and for further study in graduate programs. Computer science students complete a set of core requirements in the first two years of the program, providing a firm foundation in mathematics, natural science, basic programming analysis and design, and an appreciation for the humanities and social sciences. The technical part of the first two years provides instruction in programming using languages such as C, C++, and Java, basic data structures and algorithms, object-oriented design, and basic machine organization.

The last two years of the program emphasize the design and implementation of computer software systems, and the scientific and industrial applications of computer science. Many students work one-on-one with professors. Class sizes for upper-level electives range from as small as four students to as large as 25. Through elective choices, students majoring in computer science may concentrate their studies in the areas of graphics, artificial intelligence, systems programming, or Internet applications. Many courses at the junior and senior level have significant projects as part of the homework for the class. During the senior year, every computer science student is required to complete a yearlong senior design project that is often industrially sponsored. During the first semester, the student writes a proposal and does a preliminary design. This design is subject to a design review process, and a formal presentation of the ideas and concepts is required. During the second semester, the student completes the design and constructs the final product.

In addition, the computer science program allows sufficient free electives for students to minor easily in a field of application
such as business or in a complementary field such as a foreign language.

## Electrical Engineering

Electrical engineering is a very broad field and the undergraduate electrical engineering program matches this breadth by introducing the student to almost every aspect of electrical engineering. Modern life is permeated with electric devices, ranging from the ubiquitous small electric motor and the computer controlled appliance to the fiber optic communications link. Electrical engineering has transformed the way we live and the way we think about the natural world. This transformation is ongoing and to be successful in the profession, electrical engineers must be open to the continuous learning of new concepts and ideas. At the same time, the electrical engineer must be a responsible and ethical member of society.

Electrical engineering is a challenging field. Career opportunities are available in manufacturing, research, and development. The bachelor degree can also provide access to graduate school where students can continue their professional studies.

The curriculum in electrical engineering is purposefully broad and places a high value on creativity, invention, the continual learning of new concepts, and the ethical practice of the profession. The first two years of the program provide a firm foundation in mathematics, natural science, basic engineering analysis and design, and an appreciation for the humanities and social sciences. The technical part of the first two years provides instruction in the C++ programming language, electric circuit analysis, computer aided design and simulation, and the logical design of digital circuits. Laboratories emphasize the use of computers and provide instruction in the use of basic instrumentation common to the profession.

The last two years of the program are project oriented. Students take project labs in which they are assigned open-ended projects requiring invention and design to meet specifications. Many students work one-on-one with professors. Class sizes for upper-level electives range from as small as four students to as large as 25. Some specialization is possible in the last three semesters when a student can choose two technical electives in areas such as computers, electronics, electro-optics, power systems, or linear systems and controls. In addition to the design labs that are required, most courses at the junior and senior level have semester-long projects as part of the course homework. Many projects require teamwork. For example, in the microcontroller course (Electrical Engineering 454) students typically design and construct a system requiring a real time microcontroller. In the communication electronics course (Electrical Engineering 440), students design complete communication systems for a semester-long project. During the senior year, every electrical engineering student is required to complete a year-long senior design project that is often sponsored by industry. During the first semester, the student writes a proposal and does a preliminary design. This design is subject to a design review process and a formal presentation of the ideas and concepts is required. During the second semester, the student completes the design and constructs a final product. .

With careful curriculum planning including an approved ener-gy-focused project or co-op, engineering students can earn an energy engineering certificate by taking no more than one additional course.

The Energy Engineering Certificate may also be earned by persons who already hold a degree in engineering. In this case the

497, Cooperative Education, and Experiential Education courses will not be counted towards the Certificate.

## Biomedical Option in Electrical Engineering

Electrical engineering majors may earn a bachelor's degree in electrical engineering with a biomedical option.

## Mechanical Engineering

Mechanical engineering is one of the broadest fields of engineering, encompassing applications as diverse as automotive or aerospace vehicles, power generation, manufacturing processes, plastic and other petrochemical products, and electronic hardware. These applications require a fundamental understanding of the static and dynamic relationships between forces and motion, the nature of materials, principles of energy conservation, and transformation, design, and analyses of machines, the transmission of heat, and the flow of fluids. The mechanical engineering curriculum provides a rigorous treatment of fundamental principles in these subject areas and the necessary background in mathematics and the basic sciences to prepare students for these courses. Through elective choices, students may investigate special areas of mechanical engineering including internal combustion engines, combustion engineering, turbomachinery, power plants, finite elements, mechanical vibrations, and advanced computational methods.

In addition to strong technical skills, today's engineers in the global marketplace must be adept at working with other people who have very different professional backgrounds and who may be from other countries with different cultures. The University of Evansville helps engineers meet that challenge by providing students with a strong liberal arts background and providing an opportunity for an international experience at Harlaxton College.

The mission of the mechanical engineering program is to provide a personalized educational experience for talented and motivated students who seek a Bachelor of Science in Mechanical Engineering. Program educational objectives include:

- Graduates shall be engaged in professional practice, continuing education, and/or other activities benefitting society.
- Graduates shall have developed habits consistent with an attitude of professionalism, an awareness and appreciation for different cultures, and the understanding of engineering influence in a global context.

The mechanical engineering program strives to maintain a balance between a traditional approach to teaching engineering principles and incorporating current industrial practices. For example, computer-aided design and analysis, applications of automatic data acquisition, and concurrent engineering have all been incorporated into the curriculum. Program faculty aggressively seek to develop laboratories and courses that use state-of-the-art equipment. The size of the program allows students to define individual experiences in undergraduate research or projects in student sections of professional societies. Student chapters of the American Society of Mechanical Engineers (ASME) and the Society of Automotive Engineers (SAE) are sponsored by the department to support and encourage the students' professional development. A national honor society for mechanical engineering students, Pi Tau Sigma, is represented. Students may also participate in the college-wide chapter of the Society of Women Engineers (SWE).

A unique and exciting integrated design sequence is offered to freshman through senior students. Students from different grade levels work together on engineering projects. Students apply design skills obtained in their course work and throughout the integrated design sequence directly to meaningful projects. The goal is to teach both technical and non-technical skills through collaborative "design, build, and test" projects.

The integrated design sequence consists of courses numbered Mechanical Engineering 197, 297, 397, and 497 that offer specific skills that will be used in the team environment. The freshman course, Mechanical Engineering 197, provides skills in comput-er-aided modeling, sketching and product fabrication techniques. The sophomore course, Mechanical Engineering 297, provides instruction in basic computer-controlled machining and rapid prototyping techniques and further instruction in computer-aided modeling. The junior course, Mechanical Engineering 397, provides skills in instrumentation and automatic data acquisition for measurements. The senior course, Mechanical Engineering 497, provides skills in project management.

After students gain an understanding of fundamental concepts, design education is continued during the junior year through assigned design projects as a part of normal course work. The design projects are progressively more complex up to the senior capstone design experience, Mechanical Engineering 495 and 497. There are many different types of projects including industrially sponsored projects, such as the SAE Mini Baja, Formula SAE cars, and a human-powered lunar rover that are entered into national and regional competitions, and undergraduate research projects. This approach prepares our graduates to enter the professional practice of mechanical engineering or to further their education in graduate school.

## Biomedical Option in Mechanical Engineering

Mechanical engineering majors may earn a bachelor's degree in mechanical engineering with a biomedical option. With careful curriculum planning, mechanical engineering students can complete the biomedical option with no additional classes.

## Computer Science Minor (21 hours)

Students with no prior background in programming are encouraged to take Computer Science 101 or 105 before taking Computer Science 210. Although there are no mathematics courses required for a minor in computer science, students should be aware that mathematical principles from calculus and discrete mathematics are regularly used throughout the computer science program.
Computer Science 210, 215, 220, 290; 9 hours of 300- or 400-level computer science courses

## Bachelor of Science in

## CIVIL ENGINEERING

2023-2024 | 128 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 210: Calculus Physics (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CE 495: Design Project I (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- CE 374: Environmental Engineering I (3 hrs)
- CE 380: Hydraulics Lab (3 hrs)
- CE 495: Design Project (3 hrs)

Major Requirements (77 hrs)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
ENGR 212: Statics (3 hrs)
ENGR 213: Dynamics (3 hrs)
ENGR 232: Mechanics of Materials (3 hrs)
ENGR 366: Fluid Mechanics (3 hrs)
ENGR 390: Applied Engineering Math (3 hrs)
CE 101: Introduction to Civil Engineering (3 hrs)
CE 183: Surveying (3 hrs)
CE 224: Construction Management (3 hrs)
CE 221: Construction Materials (3 hrs)
CE 338: Soil Mechanics \& Soil Behavior (3 hrs)
CE 339: Soil Mechanics Lab (1 hr)
CE 340: Structural Analysis (3 hrs)
CE 342: Design of Concrete Structures (3 hrs)
CE 350: Transportation Engineering (3 hrs)
CE 374: Environmental Engineering I (3 hrs)
CE 380: Hydraulics Lab ( 1 hr )
CE 438: Geotechnical Engineering (3 hrs)
CE 469: Design of Hydraulic Structures (3 hrs)
CE 497: CE Design Project II (3 hrs)
Science Elective (2 course)
BIOL 100, 107, 110, 112, 201; ES 103, 360; or GEOL 130
Engineering Elective (1 course)
ENGR 212, ENGR 123, ENGR 230, EE 210, ME 362, or CS 210
Technical Electives (12 hours)
Complete two technical electives; at least one technical elective must be CE 341 or CE342; at least two technical elective 400-level CE course.
CE 341, 342, 443, 449, 450 468, 475, 498, 499; ENGR 409; ME 432, $434,446,448,463$, or 466 ;

Free Electives (6 hours)
Courses numbered MATH 202 or lower, Physics 1XX, CHEM 10X, software application courses, and English Language courses may not be applied to free or technical electives.
39 HOURS OF 300/400 LEVEL COURSES
NOTES

- All Civil Engineering majors must take 32 hours of math and science to meet $A B E T$ requirements.
- Students must have a minimum GPA of 2.0 in all College of Engineering and Computer Science courses (CE, CS, EE, ENGR, and ME)


## Bachelor of Science in

## COMPUTER ENGINEERING

2023-2024 | 126 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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- PHYS 210: Calculus Physics I (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EE 495: Senior Project Phase I

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- EE 495: Senior Project Phase I (3 hrs)
- EE 497: Senior Project Phase II (3 hrs)

Major Requirements (90 hrs)
CS 101: Intro to Computer Science (3 hrs) or
EE 101: Intro to Electrical Engineering (3 hrs)
CS 210: Fundamentals of Programming I (3 hrs)
CS 215: Fundamentals of Programming II (3 hrs)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
MATH 341: Linear Algebra (3 hrs)
MATH 370: Discreet \& Combinatorial Mathematics (3 hrs)
PHYS 211: Calculus Physics II (4 hrs)
ENGR 390: Applied Engineering Mathematics (3 hrs)
EE 210: Circuits I (3 hrs)
EE 215: Circuits II (3 hrs)
EE 254: Logic Design (3 hrs)
EE 330 Introduction to Power Systems ( 3 hrs )
CS 290: Object Oriented Programming(3 hrs)
CS 315: Algorithms \& Data Structures (3 hrs)
CS 320: Computer Architecture (3 hrs)
CS 470: Operating Systems (3 hrs)
CS 475: Networks (3 hrs)
EE 310: Signals and Systems (3 hrs)
EE 342: Electronics I ( 2.5 hrs )
EE 342L: Electronics I Lab (0.5)
EE 343: Electronics II (3 hrs)
EE 354: Embedded Systems(3 hrs)
EE 360: Linear Control Systems (3 hrs)
EE 380: Instrumentation (3 hrs)
EE 454: Microcontroller Applications (3 hrs)
EE 494: Senior Project Seminar (0 hrs)
EE 497: Senior Project Phase 2 (3 hrs)

Technical Electives
Choose 6 hours from the following courses:
CS 350, 355, 375, 380, 381, 390, 415, 430, 455, 473, 499
EE 311, 343, 410, 456, 499
Courses must be chosen with the approval of CS advisor.
39 Hours of 300/400 level courses

NOTES

- All Computer Engineering majors must take 32 hours of math and science to meet ABET requirements.
- Students must have a minimum GPA of 2.0 in all College of Engineering and Computer Science courses (CE, CS, EE, ENGR, and ME).


## Bachelor of Science in

## COMPUTER SCIENCE

2023-2024 | 125 Hours Required
Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105 College Algebra or higher

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
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-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CS 495: Senior Project Phase I

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- CS 495: Senior Project Phase I (3 hrs)
- CS 497: Senior Project Phase II (3 hrs)
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## Bachelor of Science in

## CONSTRUCTION MANAGEMENT

2023-2024 | 122 Hours Required

## Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105: College Algebra (3 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- PHYS 121: Algebra Physics (Lab) (4 hrs)
- GEO 130: Environmental Geology (3 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 102: Principles of Macroeconomics (3 hrs)
- COMM 380: Intercultural Communication (3 hrs)

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- CM 495: Senior Design Project I

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
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Major Requirements (72 hrs)
ACCT 210: Introduction to Financial Accounting (3 hrs)
BUS 100: Introduction to Business (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
LSCM 315: Intro to Logistics \& Supply Chain M (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
CE 183: Surveying (3 hrs)
CE 224: Construction Management (3 hrs)
CE 221: Construction Materials (3 hrs)
ENGR 409: Engr Econ and Decision Making (3 hrs)
CM 101: Introduction to Construction Industry (3 hrs)
CM 110: Construction Graphics (3 hrs)
CM 210: Construction Methods and Equipments (3 hrs)
CM 230: Construction Contracts and Codes (3 hrs)
CM 240: Construction Estimation I (3 hrs)
CM 340: Construction Estimation II (3 hrs)
CM 350: Construction Safety (3 hrs)
CM 360: Construction Scheduling (3 hrs)
CM 370: Mechanical, Electrical, and Plumbing (3 hrs)
CM 380: Building Information Modeling (3 hrs)
CM 420: Construction Laws and Ethics (3 hrs)
CM 497: CM Senior Design Project II (3 hrs)
Technical Electives
Complete 6 hours from:
CM-498
CM-499

Free Electives (9 hours)
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## Bachelor of Science in

## ELECTRICAL ENGINEERING

2023-2024 | 127 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 210: Calculus Physics I (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EE 495:Senior Project Phase I

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- EE 495: Senior Project Phase I (3 hrs)
- EE 497: Senior Project Phase II (3 hrs)

Major Requirements (72 hrs)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
PHYS 211: Calculus Physics II (4 hrs)
EE 101: Intro to Electrical Engineering (3 hrs) or
CS 101: Intro to Computer Science (3 hrs)
ENGR 123: Programming for Engineers (3 hrs) or CS 210
ENGR 212: Statics (3 hrs)
ENGR 390 Engineering Mathematics (3 hrs)
EE 210: Circuits I (3 hrs)
EE 215: Circuits II (3 hrs)
EE 254: Logic Design (3 hrs)
EE 310: Signals and Systems (3 hrs)
EE 311: Digital Signal Processing(3 hrs)
EE 330: Introduction to Power Systems (3 hrs)
EE 342: Electronics I ( 2.5 hrs )
EE 342L: Electronics I Lab (0.5)
EE 343: Electronics II ( 2.5 hrs )
EE 343L: Electronics II Lab (0.5)
EE 354: Embedded Systems(3 hrs)
EE 360: Linear Control Systems (3 hrs)
EE 380: Instrumentation (3 hrs)
EE 420: Electromagnetics (3 hrs)
EE 454: Microcontroller Applications (3 hrs)
EE 445: Industrial Electonics and Controls (3 hrs)
EE 494: Senior Project Seminar (0 hrs)
EE 497: Senior Project Phase II (3 hrs)
Technical Electives (6 hours)

- Two courses from: ENGR: 213, 366 CS: 215, 320, 355, 375, 380, 415, 430, 475, 480 EE: 356, 410, 422, 425, 432, 437, 438, 440, 458, 465, 499 ME: 342, 344, 362, 368; PHYS 312, 330, 331, 416, 421, 427, 471

Free Elective (6 hours)
39 Hours of 300/400 level courses

NOTES

- All Electrical Engineering majors must take 30 hours of math and science to meet ABET requirements.
- Students must have a minimum GPA of 2.0 in all College of Engineering and Computer Science courses (CE, CS, EE, ENGR, and ME).


## Bachelor of Science in

## ELECTRICAL ENGINEERING: BIOMEDICAL

2023-2024 | 138 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 210: Calculus Physics I (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EE 495: Senior Project Phase I (Senior project must be biology-related)
Overlay: Writing Across the Curriculum (4 courses)
- FYS 112: First Year Seminar (3 hrs)
- EE 495: Senior Project Phase I (3 hrs)
- EE 497: Senior Project Phase II (3 hrs)
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Major Requirements (89 hrs)
Lower Division Requirements (53 Hours)
EE 101: Intro to Electrical Engineering (3 hrs) or
CS 101: Intro to Computer Science (3 hrs)
EE 210: Circuits I (3 hrs)
EE 224: Electrical Engineering Programming Lab (2 hrs)
EE 254: Logic Design (3 hrs)
ENGR 123: Programming for Engineers (or CS 210) (3 hrs)
(ics (3rs)

MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4hrs)
ATH 324: Differential Equations (3 hrs)
BIOL 107: Gen Bion (4 hs )
BIOL 112: Human Anatomy/Physiology I (4 hrs)
BIOL 113: Human Anatomy/Physiology I (4 hrs)
BIOL elective (3 hrs)

Upper Division Requirements (36 Hours)
EE 310: Signals and Systems (3 hrs)
EE 311: Digital Signal Processing (3 hrs)
EE 342: Electronics I ( 2.5 hrs )
EE 342L: Electronics I Lab (0.5)
EE 33. El
EE 354: Embedded Systems (3 hrs)
EE 360: Linear Control Systems (3 hrs)
EE 380. Instrumentation(3 his)
EE 421: Photonics I (3 hrs)
EE 454: Microcontroller Applications (3 hrs)
EE 470: Analog Communication Theory (3 hrs)
EE 494: Senior Project Seminar (0 hrs)
EE 497: Senior Project Phase 2 (3 hrs)
Technical Electives (6 hours)
Take at least 2 courses from: CS 215, 320, 355, 375, 380, 415, 430, 475, 480; EE 330, 356, 410, 422, 425, 432, 437, 438, 440, 445, 458, 465, 499; ENGR 366; ME 342, 344, 462, 468; PHYS 305, 312, 330, 331, 416, 421, 427, 471

39 Hours of 300/400 level courses

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All Electrical Engineering majors must take 32 hours of math and science to meet ABETrequiremens. offered by the College of Engineering and Computer Science (courses prefixed CE, CS, EE, ENGR, and ME).

## Bachelor of Science in

## MECHANICAL ENGINEERING

2023-2024 | 127 Hours Required

Enduring Foundations General Education Requirements
(43 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking
• FYS 112 or 312 First Year Seminar
Outcome 2: (3 hrs) Imaginative Expressions of Human Condition
-
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221 ( 4 hrs )

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 210: Calculus Physics I (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- ME: 495: Professional Practice I (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- ME 330: Materials Lab (2 hrs)
- ME 360: Thermo/Fluid Dynamics Lab (2 hrs)

Major Requirements (78 hrs)
EE 210: Circuits I (3 hrs)
EE 215: Circuits II (3 hrs)
ENGR 212: Statics (3 hrs)
ENGR 213: Dynamics (3 hrs)
ENGR 232: Mechanics of Materials (3 hrs)
ENGR 366: Fluid Mechanics (3 hrs)
ENGR 390: Applied Engineering Mathematics (3 hrs)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
ME 101: Introduction to Mechanical Engineering (3 hrs) or
ME 102 (if English is second language)
ME 197: Integrated Design I (2 hrs)
ME 297: Integrated Design II (2 hrs)
ME 330: Materials Lab (2 hrs)
ME 344: Design of Machine Elements (3 hrs)
ME 345: Computer Aided Mechanical Design (3 hrs)
ME 360: Thermo/Fluid Dynamics Lab (2 hrs)
ME 362: Thermodynamics (4 hrs)
ME 368: Heat Transfer (3 hrs)
ME 397: Integrated Design III (3 hrs)
ME 452: System Modeling \& Control (3 hrs)
ME 497: Professional Practice II (3 hrs)
PHYS 211: Calculus Physics II (4 hrs)
Technical Electives (15 hours)
Choose one from: $414,432,434,446,448,453,499$
Choose one from: ME 462, 463, 466, 468, 470, 472, 473, 476,
499
Choose one from: ME, CE, CS, EE, ENGR, MATH, PHYS, BIOL, or CHEM (except MATH 202 or lower, PHYS 100 level, and CHEM 10x courses)

39 Hours of 300/400 level courses

NOTES

- All Mechanical Engineering majors must take 32 hours of math and science to meet ABET requirements.
- Students must have a minimum GPA of 2.0 in all College of Engineering and Computer Science courses (CE, CS, EE, ENGR, and ME).


## Bachelor of Science in

## MECHANICAL ENGINEERING: BIOMEDICAL

2023-2024 | 127 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 221: Calculus I (4 hrs)

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- PHYS 210: Calculus Physics (4 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- ME 495: Senior Project Phase I (3 hrs)

Overlay: Writing Across the Curriculum (4 courses)

- FYS 112: First Year Seminar (3 hrs)
- ME 330: Materials Lab (2 hrs)
- ME 360: Thermo/Fluid Dynamics Lab (2 hrs)

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Major Requirements (78 hrs)
EE 210: Circuits I (3 hrs)
EE 215: Circuits II (3 hrs)
ENGR 212: Statics (3 hrs)
ENGR 213: Dynamics (3 hrs)
ENGR 230: Materials Science (3 hrs)
ENGR 232: Mechanics of Materials (3 hrs)
ENGR 352: Numerical Methods (3 hrs)
ENGR 366: Fluid Mechanics (3 hrs)
ENGR 390: Applied Engineering Mathematics (3 hrs)
MATH 222: Calculus II (4 hrs)
MATH 323: Calculus III (4 hrs)
MATH 324: Differential Equations (3 hrs)
ME 101: Introduction to Mechanical Engineering (3 hrs) or
ME 102 (if English is second language)
ME 197: Integrated Design I (2 hrs)
ME 297: Integrated Design II (2 hrs)
ME 330: Materials Lab (2 hrs)
ME 344: Design of Machine Elements (3 hrs)
ME 345: Computer-Aided Mechanical Design (3 hrs)
ME 360: Thermo/Fluid Dynamics Lab (2 hrs)
ME 362: Thermodynamics (4 hrs)
ME 368: Heat Transfer (3 hrs)
ME 397: Integrated Design III (3 hrs)
ME 452: System Modeling & Control (3 hrs)
ME 497: Professional Practice II (3 hrs)*}\mathrm{ with biomedical focus
Biomedical Option (22 hours)
BIOL 107: General Biology (4 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 112: Human Anatomy and Physiology II (4 hrs)
Complete one of the following:
EXSS 356: Biomechanics (3 hrs)
ME 424: Engineering Biomechanics (3)
Complete one of the following:
BIOL 305: Microbial Ecology (3 hrs)
BIOL 322: Biological Physics (3 hrs)
CHEM 370: Biochemistry (3 hrs)
ME 428: Special Topics in Biomedical Engineering (3 hrs)
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39 Hours of 300/400 level courses
NOTES

- All Mechanical Engineering majors must take 32 hours of math and science to meet ABET requirements.
- Students must have a minimum GPA of 2.0 in all College of Engineering and Computer Science courses (CE, CS, EE, ENGR, and ME).


## Bachelor of Science with a Major in Organizational Leadership

The Center for the Advancement of Learning demonstrates the University of Evansville's commitment to lifelong learning. The unit serves nontraditional students through both credit and non-credit offerings. A master's degree program and two bachelor's degree programs designed especially for adults are offered online. Non-credit classes that meet professional and personal educational needs allow community members to update essential skills or develop new interests. Additionally, the Center for the Advancement of Learning provides customized education and training to area businesses and industries.

## Organizational Leadership

The Bachelor of Science degree with a major in organizational leadership is designed specifically for the mature adult learner who has earned an Associate of Arts, Associate of Science, or its equivalent ( 60 hours), and meets University of Evansville general education requirements. The University designed the organizational leadership program to assist mid-career adult learners who wish to complete a bachelor's degree. The Center for the Advancement of Learning offers all Organizational Leaderhips courses fully online.

An emphasis on leadership and global issues provides learning experiences which not only enrich the life of the individual but also develop understanding and competencies to meet important societal needs. In the age of change and specialization, the generalist who understands the totality of the human condition and can make wise decisions will make a significant contribution to society. The organizational leadership program at the University of Evansville is designed to meet this societal need and to assist students in achieving their full potential.

## Program Learning Outcomes

- Demonstrate social responsibility with a global perspective.
- Develop strategic thinking and problem solving skills for leading teams effectively.
- Lead change within organizations and community.
- IDevelop analytical and decision-making skills for dealing with complex conceptual issues ethically and responsibly


## Bachelor of Art or Bachelor of Science with a Major in University Studies

## University Studies

The University Studies degree is a unique, flexible academic program that allows adult students who have been out of high school for five years or more, the opportunity to obtain an undergraduate degree from the University of Evansville. Students may choose either the Bachelor of Arts or Bachelor of Science degree with two distinct pathways for degree completion.

- Pathway 1 is for adults who have already earned an Associate of Arts or Associate of Science or its equivalent ( 60 hours).
- Pathway 2 is for adult students who have not earned any previous college credit or have a limited amount of credit earned.

The flexible nature of this program provides courses available in both the traditional classroom and in an online format. The student will work directly with their advisor to map out a distinct academic plan and will choose courses that work best to satisfy the needs for the degree completion.

The program is designed to allow students to create an individual plan of study by selecting courses that will assist in the development of intellectual and practical skills, personal and social responsibility, and the competencies necessary for career development and advancement. Courses are offered in-seat and in online formats.

Up to 12 hours of prior learning credit may be available. The student must be admitted to the program to submit a portfolio for review for each course for which prior learning credit is requested. There is a standard fee for portfolio assessment and for the college-equivalent credit awarded.

Applicants with military training and experience may be able to receive up to 12 credit hours depending on their military experience and the degree program the student chooses. A full review of the transcripts will be completed after an offer of admission is granted.

## Human Resources Certificate (12 hours)

Complete the following courses: OL 422; OL 321; and OL 322. Complete one of the two courses: OL 312 or OL 410.

## Change Leadership Certificate (12 hours)

Complete the following courses: OL 422; OL 410; CHNG 330; CHNG 280.

Biblical and Early Church Studies Certificate (15 hours)
Complete the following courses: :REL 140, REL 150: REL 320 REL 325 REL 330

## Bachelor of Science

## ORGANIZATIONAL LEADERSHIP

2023-2024 | 63 Hours Required

## Enduring Foundations General Education Requirements

(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing

Overlay: Writing Across the Curriculum (4 courses)
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Complete all of the following:

## Bachelor of Arts

## UNIVERSITY STUDIES

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (12 hrs) Linguistic and Cultural Competence in Language
-
-
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
-
-
-
-

Major Requirements (58 hours)

- OL 300 (if less than 30 hours of college credit)

Free Electives (15 hours)

39 Hours of 300/400 level courses

## Bachelor of Science

## UNIVERSITY STUDIES

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (47 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
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Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically and Communicate Orally and in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (58 hours)

- OL 300 (if less than 30 hours of college credit)

Free Electives (21 hours)

39 Hours of 300/400 level courses

## College of Education and Health Sciences

## Mary P. Kessler, Dean

The College of Education and Health Sciences is composed of the School of Education, the Department of Physical Therapy, the Department of Physician Assistant Science, The Nurse Anesthesia Program, the School of Health Sciences, and the Dunigan Family School of Nursing.Through the School of Education, in cooperation with appropriate departments in the arts and sciences, students can earn a baccalaureate degree that prepares them for teacher licensure in a wide variety of areas including art, biology, chemistry, elementary education English/language arts, history, mathematics, music, Spanish, special education, and teaching English as a second language. Individuals interested in a career change, can also pursue our Transition to Teaching program and secure a secondary content teaching license or complete the Accelerated Elementary Education second degree program.

The college offers an array of programs in the health sciences, some of which can be combined to provide multiple credentials. Baccalaureate degrees are offered in the professional areas of athletic training, clinical laboratory science, exercise science, health services administration, nursing, and public health. Physical therapy majors earn an entry-level doctoral degree in physical therapy. The Nurse Anesthsia Program awards a Doctor of Nurse Anesthesia Practice degree. Master's degrees are available in athletic training, health services administration, physician assistant science and public health.

All degree programs in teacher education are fully accredited by the Indiana Department of Education and the Council for Accreditation of Educator Preparation. The nursing program is accredited by the Accreditation Commission for Education In Nursing Inc. and the Indiana State Board of Nursing. Physical therapy programs are accredited by the Commission on Accreditation in Physical Therapy Education. The public health program is an applicant for accreditation by the Council on Education for Public Health. The athletic training program is accredited by the Commission on Accreditation of Athletic Training Education. The physician assistant program has been granted Accreditation-continued status by The Accreditation Review Commission on Education for the Physician Assistant.The University of Evansville Nurse Anesthesia Program is accredited by the Council on Accreditation of Nurse Anesthesia Educational Programs.

## iBACE: Integrating Business and Career

## Education

The iBACE program is designed to provide students in the William L. Ridgway College of Arts and Sciences and the College of Education and Health Sciences with educational and hands-on business experiences that will improve their marketability and career success. The program exposes students to business skills that they can apply in the workplace and builds upon foundational knowledge in their educational disciplines by adding those marketing, management, and finance skills essential for careers in a variety of fields. This program is designed to prepare students for current and future business trends in the professional workplace.

Course Work
The iBACE program contains three areas: coursework, a practical work experience, and a seminar for students seeking an internship. The program requires nine credit hours of coursework providing three building blocks of business training: Accounting 210, Marketing 325, and Management 377. Students must be at least sophomores to take the accounting course and juniors to enroll in the marketing and management courses. iBACE students are also strongly encouraged to add at least one course from those offered in Health Services Administration.
Professional Preparation
Students must enroll in EXED 090, Building a Professional Image, prior to completion of their internship. This is a 7 week, 0 or 1 credit course offered through Career Services for students seeking an internship or co-op program. This seminar course covers job interviewing skills, résumé preparation, currently available internships and details of program administration.
Internship
In addition to any internship, practicum, or clinical experiences iBACE students have within their health sciences major, iBACE students will complete an additional internship that focuses on business aspects of health care or health sciences. The business courses should be completed prior to the internship so that business principles can be applied to the professional experience. An internship in the student's major discipline is preferred.

## Application

Interested health sciences students should complete an iBACE application form to enroll in the program. The enrollment form is available online through the College of Education and Health Sciences web page. Completed forms are to be submitted to the student's academic advisor and the Dean of the College of Education and Health Sciences.

The future of our nation and our culture rests with children. Teaching, therefore, is a moral act. It is moral because, in a macro sense, student achievement and successful school experiences are related economically and ethnically to the improvement of social and cultural conditions. Well-taught students grow to become adults who are able to participate fully in our democratic, pluralistic society. In a micro sense, teaching is moral because students' individual lives are improved as they grow and learn. Teachers must, therefore, value and be committed to educating and working with all children, regardless of background or ethnicity - a difficult and challenging task, especially as the American culture becomes increasingly diverse.

Teaching is also a complex act. Teachers must be highly skilled at working with students who have individual needs and abilities; they must be skilled at collaborating and working with others in the educational community; they must know their respective disciplines and content areas well (to teach something well, teachers must understand it well); they must be able to analyze and reflect on nearly every action taken in a classroom; and they must work toward continual improvement and learning. Teachers must also be resilient; the work of teaching can be challenging and difficult, so being flexible and knowledgeable is important.

The University of Evansville's teacher education programs are firmly based on these ideas as the conceptual framework around which its programs, courses, and activities are designed.

The Interstate Teacher Assessment and Support Consortium (InTASC) principles, standards, and competencies are embedded in the conceptual framework and have been established and adopted by both the University and the state of Indiana. These comprehensive standards and competencies are also embedded in the course work and field placements that our students complete while in teacher education programs. Teacher candidates are required to successfully demonstrate not only wide-ranging teaching skills but also certain attitudes and dispositions. In addition, the State of Indiana revised new licensure requirements in 2015. Standards for teacher preparation have been developed to align to the Revision to Educator Preparation and Accountability (REPA 3) requirements. These principles and standards provide the basic framework for the requirements that all teacher education students must meet prior to graduation.

The University of Evansville, School of Education is accredited by the Council for the Accreditation of Educator Preparation. Each program is recognized by the Indiana Department of Education and the State Board of Education. Special Professional Association recognition has also been granted by the Association for Childhood Education International, Council for Exceptional Children, and the National Council for Teachers of English.

## Teacher Education

The School of Education offers undergraduate education programs leading to a Bachelor of Science or a Bachelor of Arts degree in many teaching areas and teacher licensure with majors in elementary education, secondary education, multi-grade (P-12) education in theatre, visual arts, and music. All elementary majors must also complete a minor in a licensure area; the most common minors for elementary majors are Teaching English as a Second Language, Reading, and any one of several middle grades content minors. Other minors are also available and may be selected with advisor and School of Education approval. Students seeking licensing in secondary education (5th grade through 12th grade) complete a core pedagogy sequence within the School of Education.

## License Addition for Special Education

The University of Evansville School of Education provides students the opportunity to complete additional coursework and add the intense intervention and/or mild intervention license to their teaching major. Successful completion of coursework allows graduates to serve individuals with mild and/or intense disabilities.

In addition to teaching positions, graduates may find employment in clinics, agencies and centers devoted to the care and education of persons with disabilities.

## General Requirements

## Advising

All education students have a School of Education faculty advisor. Students pursuing a teaching license in senior high, junior high, middle school, or multi-grade education are also assigned an advisor from the area of the content teaching major. Students must obtain approval from their advisor prior to registration each semester. Certain education courses may not be repeated without approval from the faculty of the School of Education.

## Admission to Teacher Education

All students seeking teaching licenses typically apply for admission to teacher education during their sophomore year. Candidates cannot enroll in internships until they are admitted. Application forms are available on Acelink. Application forms are submitted through the LiveText Data Management System and review for admission will be facilitated through enrollment in Education 300: Admission to Teacher Education ( 0 credit hours). Admission to teacher education is granted when the following requirements are met.

- Grade of C or better in Education 100, 200, or 150 and 320
- Overall GPA of 2.80 or better
- Passing scores on the reading, writing, and mathematics sections of the Basic Skills Assessment test (Indiana uses the CASA Basic Skills Assessment but will accept specified ACT or SAT benchmark scores.) This test must be completed during the freshman year or prior to completion of Education 100 or Education 150.
- Submission and approval of the Professional Education Port folio on LiveText
- Satisfactory interview with Admission to Teacher Education Committee
- Approval by the School of Education faculty

Note: ACT score of 24 or above, GRE scores of 1100 will qualify students for waiver of Basic Skills Assessment. See School of Education Office for SAT benchmark.

## Performance Expectations and Standards

Our teacher education program is extensively clinical-based. Success in many of the courses is directly related to the degree to which a student's performance meets the expectations established by the School of Education and the local school district partners. The significance of successful performance during these field experiences is vital because the students' success is tied directly to children's learning and academic achievement. Some clinical courses may not be repeated without prior approval of the School of Education faculty.

## Student Teaching

Students should consult with their advisors concerning the submission of an application for student teaching. Application forms are available on AceLink in the Education area, and on the School of Education website. The completed form should be submitted one year prior to the student teaching year, typically during the fall semester of the junior year. Eligibility requirements are:

- Admitted to teacher education
- Grade of $C$ or better in all education courses (All courses required for any licensure program area)
- GPA of at least 3.00 in all education courses
- GPA of at least 3.00 overall
- GPA of at least 3.00 in the courses for the teaching major for secondary and multi-grade education students
- GPA of at least 2.75 in the courses for teaching minors
- Students cannot begin their school placements until they have been officially admitted to student teaching.


## Bachelor of Science in Elementary Education

Bachelor of Science in Elementary Education/ Accelerated Second Degree

Bachelor of Science in Educational Studies

The Elementary Education program leads to an Indiana initial practitioner license to teach all subjects in grades K-6. An Indiana teaching license qualifies a graduate to teach in most of the 50 states, but students should obtain the Indiana licensure before applying for a license in another state.

To ensure consistency with Indiana teacher licensure regulations, some of the following license areas, curricula, and courses may be revised or reorganized prior to the beginning of each academic year. Students will be assisted by faculty advisors to blend current and new requirements to obtain teacher licensure.

This program provides students early and continuous clinical experiences in local school system classrooms. Education courses with practicum and internship components include opportunities for classroom observation and apprentice teaching. During the senior year a student teaching placement with a master teacher is the final clinical experience.

Elementary education students must complete a minor with additional courses in an approved content area to extend the teaching coverage of the basic elementary education license. Completing the minor in Teaching English as a Second Language (TESL) will provide licensure for teaching English Learners with appropriate state licensing tests. Other available minors include world languages, English language arts, mathematics, reading, science, and social studies, TESL, music, reading, visual arts. When combined with the elementary education major, successful completion of this additional teaching minor will qualify the student for an additional Indiana teaching license.

## Accelerated Second Degree

The Accelerated Second Degree program allows individuals who have completed a college degree to participate in an accelerated program that allows them to earn an elementary education teaching license.

## Bachelor of Science

## ELEMENTARY EDUCATION

2023-2024 | 122 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

- HIST 141 or 142

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 101: Mathematical Ideas

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
.
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology
- COMM 380: Intercultural Communication

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EDUC 490: Schools in a Changing Society

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (73 hours)
MATH 202: Mathematics for Elementary Teachers (3 hrs)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
HE 160: First Aid with CPR (2 hrs)
Complete one course from:
ES 103: Fundamentals of Environmental Science (3 hrs)
GEOG 120: World Regional Geography (3 hrs)
GEOG 230: Physical Geography (4 hrs)
Professional Education Requirements
EDUC 100: History and Foundation of American Education (3 hrs)
EDUC 200: Intro to Diversity in Schools, Teachers, Learners (3 hrs)
EDUC 235: Mathematics for Primary School Children (2 hrs)
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 321: Teaching Social Studies (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 323: Teaching Science, Conservation, and Ecology (3 hrs)
EDUC 324: Principles and Practices in Mathematics (3 hrs)
EDUC 330: Literature for the Elem./Adolescent Child (3 hrs)
EDUC 345: Designing Curriculum for Kindergarten Education (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 403: Classroom Management Tech Elementary Teacher (1 hr)
EDUC 418: Internship Implementing Language Arts \& Soial Studies Curriculum (4 hrs)
EDUC 419: Internship Implementing Math \& Science Curriculum (4 hrs)
EDUC 422: Teaching Reading \& Language Arts Elem School (4 hrs)
EDUC 432: Supervised Teaching in Elementary School (12 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
Complete one course from:
EDUC 421: Preschool and Beginning Reading Skills (3 hrs)
EDUC 427: Corrective Reading (3 hrs)

39 hours of 300/400 level courses
*Students seeking middle school licensure must select a qualifying specialization noted by an asterix below.

Elementary Education Specialization
All students must complete a specialization from one of the following: Science, Social Studies, Language Arts, Mathematics, Reading, or Teaching English as a Second Language. *Students seeking middle school licensure must select a qualifying specialization noted by an asterix below.*

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Science*
BIOL 107: General Biology (4 hrs)
CHEM 108: Elementary Chemistry (4 hrs)
GEOG 230: Physical Geography (4 hrs)
PHYS 121: Algebra Physics I (4 hrs)
EDUC 443: Curriculum & Learning - Middle School (3 hrs)
Complete one course from:
ES 103: Fundamentals of Environmental Science (3 hrs)
ASTR 101: Descriptive Astronomy (3 hrs)
BIOL 214: Field Zoology (3 hrs)
BIOL 215: Field Botany (3 hrs)
Other science course may be approved by advisor
Social Studies*
EDUC 443: Curriculum & Learning - Middle School (3 hrs)
Complete two courses from:
HIST 141: American History to 1865 (3 hrs)
HIST 142: American History since 1865 (3 hrs)
HIST 111: World History to 1500 (3 hrs)
HIST 112:World History since 1500 (3 hrs)
Complete one course from:
PSCI 143: American National Government and Politics (3 hrs)
PSCI 160: Intro to International Relations (3 hrs)
Complete one course from:
GEOG 120:World Regional Geography (3 hrs)
GEOG 240: Cultural Geography (3 hrs)
Complete three hours from: ECON, PSYC, OR SOC
Language Arts*
EDUC 422: Teaching Reading & Lang Arts Elementary School
(4 hrs)
EDUC 443: Curriculum & Learning - Middle School (3 hrs)
EDUC 428: Reading in the Content Areas (3 hrs)
Complete one course from:
ENGL 122: Modern World Literatures (3 hrs)
ENGL 223: World Classics (3 hrs)
ENGL 352:The Young Adult Novel (3 hrs)
Complete one course from:
ENGL 231: Masterpieces of British Literature I (3 hrs)
ENGL 232: Masterpieces of British Literature II (3 hrs)
ENGL 241: Major American Writers I (3 hrs)
ENGL 242: Major American Writers II (3 hrs)
Complete one course from:
WRTG 202: Survey of English Language (3 hrs)
WRTG 204: Copy Editing (3 hrs)
WRTG 205: Intro to Creative Writing (3 hrs)
WRTG 206: Intro to Poetry Writing (3 hrs)
WRTG 207: Intro to Short Story Writing (3 hrs)
WRTG 3XX: }3\mathrm{ hrs of 300-level writing (3 hrs)
Mathematics*
Complete eighteen hours from:
EDUC 443: Curriculum & Learning - Junior High/Middle School (3 hrs)Complete one course from:
MATH 101: Mathematical Ideas (3 hrs)
MATH 105: College Algebra (3 hrs)
MATH 202: Mathematics for Elementary Teachers (3 hrs)
MATH 221: Calculus I (4 hrs)
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## Bachelor of Science

## ELEMENTARY EDUCATION ACCELERATED SECOND DEGREE

2023-2024 | 48 Hours Required
Major Requirements (48 hours)
MATH 202: Mathematics for Elementary Teachers (3 hrs)
PSYC 226: Child \& Adolescent Psychology (3 hrs)
Professional Education Requirements
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 321: Teaching Social Studies (3 hrs)
EDUC 322: Strategies for Special Needs Students K-12 (3 hrs)
EDUC 323: Teaching Science, Conservation, and Ecology (3 hrs)
EDUC 403: Classroom Management Tech for Elem Teachers (3 hrs) EDUC 418: Internship Implementing Language Arts \& Soial Studies Curriculum (4 hrs)
EDUC 419: Internship Implementing Math \& Science Curriculum (4 hrs)
EDUC 421: Preschool and Beginning Reading Skills (3 hrs)
EDUC 422: Teaching Reading/Language Arts in Elem (3 hrs)
EDUC 432: Supervised Teaching in Elementary Schools (12 hrs)
EDUC 435: Supervised Teaching Seminar (2 hrs)
EDUC 490: Schools in a Changing Society (3 hrs)
Complete one of the following options:
EDUC 235: Mathematics for Primary School Children (2 hrs) AND EDUC 403: Classroom Mngt Tech for the Elem Teacher (1 hr) OR
EDUC 324: Principles and Practices in Math Ed (3 hrs)

## Bachelor of Science

## EDUCATIONAL STUDIES

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EDUC 490: Schools in a Changing Society

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (45 hours)
Professional Education Requirements
EDUC 100: History and Foundation of American Education (3 hrs)* EDUC 200: Intro to Diversity in Schools, Teachers, Learners (3 hrs)*
*EDUC 150 may be substituted for EDUC 100 \& EDUC 200
EDUC 320: Teaching Strategies in K-12 Schools (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
EDUC 322: Strategies for Special Needs Students (3 hrs)
EDUC 435: Supervised Teaching Seminar (2 hr)
EDUC 497: Supervised Teaching and Observation ( $6-12 \mathrm{hrs}$ )
PSYC 226: Child and Adolescent Psychology (3 hrs)
Complete 9 hours of EDUC 300/400 level courses
*All students must complete a disciplinary minor to be eligible as Educational Studies porgram completers.

Free Electives (TBD based upon concentration)

39 Hours of 300/400 level courses

# Senior High and Middle School Education (SH/MS) 

Students wishing to become secondary teachers (grades 5-12) must have at least the equivalent of a major in their teaching field; in addition, the standards for teachers are quite high and therefore require a significant commitment of time and course work, including a number of practica and internships. Students are assigned two advisors, one from teacher education and one from his or her discipline area.

To ensure consistency with Indiana teacher licensure regulations, some of the following license areas, curricula, and courses may be revised or reorganized prior to the beginning of each academic year. Students will be assisted by faculty advisors to blend current and new requirements to obtain teacher licensure.

The SH/MS education program leads to an Indiana initial practitioner license to teach in the subject areas completed. Most subject area licenses are for grades 5-12 and require students to complete at least a content teaching major. Students are also encouraged to complete one or more supplemental or minor licensure programs.

This program provides students early and continuous laboratory experiences in local school system classrooms. Education courses with practicum and internship components include opportunities for classroom observation and apprentice teaching. During the senior year, a student teaching placement with a master teacher is the final clinical experience.

The curriculum of the SH/MS education program requires the completion of at least 120 semester hours, including course work in general education, professional education, teaching majors, teaching minors, and electives.
Requirements (at least 120 hours)

Enduring Foundations General Education-41 hours, including Education 490 unless otherwise specified in the major teaching area requirements
Additional General Requirements - 3 hours Psychology 226 (Psychology 121 is a pre-requisite)

## Professional Education Requirements - 36-37 hours

Education 150, 320, 322, 363, 385, 428, 435, 436, 443; select one from Art 497 or Education
$451,453,454,456,457,459,460,461$ (co-requisite with Education 363) or 443
Electives - hours depend on major teaching area. Students should consult with their academic advisors to select elective courses that expand general education content and skills or that add a teaching minor for an additional licensure area.

SH/JH/MS Teaching Major Requirements
English Language Arts Major - 42 hours
Communication 210; English 210, 231, 232, 241, 242, 350, 351, 353; English 340 or 445; Writing 204, 205, 211; English 122, or 223

World Languages Major (Foreign Language) - 33 hours
Students may not count 111 or 112 of their target language toward the teaching major. Proficiency must be demonstrated in a second foreign language through the 112 level. At least six semester hours of course work must be taken in the target language in an approved study abroad program. It is highly recommended that a student complete more than the six-hour minimum. Study abroad courses replace University of Evansville courses.

General education - Foreign Languages 401 required for senior seminar
Spanish: 211, 212; choose 15 hours from Spanish 311, 314, 316, 320, 321, 333, 335*, 350,
435*; Choose 12 hours from Spanish 410, 411, 433, 438*, 450, 458, Foreign Languages 420
*Course may be repeated with content change
History Education - Bachelor of Science: 45 hours, Bachelor of Arts: 51 hours (additional 6 hours of foreign language required)
History 36 hours:

HIST 290， 141 or 142,111 or 112
At least 3 courses（ 9 hours）from HIST 313，314，317，318，319，320，321，322，324，H378， H379，381， $383,418,438,450$ ，or 482 ；
At least 3 courses（ 9 hours）from：HIST 323，329，341，343，345，348，349，352，353，or 448. At least two 400 level courses other than 490 or 492 （no more than 3 hours of HIST 492） Any History class（3 hours）

Students also choose one concentration（9 hours）．Students choose from economics，gov－ ernment and citizenship，psychology，sociology，or general social studies．

Economics－ 9 hours
Economics 101，102，300／400 elective
Government and Citizenship－ 9 hours：Political Science 100 or 160；143，and one political science elective 300 or 400 level
Psychology－ 9 hours：Psychology 121 or 226，229， 259
Sociology－9hours：Sociology 105，230；one additional sociology course at the 300 or 400 level General Social Studies－ 9 hours（Students will select one course from three of the four disciplines listed below）．
$\boxtimes \cdot$ Economics（101，102，300／400 elective）
区 • Political Science（100，143，160，300／400 level course）
区 • Psychology $(121,226,229,259)$
区 • Sociology（105，327，300／400 level course）

Students completing a major in history education are eligible for an Indiana practitioner license in Secondary Historical Perspectives．Students who desire additional licensing areas are encouraged to complete the Indiana Content Assessments in a concentration area listed above．

Mathematics Major－ 35 hours
General education－including Mathematics 221 and 495
Mathematics $222,323,341,355,365,370,420,466$ ；one from Mathematics 425 or 445 ；at least six semester hours of computer courses specified by the Department of Mathematics

Science Major－51－55 hours，depending on licensure area
Science licensing is available in the areas of life science，chemistry，and physics．All candidates must complete the science core requirements．
Science Education Core－11－12 hours
Select three from outside the major；Astronomy 101，Biology 107，Chemistry 118，Geography 230，Physics 121

Licensure Areas
Chemistry（BA or BS in basic chemistry）－41－47 hours
Complete requirements for the Bachelor of Arts or Bachelor of Science in basic chemistry including general education requirements that increase general education hours from 41 to 42 ，and 6 hours of additional foreign language if pursuing a Bachelor of Arts degree．See the＂Chemistry＂section of the catalog under＂College of Arts and Sciences．＂

Life Science（BA or BS in applied biology）－33－40 hours
Complete r equirements for a Bachelor of Arts or Bachelor of Science in applied biology including general education requirements that increase general education hours from 41 to 42 ，and 6 hours of additional foreign language if pursuing a Bachelor of Arts degree．See the＂Biology＂section of the catalog under the＂College or Arts and Sciences．＂

Physics（BA in physics）－ 44 hours
Complete requirements for a Bachelor of Arts in physics，including general education require－ ments that increase general education hours from 41 to 42 ，and 6 hours of additional foreign language．See the＂Physics＂section of the catalog under the＂College or Arts and Sciences．＂

## SH/MS Teaching Minors

While teaching minors are not required, senior high and middle school education students are strongly encouraged to choose teaching minors which complement their teaching majors.

Teaching English as a Second Language (TESL) Minor - 18 hours Education students who complete the Teaching English as a Second Language (TESL) minor in addition to another teacher education major are eligible for licensure to teach English Learners. TESL 491 may be substituted for TESL 417.
COMM 380; TESL 200, 302, 326, 329, 417 or 491.

English Language Arts Minor - 24 hours
English 120, 231, 232, 241, 242; English 223; Writing 205, one 300level writing course
Foreign Language Minor - 24 hours
Students may not count 111 or 112 toward the minor. An approved study abroad program of at least six semester hours is highly recommended. Study abroad courses replace University of Evansville courses. French, German, or Spanish: 211, 212, 18 hours at the 300 or 400 level

Mathematics Minor - 24 hours
Mathematics 221, 222, 323, 341, 355, 365; QM 160 or equivalent course approved by Department of Mathematics.

## Science Minor

For the science minor, at least one of the following is required. Licensure is obtained only for the one area chosen.

Chemistry - 28 hours
Chemistry 118, 240, 280, 351, 360; Mathematics 222; Physics 121 or 210
Life Science - 31 hours
Biology 107, 108, 109, 320, 331; Chemistry 108 or 118; Exercise and Sport Science 112, 113
Physics - 32 hours
Mathematics 221, 222, 323; Physics 210*, 211*, 213, 214, 312, 305
*In special cases approved by the chair of the Department of Physics, Physics 121 and 122 may be substituted for Physics 210 and 211.
Special Education Mild and Intense Intervention-24 hours
Education 201, 204, 205, 264, 306, 307, 308, and 309
Special Education Mild Intervention- 18 hours
Education 201, 204, 205, 264, 306, and 307
Reading Minor-18 hours
Education 322, 330, 421, 427, 428; Complete one of the following courses EDUC-264, ENGL-352, TESL-200, TESL 326 or TESL-329.
Visual Arts Minor - 20 hours
Art 210, 213, 220 or 221, 325; Art 330 or 345; one from Art 350, 360,
370; Art History 208 or 209

## Multi-Grade Education Programs

To ensure consistency with anticipated changes in Indiana teacher licensure regulations, some of the following license areas, curricula, and courses may be revised or reorganized prior to the beginning of each academic year. Students will be assisted by faculty advisors to blend current and new requirements to obtain
the teacher licensure they wish to achieve.

## Music Education P-12

Students completing the music education major will meet the requirements for an Indiana P-12 teaching license in either general and vocal music or general and instrumental music. Students should see the "Music Conservatory" section for specific courses. Visual Art Education P-12

Students completing the Art education major will meet the requirements for an Indiana P-12 teaching license in visual artsc. Students should see the "Department of Art" section for specific courses.

## Transition to Teaching

The Transition to Teaching program allows individuals who have completed a college degree to participate in an accelerated program that allows them to earn a secondary education teaching license. The program is available for math, life science/ biology, chemistry, physics, history, English, foreign languages and cultures, visual art, music and physical education. Much of the instruction in the transition to teaching program occurs in the schools through a series of clinicail experiences. Beyond university coursework, students must also pass state licensing exams required by the Indiana Department of Education.

Courses in the Transition to Teaching program are typically completed in a calendar year. The required student teaching course allows students to spend a full semester in a classroom working with a mentor teacher and university supervisor.
Professional Education Requirements - 24 hours
Psychology 226 Child and Adolescent Psychology (3)
Education 320 Teaching Strategies in K-12 Schools (3)
Education 363 Principles and Strategies of Teaching in Secondary Schools (3)
One teaching methods course: EDUC 451, 453, 454, 456, 461, Music 372, Music 373, (2) hours or Art 497 (3) hours: Methods of Teaching (content area) in Senior High, Junior High, Middle Schools
Education 497 Supervised Teaching and Observation in Elementary, Middle School, Junior High, and Senior High (5)
Education 435 Supervised Teaching Seminar (2)

## Teaching English as a Second Language (TESL) Minor for Non-Education Majors

The minor in Teaching English as a Second Language (TESL) prepares students to teach English to non-native speakers. Students will work with non-native speakers as interns under the supervision of an experienced TESL teacher. This minor is open to students in all schools and colleges within the University, however they would not be licensed for classroom teaching.
Non-education majors (18 hours): COMM 380; TESL 200, 302, 326, 329, 417 or 491.

## School of Health Sciences

The School of Health Sciences is dedicated to helping students find ways to improve the quality of life through a variety of innovative undergraduate programs. To achieve this goal, the school offers distinct academic majors in athletic training, applied and pre-professional exercise science, clinical laboratory science, health services administration, public health, and sport management. Courses offered through these programs are designed to prepare students for successful entry into their chosen career path or for admission to graduate school or professional programs.

## Bachelor of Science with a Major in Athletic Training (Inactive starting in 2021)

## Program Director: Jeff Tilly

The certified athletic trainer (ATC) is a highly educated and skilled allied health professional. In cooperation with physicians and other allied health personnel, the ATC functions as an integral member of the health care team for the physically active. Traditionally, secondary schools, colleges and universities, sports medicine clinics, orthopedic surgeon offices, industrial settings, and professional sports teams have employed certified athletic trainers.

The athletic training major is designed for those individuals who seek certification as an athletic trainer for the Board of Certification (BOC). The Commission on Accreditation of Athletic Training Education (CAATE) is the accrediting body for athletic training education programs. The University of Evansville's athletic training program is accredited by CAATE. The University of Evansville's athletic training program is competitive, and a set number of students are allowed entry per year.

The bachelor's degree program prepares the athletic training student for challenges that will be encountered as an allied health professional. This includes the integration of a strong liberal arts and science foundation with problem solving and clinical skill development. The concurrent clinical education model allows the student to work under the supervision of an approved clinical instructor. The majority of clinical education occurs while working with the University's NCAA Division I athletic teams. Convenient off-campus assignments with clinic- and high school-based athletic trainers as well as physicians exist to ensure a well-rounded practical experience.

Many athletic training students find it advantageous to pursue additional degrees in related health care areas offered at the University of Evansville. These include the Doctor of Physical Therapy, the Associate of Science in Physical Therapist Assistance, and the Master in Physician Assistant Science degree. All three programs are accredited by their respective accrediting organizations. The University of Evansville is currently one of only three institutions that offer these three programs in a seven state area in the Midwest. This makes the athletic training program at the University of Evansville a unique experience which enables students to individually structure their learning to meet the needs of the current job market.

## Admission

Entry into the program is competitive. Admission criteria include: Completion or current enrollmentineachofthefollowing prerequisitecourses:AthleticTraining280;ExerciseandSport Science 112, 113, 150, 244 (2 hours); Health Education 100, ; Physical Therapy 100
(Basic skill acquisition and 100 hours of clinical observation are components of Exercise and Sport Science 244. The 100 hours must be accumulated prior to application to the program. Athletic training students have 20 weeks to achieve these totals with an average of five hours per week; each week should be documented by their approved clinical instructor. Weekly submission of the signed hours and a journal is needed to apply to the program.) (Note application deadline below.)

- A grade of C or better in the prerequisite courses
- Minimum cumulative grade point average of 2.75
- Completion of the ATP technical standards
- Completion of a written application
- Personal interview
- Completion of AT-FYE Clinical Skills Checklist
- Completion of all required work for Exercise and Sport Science 244 (2 semesters)

Aftersubmittingallapplicationmaterial,theprospectivestudentmaybegrantedaninterview with the admission committee. An interview is required for admission into the program.

Applications are due the last Friday in January. The selection process will be completed in time for fall semester registration, and all applicants will be notified of their status at this time. Acceptance into the program is conditional based on successful completion of the student's current semester course work.

Directentry intothe programis availableforasmallnumber of qualified incoming freshmen who have been accepted into the direct entry physical therapy program. These students must meetcertainACTandSATscorestandardsandhaveaformalinterviewwiththephysicaltherapy department as well as the faculty of the athletic training education program.

Admission criteria are subject to change. Applications and additional information are available from the program director.

Transfer students may be considered for admission into the program.

## Bachelor of Science

## ATHLETIC TRAINING (INACTIVE STARTING IN 2021)

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing
-
Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (70 hours)
HE 111: Medical Terminology (1 hr)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
EXSS 150: Intro to Exercise Science (2 hrs)
AT 180: Intro to Athletic Training (3 hrs)
AT 282: Basic Skills in Athletic Training (3 hrs)
AT 287: Therapeutic Modalities in Athletic Training (3 hrs)
AT 291: Clinical Education in Athletic Training (2 hrs)
AT 292: Clinical Education in Athletic Training II (2 hrs)
AT 350: Administration of Athletic Training (3 hrs)
AT 388: Evaluation of the Lower Body (3 hrs)
AT 389: Evaluation of the Upper Body (3 hrs)
AT 390: Rehabilitation of Athletic Injuries (3 hrs)
AT 391: Clinical Education in Athletic Training III (2 hrs)
AT 392: Clinical Education in Athletic Training IV ( 2 hrs )
AT 490: Pharmacology and Medical Conditions (2 hrs)
AT 491: Clinical Education in Athletic Training V (2 hrs)
AT 492: Clinical Education in Athletic Training VI (2 hrs)
EXSS 320: Nutrition, Performance \& Health (3 hrs)
EXSS 321L: Applied Human Anatomy and Physiology Lab (2 hrs)
EXSS 352: Physiology of Exercise (3 hrs)
EXSS 356: Biomechanics (3 hrs)
EXSS 388: Exercise Prescription (3 hrs)
EXSS 427: Exercise Testing and Leadership (2 hrs)
EXSS 451: Exercise/Sport Psychology (3 hrs)
Complete 2 hours of practicum.
EXSS 244: Practicum (1 hr)
Complete one course from:
HSA 405: Health Care Systems: Issues and Trends (3 hrs)
HSA 406: Jurisprudence/Ethics in Health Care (3 hrs)
Free Electives (9 hrs)

39 Hours of 300/400 level courses

## Bachelor of Science with a Major in Exercise Science Applied

## Bachelor of Science with a Major in Exercise Science Applied Pre-AT

 Bachelor of Science with a Major in Exercise Science -Pre-professionalThe exercise science major embraces a strong science foundation and focuses on the scientific aspects of exercise related to healthy, injured, and high-risk populations to understand the consequences of physical activity. Exercise science is an applied discipline; therefore, the curriculum includes laboratory or laboratory-type activities in exercise physiology, biomechanics, and exercise testing and leadership. In addition, University- and community-based projects are incorporated into the academic curriculum to give exercise science students exposure to various populations similar to those they may encounter in their chosen professions. Exercise science courses are regularly taught at Harlaxton College in the summer.

All exercise science majors participate in an intensive internship program that is required for graduation. Internship opportunities exist in cardiac rehabilitation, corporate fitness, wellness and fitness centers, strength and conditioning programs, and sport-specific conditioning programs, as well as in other areas of interest to the student. In addition, opportunities exist for students to engage in undergraduate research activities with faculty and other students.

A major in exercise science prepares students for graduate study in areas such as exercise physiology, biomechanics, wellness, health promotion, nutrition, and exercise and sport psychology. It also prepares students to enter such professional schools as physical therapy, physician assistant, or medical schools. Students are prepared for careers in preventative exercise, wellness programs, and to work with healthy populations in maintaining healthy lifestyles.

The exercise science major has two tracks, applied and pre-professional.

## Applied Track

The applied track prepares students for leadership roles in a growing number of career opportunities dealing with human health and wellness such as exercise instruction, cardiac rehabilitation, personal training, strength and conditioning specialist, or as a health and wellness professional. In addition, this degree prepares students for graduate study in such areas as exercise physiology, biomechanics, or exercise and sport psychology.

## Applied Track - PreAT

The Pre-Athletic Training Track prepares students for entrance into the Master of Science in Athletic Training program or similar programs. This track will provide a strong background in Athletic Training and provide students with internship opportunities to observe in Athletic Training Clinical sites. It will also educate students in human health and wellness, exercise instruction, cardiac rehabilitation, personal training, and strength and conditioning specialties. This track prepares students to sit for the Certified Strength \& Conditioning Specialist (CSCS) examination.

## Pre-professional Track

The pre-professional track may be used as preparation for graduate study in areas such as exercise physiology, biomechanics, wellness, health promotion, and public health. The primary emphasis of this track is, however, as a preparation for entry into such professional schools as physical therapy, physician assistant, medical, and podiatry schools. Students can earn both the undergraduate and Doctor of Physical Therapy degrees in six or seven years, depending on the selected pathway.

## Exercise Science Minor (21 hours)

The minor in exercise science prepares students for careers working with relatively healthy populations. The curriculum of this minor prepares students for careers with personal fitness training, corporate wellness programs, or fitness centers.

## Exercise and Sport Science 352, 356, 388, 415, 427, 451, 453; Public Health 195

Exercise and Sport Psychology Minor (20 hours)
Exercise and sport psychology is a rapidly growing subdiscipline of exercise science that studies a wide array of cognitive issues related to physical activity. Exercise psychology examines relationships such as the mental health benefits associated with regular participation in exercise programs and factors related to exercise adherence. Sport psychology is the study of cognitive factors that influence sport performance such as motivation, overtraining and staleness, anxiety, and coach-athlete relationships. The curriculum of this minor prepares students for graduate study in exercise and sport psychology, motor learning, or psychology. The core curriculum of this minor combines classes from the School of Public Health and the Department of Psychology.
Exercise and Sport Science 218, 352, 451, 453; Psychology 226, 229; Neuroscience 125.
Sport Management Minor (24 hours)
This minor provides students with a broad background in business-related aspects of sport. The minor is designed for students interested in working in ticket sales and promotions, advertising, athletics administration, or in sporting retail sales.
Accounting 210; Law 201; Management 377; Economics 102; Exercise and Sport Science 201, 310 350; one from Accounting 211, Finance 361, 362, Management 392,412, 430, Marketing 325, 330.

## Bachelor of Science

## EXERCISE SCIENCE - APPLIED

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements
(41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar
Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
.
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 100, 107, 118
- PHYS 100 or 121

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

- HE 100: Concepts of Health and Wellness (1 hr)

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EXSS 493: Current Issues in Exercise/Sport Science

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (71 hrs)
AT 180: Intro to Athletic Training (3 hrs)
HE 111: Medical Terminology ( 1 hr )
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
EXSS 150: Intro to Health Sciences (2 hrs)
EXSS 201: Intro to Sport Management (3 hrs)
EXSS 310: Sports Law and Ethics (3 hrs)
EXSS 320: Nutrition, Performance \& Health (3 hrs)
EXSS 350: Sport Facility and Event Management (3 hrs)
EXSS 352: Physiology of Exercise (3 hrs)
EXSS 356: Biomechanics (3 hrs)
EXSS 388: Exercise Prescription (3 hrs)
EXSS 400: Principles Theory of Strength/Conditioning (3 hrs)
EXSS 415: Exercise Physiology II (2 hrs)
EXSS 417: Advanced Exercise Science ( 3 hrs )
EXSS 427: Exercise Testing and Leadership (2 hrs)
EXSS 428: Cardiac Rehabilitation (3 hrs)
EXSS 451: Exercise/Sport Psychology (3 hrs)
EXSS 453: Motor Learning (2 hrs)
PH 190: Intro to Public Health (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
BIOL 100: Fundamentals of Biology (4 hrs) OR
BIOL 107: General Biology (4 hrs)
Complete 8 hrs of Internship
EXSS 488: Internship (1-12 hrs)

Free Electives (8 hrs)

39 Hours of 300/400 level courses

## Bachelor of Science

## EXERCISE SCIENCE - APPLIED PRE-AT

2023-2024 | 120 Hours Required
Enduring Foundations General Education Requirements (41 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
.
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 100, 107, 118
- PHYS 100 or 121

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge
-
-
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

- HE 100: Concepts of Health and Wellness (1 hr)

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EXSS 493: Current Issues in Exercise/Sport Science

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (71 hrs)
AT 180: Intro to Athletic Training (3 hrs)
AT 281: Athletic Injury Prevention \& Wellness Promotion I (3 hrs)
AT 385: Athletic Injury Prevention \& Wellness Promotion II (3 hrs)
HE 111: Medical Terminology (1 hr)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
EXSS 150: Intro to Health Sciences (2 hrs)
EXSS 320: Nutrition, Performance \& Health (3 hrs)
EXSS 350: Sport Facility and Event Management (3 hrs)
EXSS 352: Physiology of Exercise (3 hrs)
EXSS 356: Biomechanics (3 hrs)
EXSS 388: Exercise Prescription (3 hrs)
EXSS 400: Principles Theory of Strength/Conditioning (3 hrs)
EXSS 415: Exercise Physiology II (2 hrs)
EXSS 417: Advanced Exercise Science (3 hrs)
EXSS 427: Exercise Testing and Leadership (2 hrs)
EXSS 428: Cardiac Rehabilitation (3 hrs)
EXSS 451: Exercise/Sport Psychology (3 hrs)
PH 190: Intro to Public Health (3 hrs)
QM 227: Introduction to Statistics (3 hrs)
BIOL 100: Fundamentals of Biology (4 hrs) OR BIOL 107: General Biology (4 hrs)

Complete 2 hrs of Practicum
EXSS 244: Practicum (2 hrs)
Complete 8 hrs of Internship
EXSS 488: Internship (1-12 hrs)

Free Electives (8 hrs)

39 Hours of 300/400 level courses

Bachelor of Science

## EXERCISE SCIENCE - PRE-PROFESSIONAL

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -
Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- BIOL 107: General Biology -4 hrs (Pre-PT) OR

BIOL 119: Intro Biology: Molecular Perspective (Pre-PA)
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology (3 hrs) (Pre-PA, PT)
- SOC 105: Introduction to Sociology (3 hrs) OR

SOC 230 (Pre-Med, Pre-PA)
Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

- HE 100: Concepts of Health and Wellness (1 hr)

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- EXSS 493: Current Issues in Exercise/Sport Science OR PT 451, 453, and 453

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 68 hrs )
HE 111: Medical Terminology (1 hr)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
EXSS 150: Intro to Health Sciences (2 hrs)
CHEM 240: Organic Chemistry I (4 hrs)
EXSS 320: Nutrition, Performance \& Health (3 hrs)
EXSS 352: Physiology of Exercise (3 hrs)
EXSS 356: Biomechanics (3 hrs)
EXSS 388: Exercise Prescription (3 hrs)
EXSS 415: Exercise Physiology II (2 hrs)
EXSS 417: Advanced Exercise Science (3 hrs)
EXSS 427: Exercise Testing and Leadership (2 hrs)
PHYS 121: Algebra Physics I (4 hrs)
PHYS 122: Algebra Physics II (4 hrs)
QM 227: Introduction to Statistics (3 hrs)
(Students on DPT 3+3 track may complete PT 451/452)
EXSS 428: Cardiac Rehabilitation (3 hrs)
(Students on DPT 3+3 track may complete PT 422)
Complete 8 hrs of Internship
EXSS 488: Internship (1-12 hrs)
Complete 4 courses from:
AT 180: Intro to Athletic Training (3 hrs)
BIOL 110: Clinical Microbiology (3 hrs)
EXSS 201: Intro to Sport Management (3 hrs)
EXSS 310: Sports Law and Ethics (3 hrs)
EXSS 400: Principles Theory of Strength/Conditioning (3 hrs)
EXSS 451: Exercise/Sport Psychology (3 hrs)
EXSS 453: Motor Learning (2 hrs)
GT 401: Biology, Health, \& Personality Dimensions of Aging (3 hrs)
HSA 405: Health Care Systems: Issues and Trends (3 hrs)
HSA 406: Jurisprudence/Ethics in Health Care (3 hrs)
HSA 414: Health Care Management Theory \& HR (3 hrs)
PH 190: Intro to Public Health (3 hrs)
PH 195: Global Health Issues (3 hrs)
PH 301: Epidemiology (3 hrs)
NEUR 125: Introduction to Neuroscience (3 hrs)
PSYC 357: Neuropsychology (3 hrs)

Free Electives (10 hrs)

39 Hours of $300 / 400$ level courses

## NOTES:

*Pre-PA take BIOL 110, CHEM 280, and CHEM 341
*Pre-Med take BIOL 120, BIOL 331, CHEM 341, and CHEM 370

## Bachelor of Science with a Major in Health Services Administration

## Combined Bachelor and Master of Science in Health Services Administration

The University of Evansville offers both bachelor's and master's degrees in health services administration. The program is structured so that a combined bachelor's and master's degree can be earned in five years. Under this option the student receives both the bachelor's and master's degree at the same time. Students who do not choose the combined program may earn the bachelor's degree in four years. The time required for the combined degree can be shortened by taking course work during the summer. Additionally, students who already hold a bachelor's degree may enroll in the master's program and attend on a part-time or full-time basis.

The many changes in health care over recent years have created a need for managers who can deal with the multitude of challenges specific to the health care industry. Health care administrators are employed in a wide variety of organizations and work environments. These may include hospitals, managed care companies, outpatient care facilities, mental health facilities, pharmaceutical companies, government agencies, health insurance companies, public health agencies, voluntary health agencies, health maintenance organizations, and clinics. This undergraduate major prepares students for employment in the field of health care, or as preparation for graduate or professional programs such as the master's degree in HSA program, or post-graduate programs in public health, physician assistant, or physical therapy.

Internships and field placements are an important part of each student's exposure to various areas of future employment. All students complete six credits of internship during their junior and senior year. The student, the advisor, and the program director mutually agree upon the internship location and content. Internships may be completed during the fall, spring, or summer sessions. Additionally, all master's students participate in up to six credits of field experience. These opportunities provide students with a variety of organizational experiences.

## Combined Program

In addition to the course work required for the bachelor's degree program, students must declare their intention to pursue the five-year combined degree no later than the beginning of their fourth year of study. Exceptions for later admission to the five-year program will be reviewed on an individual basis. For students pursuing the combined BS and MS program, a grade of C - or above is required in all graduate classes and all undergraduate required classes. Variations in course sequencing will occur during the final two years of the five-year program.

## Harlaxton College in Grantham, England

The health services administration program offers a summer program at Harlaxton College which attracts students from programs across the U.S. as well as from the University of Evansville.

## Bachelor of Science

## HEALTH SERVICES ADMINISTRATION

2023-2024 | 125 Hours Required

Enduring Foundations General Education Requirements
(42 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar
Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-

Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105: College Algebra or higher

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- BIOL 107: General Biology -4 hrs (Pre-PT) OR BIOL 119: Intro Biology: Molecular Perspective (Pre-PA)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics
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Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
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Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- HSA 490: Decision Making in Health Care

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements ( 60 hrs )
HE 111: Medical Terminology (1 hr)
ACCT 210: Introduction to Financial Accounting (3 hrs)
ACCT 211: Introduction to Managerial Accounting (3 hrs)
ECON 102: Principles of Microeconomics (3 hrs)
FIN 361: Fundamentals of Finance (3 hrs)
HSA 405: Health Care Systems: Issues and Trends (3 hrs)
HSA 406: Jurisprudence/Ethics in Health Care (3 hrs)
HSA 414: Health Care Management Theory \& HR (3 hrs)
HSA 420: Health Care Planning/Marketing (3 hrs)
LAW 201: Legal Environment of Business (3 hrs)
MGT 311: Management Information Systems (3 hrs)
MGT 377: Organizational Behavior (3 hrs)
MKT 325: Principles of Marketing (3 hrs)
QM 160: Introduction to Data Analytics (3 hrs)
HSA 467: Statistics Appraisal/Evaluation (3 hrs) OR
QM 227: Introduction to Statistics (3 hrs)
Complete 3 hrs from gerontology
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Complete 6 hrs of Internship
HSA 498: Internship in Health Services Administration (1-6 hrs)
Complete 8 hrs from:
BIOL 107: General Biology (4 hrs)
CHEM 118: Principles of Chemistry (4 hrs)
HE 160: First Aid with CPR (2 hrs)
HS 290: Drug and Alcohol Abuse
HSA 499: Special Topics Health Services Administration (3 hrs)
NURS 490: Seminar on Alcohol and Substance Abuse
NUTR 304: Nutrition Concepts-Controversies (3 hrs)
PH 190: Intro to Public Health (3 hrs)
PH 301: Epidemiology (3 hrs)
PHIL 317: Bioethics (3 hrs)
SOC 337: Social Aspects Health/Health Care (3 hrs)

Free Electives (23 hrs)

39 Hours of 300/400 level courses

## Bachelor and Master of Science

## HEALTH SERVICES ADMINISTRATION

2023-2024 | 149 Hours Required

## Enduring Foundations General Education Requirements

 (41 hours)Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105: College Algebra or higher

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- ECON 101: Principles of Macroeconomics (min. grade of C-)
- 

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- HSA 490: Decision Making in Health Care

Overlay: Writing Across the Curriculum (4 courses)
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## Bachelor of Science in Public Health Health Policy

Bachelor of Science and Master of Public Health

This degree program trains students in multidisciplinary approaches to public health practice and research. The degree plans to explore both quantitative and qualitative aspects of public health at all levels of analysis. Graduates will advance, through selective employment or further education, to become the new generation of public health professionals prepared to face the emerging challenges to human health from a population perspective.

A major in public health prepares students for graduate study in areas such as health care management, wellness and health promotion, and nutrition. It also prepares students to enter professional programs such as business, physical therapy, and medical school along with several other programs. For graduates with the bachelor's degree who wish to enter the job market directly, there is a plethora of opportunities. Careers in public health can be found in a number of areas in private and public organizations such as statewide and regional health care agencies, community clinics, biomedical companies, health-education institutions, and non-governmental organizations. The undergraduate major prepares students for employment in the field of public health or for preparation in post-graduate programs or professional programs such as those in medicine, public health, physician assistant science, physical therapy, and more. Students may also earn both the public health and doctorate of physical therapy degrees in six or seven years, depending on the selected pathway.

## Health Policy Emphasis

The Health Policy emphasis prepares graduates to be decision makers, critical thinkers, and future leaders in both the public and private sectors of the health system. The health care industry offer students a vast array of opportunities. Such opportunities are with the state and local health departments, hospital systems, government agencies, health insurance companies, research institutions, and consulting firms, to name a few.

## Combined Program

In addition to the course work required for the bachelor's degree program, students must declare their intention to pursue the five-year combined degree no later than the beginning of their third year of study. Exceptions for later admission to the five-year program will be reviewed on an individual basis. For students pursuing the combined bachelor of science and master of public health program, a grade of C - or above is required in all graduate classes and all undergraduate required classes. Variations in course sequencing will occur during the final two years of the five-year program.

Public Health Minor (23 hours)
The minor in public health prepares students for careers that are focused on disease prevention and health promotion. The curriculum of this minor prepares students for careers with community health centers, health agencies, and wellness programs.

Health Services Administration 405; Public Health 190, 195, 360, 401, 409, 425; Sociology 337

## Bachelor of Science

## PUBLIC HEALTH - HEALTH POLICY EMPHASIS

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (41 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place

Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy
-
-
Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology (3 hrs)
- SOC 105: Introduction to Sociology (3 hrs)

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
-
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- PH 490: Integrative Experience

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (54 hrs)
NUTR 304: Nutrition Concepts-Controversies (3 hrs)
PH 190: Intro to Public Health (3 hrs)
PH 195: Global Health Issues (3 hrs)
PH 360 Community Health and Social Justice (3 hrs)
PH 401: Epidemiology (3 hrs)
PH 409: Environmental Health (3 hrs)
PH 415: Health Behavior (3 hrs)
PH 480: Programs, Problems, and Policies in Public Health (3 hrs)
PH 425: Biostatistics (3 hrs)
Complete 3 hrs of Internship.
PH 488: Internship (1-12 hrs)
Complete 12 hrs from:
COMM 380: Intercultural Communications (3 hrs)
COMM 410: Health Communications (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
ETH 200: Social Justice Movements (3 hrs)
GT 401: Biology, Health, \& Personality Dimensions of Aging (3 hrs)
GWS 101: Gender and Women Studies (3 hrs)
HE 111: Medical Terminology ( 1 hr )
PHIL 121: Introductory Ethics (3 hrs)
PHIL 316: Environmental Ethics (3 hrs)
PSYC 229: Social Psychology (3 hrs)
SOC 230: Social Problems of the Modern World (3 hrs)
SOC 460: Aging and Society (3 hrs)
Health Policy Emphasis
HSA 405: Health Care Systems: Issues and Trends (3 hrs)
HSA 406: Jurisprudence/Ethics in Health Care (3 hrs)
HSA 414: Health Care Management Theory \& HR (3 hrs) HSA 420: Health Care Planning/Marketing (3 hrs)

Free Electives (25 hrs)

39 Hours of 300/400 level courses

Combined

## BACHELOR OF SCIENCE/MASTER OF PUBLIC HEALTH

2023-2024 | 130 Hours Required

## Enduring Foundations General Education Requirements

 (42 hours)Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge
-
Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy
-
Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 118: Principles of Chemistry (4 hrs)
- BIOL 107: General Biology -4 hrs (Pre-PT)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology (3 hrs)
- SOC 105: Introduction to Sociology (3 hrs)

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness
.
Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- PH 490: Integrative Experience

Overlay: Writing Across the Curriculum (4 courses)
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Combined Program Requirements ( 85 hrs )
NUTR 304: Nutrition Concepts-Controversies (3 hrs)
PH 190: Intro to Public Health (3 hrs)
PH 195: Global Health Issues (3 hrs)
PH 360: Community Health and Social Justice(3 hrs)
PH 488: Internship (3 hrs)
PH 401: Epidemiology (3 hrs)
PH 409: Environmental Health (3 hrs)
PH 415: Health Behavior (3 hrs)
PH 425: Biostatistics and Health (3 hrs)
PH 530: Health Economics (3 hrs)
PH 535: Public Health Law and Ethics (3 hrs)
PH 540: Strategic Management in Health Programs (3 hrs)
PH 542: Health Systems and Policy (3 hrs)
PH 543: Population-based Health (3 hrs)
PH 547: Survey Research Methods (3 hrs)
PH 480: Programs, Problems, and Policies in Public Health (3 hrs)
PH 590: Integrative Experience (3 hrs)
PH 598: Public Health Internship (3 hrs)
Complete 12 hrs from:
COMM 380: Intercultural Communications (3 hrs)
COMM 410: Health Communications (3 hrs)
EDUC 385: Multicultural Understanding (3 hrs)
ETH 200: Social Justice Movements (3 hrs)
HE 111: Medical Terminology (1 hr)
GT 401: Biology, Health, \& Personality Dimensions of Aging (3 hrs)
GT 402 Social Aspects of Aging (3 hrs)
GWS 101: Gender and Women Studies (3 hrs)
PHIL 121: Introductory Ethics (3 hrs)
PHIL 316: Environmental Ethics (3 hrs)
PSYC 229: Social Psychology (3 hrs)
SOC 230 Social Problems (3 hrs)
SOC 460: Aging and Society (3 hrs)
Health Policy Emphasis:
HSA 405 Health Care Systems (3 hrs)
HSA 406: Jurisprudence and Ethics (3 hrs)
HSA 414: Health Care Management and HR (3 hrs)
HSA 420: Health Care Planning and Marketing (3 hrs)

39 Hours of 300/400/500 level courses

## Combined

## BACHELOR OF SCIENCE IN NURSING/ MASTER OF PUBLIC HEALTH

2023-2024 | 120 Hours Required

Enduring Foundations General Education Requirements (43 hours)
Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition .

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity
-
Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
-
-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105: College Algebra or higher

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 108: Elementary Chemistry (4 hrs) OR

CHEM 118: Principles of Chemistry (4 hrs)

- HS 205: Pharmacology (3 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology (3 hrs)
- SOC 105: Introduction to Sociology (3 hrs)

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

- NUTR 304: Nutrition Concepts/Controversies (3)

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- NURS 484: Professional Nursing Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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Nursing Major Requirements (78 hrs)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
BIOL 110: Clinical Microbiology (3 hrs)
NURS 165: Survey of Professional Nursing (3 hrs)
NURS 170: Therapeutic Relationship (3 hrs)
NURS 261: Fundamentals of Professional Nursing (3 hrs)
NURS 262: Clinical Component of Fundamentals (3 hrs)
NURS 264: Physical Assessment with Lab (3 hrs)
NURS 271: Healthy Families Across the Lifespan (3 hrs)
NURS 272: Clinical Component of Healthy Families (3 hrs)
NURS 361: Medical Surgical Nursing I (3 hrs)
NURS 362: Clinical Component of Adult \& Pediatric Medical Surgical Nursing I (2 hrs)
NURS 363: Mental Health Nursing (3 hrs)
NURS 364: Clinical Component of Mental Health Nursing (2 hrs)
NURS 371: Medical Surgical Nursing II (3 hrs)
NURS 373: Medical Surgical Nursing III (3 hrs)
NURS 374: Clinical Component of Medical Surgical Nursing II and III (4 hrs)
NURS 385: Research \& Evidence-Based Practice in Nursing (3 hrs)
NURS 463: Leadership \& Management in Professional Nursing (3 hrs)
NURS 467: Global Health Nursing (3 hrs)
NURS 468: Clinical Component of Global Health Nursing (4 hrs)
NURS 469: Strategies for Success in Professional Nursing (2 hrs)
NURS 477: Complex Medical Surgical Nursing (3 hrs)
NURS 478: Clinical Management of Complex Clients (4 hrs)
Complete one from:
QM 227: Introduction to Statistics (3 hrs)
SOC 344: Intro to Behavioral Statistics (3 hrs)
HSA 467: Statistics Appraisal/Evaluation (3 hrs)
PSYC 245: Statistics for Psychologist (3 hrs)
39 Hours of 300/400 level courses
Master of Public Health Requirements
During spring of senior year, complete two from:
PH 525: Biostatistics (3 hrs)
PH 542: Health Systems and Policy (3 hrs)
Once BSN is earned:
PH 501: Epidemiology (3 hrs)
PH 509: Environmental Health (3 hrs)
PH 515: Health Behavior (3 hrs)
PH 530: Health Economics (3 hrs)
PH 535: Public Health Law and Ethics (3 hrs)
PH 540: Strategic Management in Health Programs (3 hrs)
PH 543: Population-Based Health (3 hrs)
PH 547: Survey Research Methods (3 hrs)
PH 580: Programs, Problems, and Policies in Public Health (3 hrs)
PH 590: Integrative Experience (3 hrs)
PH 593: Practicum (3 hrs)

# Dunigan Family School of Nursing 

Faculty: Baumann,Thomas, Price, Cobb, Rea, Fedor-Bassemier, Pruden, Wooton, LaMar (Chair), Ranknin, Williams

## Bachelor of Science in Nursing

The nursing faculty is committed to education that involves the acquisition of knowledge, skills, and professional experience. The study of the art and science of nursing is coordinated with the study of natural, behavioral, and social sciences, emphasizing learning through practice in various clinical settings. Upon program completion, graduates are eligible to take the National Council Licensure Examination for Registered Nurses. Graduates are prepared for beginning professional practice positions in varied settings as well as for entry into graduate study.

The Bachelor of Science in Nursing degree program is accredited by the Accreditation Commission for Education in Nursing, 3343 Peachtree Road NE, Suite 850, Atlanta, Georgia 30326, www.acenursing, 404-975-5000. It is also accredited by the Indiana State Board of Nursing. The Dunigan Family School of Nursing is a member of the American Association of Colleges of Nursing and the National League for Nursing.

To graduate with a BSN degree the student must complete all the courses in the nursing curriculum plan and maintain an overall cumulative GPA of at least 2.5 and a nursing cumulative GPA of at least 2.5. Additionally, students must have a grade of $C$ or above in all nursing courses as well as in Biology 110, Chemistry 108 or 118, Exercise and Sport Science 112, 113, Health Sciences 205, Nutrition 304, Psychology 121, and Sociology 105. Specific information regarding curriculum progression policies is found in the University of Evansville Baccalaureate Program in Nursing Student Handbook.

Students in the nursing major may participate in a campus-based student nurse organization and are considered for induction into the Eta Lambda Chapter of Sigma Theta Tau International Nursing Honor Society.

## Fees and Assistance

In addition to regular University costs, additional expenses incurred by nursing students include, but are not limited to, immunization, testing and lab fees, criminal background checks, drug screen, uniforms, and travel to clinical sites. All students are required to have a laptop or netbook that meets University of Evansville recommended computer system requirements. Starting in the sophomore year, students must have a small electronic tablet with required nursing references installed. Students should consult the Office of Student Financial Services for information about additional financial aid available to students in the nursing major.

## Clinical Facilities

Several types of clinical facilities are used in the educational programs of the department. These include inpatient, outpatient, and various community health care settings.Students may have an opportunity to study nursing at Harlaxton College in England or in other countries through study abroad courses.

## Admission

Entering freshmen may qualify for direct entry into UE's Bachelor of Science in Nursing program. University of Evansville accepted applicants must meet the following requirements in order to be accepted directly into the BSN program: a minimum of four years of English and three years of mathematics, a minimum of three years of science (including grades of C or above in two semesters of chemistry), and SAT-R score of 1100 or above or ACT score of 22 or above. Students meeting academic requirements also must be in good health, eligible for licensure, certification, or registration and capable of meeting clinical practice requirements. Students who do not meet admission criteria are considered on an individual basis by the program's Admission, Standards, and Progression Committee. Applicants to the program may be requested to arrange a personal interview with a faculty member. The program accepts students who change their majors, transfer students, and international students. Students interested in transferring to the nursing program and international students must contact the Dunigan Family School of Nursing for specific admission and transfer policies.

Nursing at Harlaxton College in Grantham, England
Nursing course work is offered in the fall semester at the Harlaxton near Grantham, England. Students at the senior level in the nursing program may have an opportunity to participate. For details, contact the Dunigan Family School of Nursing

## Combined Program with Master of Public Health

Students pursuing a BSN also have the option to earn a Master in Public Health degree in their 5th year. See Public Health for program requirements.

## Bachelor of Science

## NURSING

2023-2024 | 121 Hours Required

Enduring Foundations General Education Requirements (43 hours)

Outcome 1: (3 hrs) Critical Reading and Thinking

- FYS 112 or 312 First Year Seminar

Outcome 2: (3 hrs) Imaginative Expressions of Human Condition -

Outcome 3: (3 hrs) Human History and Historical Context of Knowledge

Outcome 4: (3 hrs) Fundamental Beliefs: Human Identity, Core Values, Place
-
Outcome 5: (3 hrs) Human Aesthetic Creation and Artistic Creativity

Outcome 6: (6 hrs) Linguistic and Cultural Competence in Language
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-
Outcome 7: (3 hrs) Quantitative Literacy

- MATH 105: College Algebra or higher

Outcome 8: (7 hrs with at least one lab course) Scientific Literacy

- CHEM 108: Elementary Chemistry (4 hrs) OR

CHEM 118: Principles of Chemistry (4 hrs)

- HS 205: Pharmacology (3 hrs)

Outcome 9: (6 hrs) Core Concepts: Society, Human Behavior, Civic Knowledge

- PSYC 121: Introduction to Psychology (3 hrs)
- SOC 105: Introduction to Sociology (3 hrs)

Outcome 10: (1 hr) Knowledge and Responsibility Health and Wellness

- NUTR 304: Nutrition Concepts/Controversies (3)

Outcome 11: (3 hrs) Think Critically \& Communicate Orally \& in Writing

- NURS 484: Professional Nursing Senior Seminar

Overlay: Writing Across the Curriculum (4 courses)
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Major Requirements (78 hrs)
EXSS 112: Human Anatomy and Physiology I (4 hrs)
EXSS 113: Human Anatomy and Physiology II (4 hrs)
BIOL 110: Clinical Microbiology (3 hrs)
NURS 165: Survey of Professional Nursing (3 hrs)
NURS 170: Therapeutic Relationship (3 hrs)
NURS 261: Fundamentals of Professional Nursing (3 hrs)
NURS 262: Clinical Component of Fundamentals (3 hrs)
NURS 264: Physical Assessment with Lab (3 hrs)
NURS 271: Healthy Families Across the Lifespan (3 hrs)
NURS 272: Clinical Component of Healthy Families (3 hrs)
NURS 361: Medical Surgical Nursing I (3 hrs)
NURS 362: Clinical Component of Adult \& Pediatric Medical Surgical Nursing I (2 hrs)
NURS 363: Mental Health Nursing (3 hrs)
NURS 364: Clinical Component of Mental Health Nursing (2 hrs)
NURS 369: Strategies for Professional Nursing Practice (1 hr)
NURS 371: Medical Surgical Nursing II (3 hrs)
NURS 373: Medical Surgical Nursing III (3 hrs)
NURS 374: Clinical Component of Medical Surgical Nursing II and III ( 4 hrs )
NURS 385: Research \& Evidence-Based Practice in Nursing (3 hrs)
NURS 463: Leadership \& Management in Professional Nursing (3 hrs)
NURS 467: Global Health Nursing (3 hrs)
NURS 468: Clinical Component of Global Health Nursing (4 hrs)
NURS 469: Strategies for Success in Professional Nursing (2 hrs)
NURS 477: Complex Medical Surgical Nursing (3 hrs)
NURS 478: Clinical Management of Complex Clients (4 hrs)
Complete one from:
QM 227: Introduction to Statistics (3 hrs)
SOC 344: Intro to Behavioral Statistics (3 hrs)
HSA 467: Statistics Appraisal/Evaluation (3 hrs)
PSYC 245: Statistics for Psychologist (3 hrs)
39 Hours of 300/400 level courses

## Harlaxton College

Holly Carter, Executive Director and Dean

Harlaxton College is the overseas study center of the University of Evansville, housed in Harlaxton Manor, a magnificent 100+ room building in a tranquil countryside setting just outside Grantham in Lincolnshire, England. The site is comprised of the Manor house, Carriage House, Gate House, Walled Garden, with several other small buildings on the 300acre property. The gardens are well manicured and feature an Italian Garden, Dutch Canal, French Garden, and woodlands. The estate is used for the college and outside events and enterprise.

The College has a fall and spring semester that is attended by University of Evansville students as well as partner students. The summer has two month-long summer terms and is home to a variety of custom programs from universities around the United States, as well as conferences, reunions, and other UK groups. Each term is supported by a comprehensive infrastructure, including an admissions team housed in the US that helps students apply and prepare for their time abroad.

On site at Harlaxton, there is a student experience team that coordinates travel, sports, activities, wellbeing, and community within the Manor. There is a nurse and counselor available for students during term time. The refectory and bistro serve meals and snacks for students. Our reception and security team are also available to help students and ensure 24-hour coverage.

Students participate in the program in a variety of ways, including internships, changemaking classes, British studies courses, and our Masters in Innovative Leadership in Heritage Management. Undergraduate students can study at Harlaxton for a semester or year working with their academic advisors to ensure that all courses work towards their degree plan.

The experience is complimented by many programs that allow students to work in the local community and engage deeply with culture. Global Gateway is a co-curricular intercultural competency program that many students find invaluable as well as our British Culture trips, provided as part of their program. Our long standing Meet a Family volunteers show our students life in the UK as a part of their families and the local community. All these options, coupled with the academic and changemaking opportunities, allow students to take a deep dive into the UK during their time abroad.

## Undergraduate Course Descriptions

## Accounting (ACCT)

Accounting courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.

ACCT 210 Introduction to Financial Accounting (3) This course is an introduction to financial accounting concepts, with emphasis on communicating financial information to external users for decision making purposes. Students are introduced to the U.S. Generally Accepted Accounting Principles (GAAP), the accounting process, transaction analysis, financial statement preparation, and related topics.
ACCT 211 Introduction to Managerial Accounting (3) This course is anintroductiontomanagerialaccounting concepts, withemphasison using financial information for decision making purposes. Students are introduced to cost classifications and product costing, multiple methodsofincomestatementandcashflowstatement preparation, budgetpreparationandvarianceanalysis,financialstatementanalysis, and other related topics. Prerequisite: ACCT 210.
ACCT 310 Intermediate Accounting I (3) Stresses basic theory and alternativeapproachestoincomedeterminationandassetvaluation. Includes study of basic financial statements, the accounting cycle, cash, receivables, inventory, property, plant and equipment, intangibles, and liabilities. Prerequisites: Grade of C- or better in ACCT 210. Fall.

ACCT 311 Intermediate Accounting II (3) Examines problems in accountingforstockholders'equity, investment,revenuerecognition, income taxes, pensions, and leases. In-depth study of accounting changes and error analysis, statement of cash flows, financial statementanalysis, disclosurerequirements, andchangingprices. Prerequisite: Grade of C- or better in ACCT 310. Spring.
ACCT 317 Cost Accounting (3) Examines issues and procedures in productcostingforfinancialstatementpurposesunderbothhistorical andstandardcosting.Includesjobcosting, processcosting, andactiv-ity-basedcostingmethods,alongwithinventorymanagement,pricing decisions, cost allocations, and other advanced topics. Prerequisite: Grade of C- or better in ACCT 211. Fall.

ACCT 321 Accounting Information Systems (3) This course provides an introduction to the design, implementation and evaluation of accounting information systems. Topics covered include the role and purpose of accounting information systems, transaction processing, internal control, XBRL, enterprise resource planning systems, electronic business, and related topics. Prerequisite: Accounting 211. Spring.
ACCT 329 Introduction to Taxation (3) Examines the role of taxes in society and their impact on business entities and individuals. An introduction to income, exclusions, deductions, and credits. Tax planning and analysis for decision-making will also be considered. Prerequisite: Grade of C- or better in ACCT 210. Fall.
ACCT 347 International Accounting (3) Introduces and examines accounting for transactions in a global economy. Course dedicated to an overview of the convergence of U.S. Generally Accepted Accounting Principles with International Financial Reporting Standards. Specific topics include financial disclosure, foreign exchange, taxation, and ethics. Prerequisite: Grade of C- or better in ACCT 310. Offered periodically.

ACCT 360 Computer Accounting (3) This course introduces students to popular accounting software applications used by millions ofsmallandmedium-sizeorganizations aroundthe world.Students will learn to use the software processes and procedures to prepare reports relatedtotheaccounting cycle,generalledger,accounts payable,accounts receivable, payrollandinventorysystem.Accounting conceptsaredemonstratedinreal-worldbusinesssituations.Gradeof C- or better in ACCT 211.
ACCT 380 Special Topics in Accounting (3) Covers topics not included in other courses, gives greater depth in certain areas, and explores current accounting topics. Repeatable course. Content changes each time course is offered. Prerequisite:Grade of C-orbetter in ACCT 211. Offered periodically.
ACCT395IndependentStudy (1-3) Independentresearchinaccounting conductedunderfacultysupervision. Prerequisites:GradeofC-or better in ACCT 210 and permission of instructor.
ACCT 398 Internship in Accounting (3) First internship; a structured assignment that allows student to gain practical experience in an accounting position relating to an area of career interest. Student is directed by the internship director and supervised by a member of the cooperating organization. Enrollment in course must be concurrent with work experience. A contract (available from the business school's internship director) must be approved and an offer letter from the internship provider must be on file before registering for course. Sponsoring institutions may require students to have completed specific course(s) in addition to the following prerequisites prior to beginning the internship. Prerequisites: ACCT 310; permission of the internship director of the Schroeder Family School of Business Administration.
ACCT 414 Auditing (3) Studies the auditing profession and its relationshiptothefinancial community.Includes anexamination of professionalethics,auditingstandards,riskassessment,internalcontrols, auditsofcycles,sampling, analyticalandsubstantive procedures, and reporting.Studentsarealsointroducedtocomputerassistedauditing techniques. Prerequisite: Grade of C- or better in ACCT 310. Spring.
ACCT 420 Advanced Accounting (3) Studies the theory and techniques of accounting and reporting for acquisitions, consolidated financial statements, partnerships, variable interest entities, and foreign currency translation. Prerequisite: Grade of C - or better in ACCT 310. Offered periodically.
ACCT 429 Advanced Taxation (3) A deeper study of federal, state, and local tax laws as it relates to entities, building upon content covered in Accounting 329. Examines the taxation, formation, reorganization, and liquidation of entities. Prerequisite: Grade of C- or better in ACCT 329. Spring.
ACCT 430 Advanced Managerial Accounting (3) Studies the application of management accounting to strategy and the impact of new and evolving management thinking. Topics include cost allocations, sales variances, management control systems, transfer pricing, performance evaluation, and compensation systems. Prerequisite: Grade of C- or better in ACCT 317. Offered periodically.
ACCT 450 Forensic Accounting (3) Forensic accounting involves the application of specialized investigative knowledge and skills to collect, analyze and assess evidence and to communicate findings in administrative and legal venues including the boardroom and courtrooms. Subjects covered in this course include fraudulent financial reporting, fraud detection in financial reporting, misappropriation of assets, money laundering, litigation services offered by accountants, evidence management and computer
forensics. Prerequisite: C- or better in ACCT 211.
ACCT 455 Financial Analytics (3) This course covers topics such as computer-based modeling and forecasting and the use of analytics in auditing and consulting practices. Uses spreadsheets and other software products to analyze the impacts of financial decisions related to financial statement analysis, cash budgeting, and cost of capital determination, capital budgeting, and capital structure choices. The course covers a variety of techniques, such as sensitivity and scenario analysis, optimization methods, Monte Carlo simulation, and regression analysis. Same course as FIN 455. Prerequisite: C- or better in both ACCT 310 and FIN 361.
ACCT 498 Internship in Accounting (3) Second internship; a structured assignment that allows the student to gain practical experience in an accounting position relating to an area of career interest. Must be a distinct work experience from that provided by Accounting 398. Credits earned apply only as free elective credits. Student is directed by the internship director and supervised by a member of the cooperating organization. Enrollment in course must be concurrent with work experience. A contract (available from the business school's internship director) must be approved and an offer letter from the internship provider must be on file before registering for course. Sponsoring institutions may require students to have completed specific course(s) in addition to the following prerequisites prior to beginning the internship. Prerequisites: Grade of C- or better in ACCT 398; permission of the internship director of the Schroeder Family School of Business Administration.
ACCT 499 Professional Internship (12) A structured, full-time, professional assignment that allows students to gain practical experience in an accounting position relating to an area of career interest. Students are directed by the internship director and supervised by a member of the cooperating organization. Enrollment in the course must be concurrent with work experience and all requirements of course must be met during the semester in which the student is enrolled in the course. A contract (available from the business school's internship director) and an offer letter from the internship provider must be reviewed and approved by a review committee before the student may register for the course. Cooperating organizations may require students to have completed specific courses in addition to the following prerequisites prior to beginning the internship. Student must work at least 35 hours per week, totaling at least 540 hours at the cooperating organization. Prerequisites: Grade of C- or better in ACCT 310; permission of internship director and review committee of the Schroeder Family School of Business Administration. Fall and Spring only. May not be repeated.

## Anthropology (ANTH)

Anthropologycoursesaretaughtbythefaculty oftheDepartmentof Law, Politics, and Society.
ANTH 200 World Prehistory (3) Introduces the field of prehistoric archaeologyandtracestheevolutionofculturefromtheearlieststone tools to the formation of ancient civilizations in both the Old and New Worlds.
ANTH 207 Cultural Anthropology (3) Studies societies all over the world,from hunter-gathererstoindustrial states. Explorestherange of variation informs of subsistencetechnology, family, government, religion, and other institutions. Seekstoexplaincultural differences.
ANTH 301 Special Topics in Anthropology (3) Topics chosen on the basis of programmatic need or student interest. Prerequisite: ANTH 200 or 207.

ANTH 310 Cultures of Native North America (3) Surveys the origins, prehistory and traditional ways of life of the Native Americans. Studies representative societies from each of the major culture areas. Prerequisite: ANTH 200 or 207; or permission of instructor.
ANTH 315 Indians of the Great Plains (3) Covers the buffalo-hunting societies of the American West, their habitat, prehistory, ways of life, and wars with the United States. Prerequisite: ANTH 200 or 207; or permission of instructor.
ANTH 319 Peoples of Africa (3) Surveys African geography, history, and representative societies from differentregions ofthecontinent. Prerequisite: ANTH 200 or 207; or permission of instructor.
ANTH 416 Human Evolution (3) Outlines the stages of hominid biological and cultural evolution, with attention to human variation and the primates. Prerequisite: ANTH 200 or 207.
ANTH 440 Linguistic Anthropology (3) Surveys phonetics and phonology,morphology,syntax,children'slanguageacquisition,language origins, historical linguistics, ethnolinguistics, and sociolinguistics. Prerequisite: ANTH 200 or 207; or permission of instructor.
ANTH 453 Anthropology of Religion (3) Explores theories of religious beliefs and behavior in non-Western societies.Covers cosmology, myth, ritual, religious specialists, and dynamics. Prerequisites: Six hours of anthropology; junior or senior standing.
ANTH 494 Directed Study (1) See Sociology 494. Prerequisites: Nine hours of anthropology; junior or senior standing; permission of instructor.
ANTH 496 Internship (1) Internships available to majors of junior or seniorstandingwhohavecompletedcorecourses.GPArequirements must be met and student must file an internship application with advisor.
ANTH 497 Internship in Teaching Anthropology (1) Provides majors of junior or senior standing with a comprehensive, supervised field experienceinteachingandanthropologicalpedagogy.Designedfor students whoarepreparing forgraduatestudy inthe social sciences. GPA requirements must be met and students must file a teaching internshipapplication withadvisor.Prerequisites:Sociology-Anthropologymajor,sponsorshipbythesupervisingfacultymember,junior or senior standing, or permission of instructor. 1-2 credits.

## Archaeology (ARCH)

Archaeology courses are taught by the faculty of the Department of Archaeology and Art History.
ARCH 100 Great Discoveries in Archaeology (3) This course providesanintroductiontothedisciplineofarchaeology, anoverviewof greatarchaeologicaldiscoveriesworldwide, andacritical discussion of archaeological myths and hoaxes. It is intended for students in any major who are interested in learning about the past and how it is presented to the public.
ARCH 105 Introduction to Greek Archaeology (3) Comprehensive overview of the material culture of the Greeks from the Bronze Age through the Hellenistic period, tracing the main developmental trends in architecture, city planning, sculpture, and the minor arts both in the Greek mainland and the Greek colonies overseas. Althoughprimarilyarchaeologicalinorientation,necessaryhistorical context is provided. Fall.
ARCH 106 Introduction to Roman Archaeology (3) Comprehensive survey ofthematerialculture oftheRomans examiningarchitecture, city planning, art, and technology. Traces development of Roman civilization from the Republic to the Late Antique period. Spring.

ARCH 192 Introductory Archaeology Seminar (3) Seminar intended primarily for freshman or new archaeology majors. Emphasizes fundamental concepts relatingtostratigraphy,relativeandabsolute chronologies, types of archaeological data, map/section reading, recordingprocedures,approachestointerpretation,andresearchskills.
ARCH 206 Introduction to Near Eastern Archaeology (3) Study of Mesopotamia, Anatolia, and the Levant from the Neolithic period to the establishment of the Persian Empire.
ARCH 207 Introduction to Egyptian Archaeology (3) Overview of Egyptian civilization from the predynastic period to the New Kingdomthroughtheexplorationoffuneraryarchitecture,sculpture, wall painting, tomb furnishings, and other minor arts. The course examines archaeological evidencefromahistorical perspective,focusing on both the local history of Egypt and on its relationship with other Mediterranean civilizations.
ARCH 285 Technical Skills for Archaeologists (3) Introduces archaeology students to skills and techniques useful in recording and analyzing field data as well as developing 3-D models of the project site.Topicsincludetechnicalsketching andutilizing computeraided (CAD) techniques for development of accurate 2-D drawings as well as 3-D models. Prerequisites: Sophomore standing.
ARCH 305 Archaeological Ceramics (3) Examines the study of pottery in archaeology, including physical aspects of ceramic manufacture, development of typologies and relative chronologies for fabric, shape, and decoration, analysis and conservation of ceramic finds, as well as documentation of ceramic finds through profile drawing and cataloging. Uses Greek painted pottery from the Late Bronze Age through the start of the Classical period, Roman red wares, and local Woodland and Mississippian pottery as examples. Prerequisite: ARCH 105, ARCH 192 or ARTH 208; or permission of instructor.
ARCH 306 Greek Architecture (3) Traces the development of Greek architecturefromtheLateBronzeAgethroughtheHellenisticperiod. Studiesthedevelopmentofcityplanning,temples, secularbuildings, and funerary monuments. Prerequisite: ARCH 105 or ARTH 208 or permission of instructor.
ARCH 307 Roman Architecture (3) Examines the development of Roman building from its roots in Greek and Etruscan architecture to theeclecticRomanarchitecturalidiomoftheEmpire.Emphasizesthe Roman integration of traditional building elements with their own increasing technical virtuosity as structural engineers. Prerequisite: ARCH 106 or ARTH 208 or permission of instructor.
ARCH 308 Greek and Roman Sculpture (3) Examines the development of sculpture within the Greco-Roman world. Topics covered include the evolution of naturalism in the Greek Archaic period, the high classical style of the 5th century BCE, the varied genres of the Hellenistic world, Roman Republican portraiture, and Roman historical reliefs. Prerequisite: ARCH 105 or 106 or ARTH 208 or permission of instructor.
ARCH 309 The Etruscans (3) A study of the origins of the Etruscans, who made their appearance in central Italy in the 7th century BCE, and their impact on other Mediterranean cultures. An attempt is made to reconstruct their culture as it can be understood from the architecture and artifacts preserved today. Prerequisite: ARCH 105 or ARTH 208 or permission of instructor.

ARCH 311 Archaeology of Syro-Palestine (3) Examines the archaeology of Syro-Palestine (modern Israel, Jordan and the Palestinian National Authority) from late prehistory through the Persian period (ca. 8000-332 BCE). Although archaeological data is the primary source of information, other sources, including the Hebrew Bible (Old Testament) and other texts, are employed where appropriate.

ARCH 320 Topics in Archaeology (3) Focuses on a topic not offered regularly, suchas AegeanarchaeologyornorthernEuropean prehistory. May be repeated. Prerequisite: ARCH 105 or 106 or ARTH 208 or permission of instructor.
ARCH 340 Field Techniques (3) Introduces students to the process of field archaeology. Projects vary from year to year, but involve either excavation of a historical site in Evansville, or assisting with an excavation or survey conducted locally.
ARCh 390 Internship in Archaeology (1-12) Internships designed to meet the educational needs of students' professional goals are recommended for archaeology majors and may be arranged with a professional individual or institution. A maximum of 12 credit hours earned in ARCH 390 may count toward the degree. Prerequisites: permission of faculty advisor and faculty/museum liaison.
ARCH 394 Non-UE Archaeology Field Practica (3) This course is usedtorecordarchaeologicalfield practicasponsored byinstitutions other than the University of Evansville.
ARCH 395 Practicum in Archaeology (3) This practicum in archaeologyintroducesstudentstoboththepracticalandtheoreticalaspects of archaeology. Students participate in an excavation as well as in documentationandconservation ofartifacts. Theworkisconducted underthesupervision ofaprofessionalstaffofarchaeologists. Prerequisite: ARCH 105 or 106 or permission of instructor.
ARCH 400 Archaeological Method and Theory (3) Examination of the theoretical bases of the discipline of archaeology, the history of thediscipline, andthemajorschools of interpretation. Also, research design, development of chronologies, and the application of scientific techniques to analysis of archaeological remains. Prerequisites: ARCH 105 or 106; one 300-level archaeology course; or permission of instructor. Course fulfills capstone requirement.
ARCH 415 Women in Antiquity (3) Seminar focuses on women in antiquity. Reviews recentstudies of archaeological investigations of women'ssocialandcultural rolesandfocusesonselectedcasestudies of women in the ancient Near East and eastern Mediterranean from late prehistory through Classical antiquity.
ARCH 420 Northern European Prehistoric Archaeology (3) Examines the archaeology of northern Europe from the Neolithic period through the Roman period. Emphasis on the Celtic cultures of northern Europe.
ARCH 492 Topical Seminars in Archaeology (3) Special seminar topics in archaeology not included in the regular course offerings. May be repeated.
ARCH 493 Independent Study in Archaeology (1) Research in areas ofarchaeology ontopics notsufficiently coveredinexisting courses. Subjectandcreditearnedmustbeapprovedbythesupervisingfaculty memberanddepartmentchair.Mayberepeatedforamaximumofsix hours of credit. Prerequisites: Junior standing; consent of instructor.

## Art (ART)

Art courses are taught by the faculty of the Department of Art.
ART 102 Art in Elementary Schools (3) Examination of the perceptual, creative, andaestheticgrowthanddevelopmentofchildren throughartexperiences.Somebasicstudioinstruction withartappreciation and historical overview. Lab fee. Spring.
ART 105 Introduction to the Visual Arts (3) Lecture. Studies architecture, painting, andsculpturewithemphasisonsocialandaesthetic considerations. Fall, spring.
ART 200 Introduction to Studio Art (3) An introduction to the studio disciplines for non-art majors. Instruction of the art elements as
used in such areas as drawing, painting, printmaking, and sculpture. Lab fee. Fall, spring.
ART 201 Introduction to Art Therapy (3) Introduces students to the fundamentals of art therapy including theory, methods of practice, andtechniquesthroughlecture,experience,and casestudy presentations. No prior artexperience required. Prerequisites:Sophomore status; recommended courses PSYC 121, 226. Fall.
ART 210 Design (3) Introductory studio course emphasizes basic principles of design, composition, and color theory. Six hours studio. Fall.
ART 213 Computer Graphics (3) An introduction to the basic uses of theMacintoshcomputerasusedinthevisualarts.Emphasizesexperimentationwithvarioussoftwarepackagesandthedevelopmentofthe interchangeableandflexiblemovesfromhands-onskillstoelectronic means. Fall, spring.
ART 214 Basic Photography (3) Introduction to basic camera usage and traditional darkroom techniques. Access to a 35 mm print film camera is required. Six hours studio. Lab fee.
ART 220 Drawing (3) Introduces and explores various drawing media with emphasis on perception and drawing techniques. Six hours studio. Fall.

ART 221 Drawing (3) Explores a variety of media and techniques withemphasisgiventocompositionandcreativeexpression.Sixhours studio. Spring.
ART 301 Creative Development and Art Therapy (3) Introduces the fundamentalsofcreativedevelopmentandarttherapyincludingtheory,methodsofpractice,andtechniquesthroughlecture,experience, and case studies. No prior art experience required. Prerequisites: Sophomore status; recommended courses PSYC 121, 226. Spring
ART 314 Creative Photography (3) Emphasizes creative and innovative uses of photography with instruction in camera and darkroom procedures. Prerequisite: ART 214 or permission of instructor. Six hours studio. Lab fee.

ART 315 Typography (3) A fundamental study of the history of type, its creative use and function as a communicative tool. Explores basic principles of good layout design. Six hours studio. Macintosh lab. Prerequisites: ART 210, 213; or permission of instructor.
ART 316 Publication Design (3) A study of layout design, the creative arrangement of type and visuals on a page. Using appropriate layoutsoftware,studentscreatelayoutdesignsforvariouspublications (magazines,newspapers, brochures, books).Filepreparationforprint is covered. Six hours studio. Macintosh lab. Prerequisites: ART 213, 315; or permission of the instructor.
ART 322 Digital Photography (3) Introduction to digital photographymethodsandcreativemanipulationonthecomputer, as analternative to traditional techniques. Familiarity with Photoshophelpful. Macintosh lab. Prerequisite: ART 213 or permission of instructor. Repeatable. Lab fee.
ART 325 Life Drawing (2) Drawing from the model as a means of understanding form, shape, and line. Four hours studio. Repeatable. Lab fee. Spring
ART 330 Printmaking (3) Emphasizes basic printmaking methods to the development of ideas and aesthetic considerations of materials and techniques employed in printmaking. Six hours studio. Repeatable. Lab fee. Fall.
ART 340 Painting (3) Emphasizes basic painting techniques with investigation of different advanced media. Six hours studio. Repeatable. Fall, spring.
ART 345 Watercolor (3) Covers basic, creative, and technical problems in watercolor painting. May be applied toward the painting
major in the studio BFA and BS degrees. Six hours studio. Repeatable. Fall
ART 350 Metalwork/Jewelry (3) Studies basic forming methods: fabricating, casting, forging, and raising with investigation of different materials and techniques employed in metalwork and jewelry. Six hours studio. Repeatable. Lab fee. Spring

ART 360 Ceramics (3) Offers basic methods of hand building and wheel throwing and the use of glazes and kiln firing procedures with investigation of materials and techniques employed in ceramics. Six hours studio. Repeatable. Lab fee. Fall, spring.
ART 370 Sculpture (3) Introduces concepts, materials, and tools of sculpture.Creativeexpressionaswellasexplorationintoidea,form, and material relationships.Sixhoursstudio. Repeatable.Labfee.Fall,spring.

ART 401 Art and Culture (3) Senior seminar devoted to special topics concerning historical traditions in the visual arts, current art issues, and professional development. Prerequisite: Senior status. Spring
ART 405 Art Therapy Seminar (2) In-depth investigation of the fundamentals of creative developmentandart therapy,focusing on assessment, research, application, andexploration ofthedynamicsof thegroup process.Lecture, experientiallearning, and casestudypresentations included. No priorartexperience required. Prerequisites: ART 201, 301; PSYC 121, 226.

ART 410 Portfolio Preparation (3) Study of current trends in graphic designfieldsandpossible careerpaths. Preparation of a professional graphicdesignportfoliothatdemonstratesthestudent'sproficiencies and strengths. Includes résumé preparation, personal logo, and self promotional projects. Six hours studio. Repeatable. Macintosh lab. Prerequisites: ART 213, 315, 316; or permission of instructor.
ART 417 Advanced Imaging and Illustration (3) Study of painting, drawing, and photo manipulation software as well as of traditional media to produce illustrations for various uses. Also explores the creative processandideageneration.Sixhoursstudio.Macintoshlab. Prerequisite: ART 213, 315, 316; or permission of instructor.

ART 490 Practicum in Art (1-3) A practical experience in a supervised university setting that specializes in the field of art or design. Precedes internship and prepares students to perform for employers outside the university community. Prerequisite: sophomore standing; permission of sponsoring faculty member. Repeatable up to 12 hours.
ART 492 Topical Workshops (1-3) Special topics in art not included in the regular course offerings. Based on lecture or lecture/studio. Repeatable.
ART 493 Independent Study in Art (1-3) Research in an area of visual arts that pertains to individual interests. May not be substituted for regular course offerings. Subject and credit earned must be approved by the instructor. May be repeated for a maximum of six hours of credit. Prerequisites: Sophomore level; permission of instructor; approval of department chair.

ART 495 Internship in Art (3) An apprenticeship or internship program designed to meet the educational needs of students' professional goals. Visual communication design majors may qualify for internships with professional agencies, BFA studio majors with professionally qualified artists or institutions, and BS in art and associatedstudiesmajorswithinstitutions relatedtotheircareerinterests. A maximum of 12 credit hours may be earned in Art 495 toward thedegree.Prerequisites:Juniorstanding;permission ofsponsoring faculty member.

ART 497 Methods of Teaching Art in Senior High/Junior High/ Middle School and Elementary Schools (3) This course explores
the creative and mental growth of elementary, middle school, and secondary school students participating in classes for the visual arts. In addition, development of an area-specific portfolio is required. This class is for art education majors only.

## Art History (ARTH)

Art History courses are taught by the faculty of the Department of Archaeology and Art History.

ARTH 208 Survey of Art I (3) A survey of architecture, sculpture, and painting from prehistory through the late Gothic period, including non-Western civilizations of India, Southeast Asia, and China. Fall.

ARTH 209 Survey of Art II (3) A survey of architecture, sculpture, and painting of Western and non-Western regions from the Renaissance to the present, including the Muslim world and Japan. Spring.

ARTH 384 Renaissance Art (3) Architecture, sculpture, and painting in Italy, France, Germany, and the Netherlands ca. 1300-1600. Prerequisite: ARTH 208 or 209 or permission of the instructor.
ARTH 385 Baroque Art (3) Architecture, sculpture, and painting in southern Europe, Belgium, England, Germany, and the Netherlands ca. 1600-1750. Prerequisite: ARTH 208 or 209 or permission of the instructor.

ARTH 386 Eighteenth and Nineteenth Century Art (3) Study of the major movements of the 18th and 19th centuries, including Neoclassicism, Romanticism, Realism, Impressionism, and Postimpressionism to 1900. Prerequisite: ARTH 208 or 209 or permission of the instructor.

ARTH 389 Twentieth Century Art (3) Western painting and sculpture from 1900 to the present. Prerequisite: ARTH 208 or 209 or permission of instructor.
ARTH 391 Topics in Asian Art (3) Thematic introduction to the visual arts of China and Japan, with emphasis on Chinese art from the Han period through the 20th century. Prerequisite: ARTH 208 or 209 or permission of instructor.

ARTH 492 Topical Seminars in Art History (3) Special topics in art history not included in regular course offerings. Consists of lectures and discussion with an emphasis on research. May be repeated for a maximum of nine credit hours. Prerequisite: ARTH 208 or 209 or permission of instructor.

ARTH 493 Independent Study in Art History (1-3) Research in areas of art history on topics not covered in existing courses. Subject and credit earned must be approved by the supervising faculty member and department chair. May be repeated for a maximum of six credit hours. Prerequisites: Junior standing; permission of instructor.

ARTH 495 Internship in Art History (3) Internships designed to meettheeducationalneeds ofstudents'professionalgoalsarerecommended for art history majors and may be arranged with a professional individual or institution.A maximum of 12 credithoursearned in ArtHistory 495 may counttowardthedegree.Prerequisites:Junior standing;permission offacultyadvisor,faculty/museumliaison, and department chair.
ARTH H378 British Romantic Art (3) A study of British art from 1790 to 1850, including academic traditions, landscape painting, genre painting, and the pre-Raphaelites. Taught at Harlaxton College. Prerequisite: ARTH 208 or 209 or permission of instructor.
ARTH H379 Art and Architecture in Victorian Britain (3) A study of art and architecture produced in Britain during the reign of Victoria, including revival and industrial architecture, the arts and crafts
movement, and the "New Sculpture." Taught at Harlaxton College. Prerequisite: ARTH 208 or 209 or permission of instructor.
ARTH H383 Medieval Art (3) Architecture, sculpture and painting from early Christianity through Gothic in the Byzantine Empire and Western Europe. Taught at Harlaxton College. Prerequisite: ARTH 208 or 209 or permission of instructor.

ARTH H387 English Art and Architecture From the Late Roman Period to 1533 (3) A study of British art from the late Roman occupation. Migration art, manuscript painting, and domestic and ecclesiastical architecture through the reigns of Henry VII and early Henry VIII. Taught at Harlaxton College. Prerequisite: ARTH 208 or 209 or permission of instructor.
ARTH H388 English Art and Architecture 1500-1850 (3) Survey of the visual arts in England from Elizabethan times to the mid19th century. This is a period when the English became a consumer culture. In addition to such artists as Holbein, Van Dyck, Reynolds, Constable, and Turner, the patrons, promoters,collectors, andtravelers will be considered. Prerequisites: ARTH 208, 209; or permission of instructor.

## Astronomy (ASTR)

Astronomy courses are taught by the faculty of the Department of Physics.

ASTR 101 Descriptive Astronomy (3) Studies the solar system, stellar structure and evolution, galaxies and cosmology, emphasizing the historicaldevelopmentandobservationalbasisforourunderstanding of the universe. Lecture.
ASTR 102 Lab for Introduction to Astronomy (1) Optional laboratory course to accompany ASTR 101. Students will use Koch Immersive Theater at the Evansville Museum and classroom and outdoor settings to explore topics related to astronomy, including celestial mechanics, planetary phenomena such as cratering, and optics. Corequisite: ASTR 101. Two hours in class, one outside class required each week.
ASTR 320 Astrophysics (3) A detailed study of the physical processes thatdriveavarietyofastrophysical phenomena.Topicsincluderadiation productionandinteractionwith matter,accreditingsystems,and observational techniques from radioto gamma-rays.Specific applicationsmayinclude(dependingonstudentinterest)stellarstructure andevolution, compactobjects,galacticcompositionanddynamics, and the origin and structure of the universe. Lecture. Prerequisites: MATH 323; PHYS 213. Recommended: ASTR 101. Same as PHYS 320.

ASTR 422 Cosmology (2) Explores the history and evolution of the universewithanemphasisontheoretical models that maybetested bymodernexperimentalandobservationaltechniques.Topicsinclude the Big Bang, cosmicmicrowave background radiation, darkenergy, darkmatter,origins ofstructureintheuniverse, generalrelativity,and specifictopics ofinteresttoresearchers inthefield.Lecture.Prerequisite: PHYS 305. Recommended: ASTR 101, 320. Same as PHYS 422.

## Athletic Training (AT)

Athletic Training courses are taught by the faculty of the School of Public Health.
AT 180 Introduction to Athletic Training (3) Introduces the field of athletictrainingandthecareand prevention ofathleticinjuries.Topics include, but are not limited to, the organization, administration, education, and counseling techniques used in caring for athletes, as well as the foundation of injury prevention, assessment, treatment, and rehabilitation.

AT 281 Athletic Injury Prevention and Wellness Promotion (3) This course is designed as a follow up to the introduction to the field of athletic training (AT 180). Topics include, but are not limited to the foundation ofinjurypreventionthroughtapingandbracing, physical base line assessment of and the proper procedures to provideemergency care to an injured patient. Prerequisite: AT 180. Spring.
AT 282 Basic Skills in Athletic Training (3) Addresses various topics thatdevelopthestudent'scompetenceasanathletictrainer.Emphasis placed on skills such as construction and application of protective devices,tapingandbandagingtechniques,on-fieldassessmenttechniques, andemergencycare.DesignedtosatisfyCAATEcompetences relatedtotheabove-mentionedcontentareasandintendedforathletic training majors. Prerequisite: AT 180. Corequisite: AT 282L.
AT 287 Therapeutic Modalities in Athletic Training (3) Lecture/lab courseaddressesthe principles,indications, contraindications, physiological effects, safety precautions, and application of therapeutic modalitiesforthetreatmentofathleticinjuries.Informationincludes knowledgeoftheinflammatoryresponsetoinjuryandillnessandthe effectivenessoftherapeutic modalitiestoassistthebody inthehealing process. Designed to satisfy CAATE competences related to the use of modalities andintended primarily for athletictraining majors. Corequisite: AT 287L.
AT 291 Clinical Education in Athletic Training (2) One of a series of sixclinicaleducationcoursesdesignedto provideproficiencyinstruction and clinical experience inthe field of athletic training. Emphasis placedonclinicalanatomyandgoniometry.Contentincludes palpation of various bony landmarks and soft tissue structures as well as goniometricskilldevelopment.Clinicalapplicationandunderstanding emphasized. Field experience rotations assigned per the clinical instruction plan. Class meets formally approximately one hour per week outside of the clinical setting.
AT 292 Clinical Education in Athletic Training II (2) One of a seriesofsixclinicaleducationcoursesdesignedto provideproficiency instruction and clinical experience in the field of athletic training. Emphasisgiventoclinicalapplication oftherapeuticmodalities. Field experience includes sport team rotations with an emphasis in the application of modalities. Student works toward completion of the proficiency check-off sheet. Class meets formally at least one hour perweekoutsideoftheclinicalsettingtoensureadequateprogressis beingmadetowardcompletion oftherespectiveclinical proficiencies.

AT 350 Administration of Athletic Training (3) Familiarizes students with the administration and management responsibilities of athletic training. Topics of study include management of athletic training facilities, personnel, students, facility design, purchasing of supplies and equipment, and budgeting. Designed to satisfy CAATE competences related to health care administration and intended for athletic training majors. Prerequisite: AT 388.
AT 385 Athletic Injury Prevention and Wellness Promotion II (3) This course is designed as a follow up to the introduction to the field of athletic training (AT 180) and to Athletic Injury Prevention and Wellness Promotion I (AT 281). Topics include, but are not limited to the foundation of injury prevention, treatment and rehabilitation of the injured athlete. A general beginning to the process of how an athletic injury evaluation will lead to treatment and rehabilitation of that injury. Prerequisites: AT 180 and AT 281 or permission from program director.
AT 388 Evaluation of the Lower Body (3) Addresses the theory, techniques,andlaboratoryexperiences relativetotheassessmentand evaluation ofathleticinjurieswithemphasisonthelowerbody.Other topics related to assessment are covered including common illness recognition. Content areas include knowledge and skills for clinical
evaluation to determine the proper injury or illness treatment and referral when appropriate.Designed to satisfy CAATE competences related to evaluation and illness of the lower body and intended for athletic training majors. Prerequisite: AT 282.
AT 389 Evaluation of the Upper Body (3) Addresses the theory, tech-niquesandlaboratoryexperiencesrelativetotheassessmentandevaluation of athletic injuries with emphasis placed on the upper body. Other topics related to assessment are covered including common illness recognition. Content areas include knowledge and skills for clinicalevaluationtodeterminetheproperinjuryorillnesstreatment and referral when appropriate. Designed to satisfy CAATE competencesrelatedtoevaluationandillnessoftheupperbodyandintended for athletic training majors. Prerequisite: AT 388.
AT 390 Rehabilitation of Athletic Injuries (3) Lecture/lab course provides the student knowledge related toallaspects of the rehabilitation of athletes.Emphasis placed on development ofatheoretical model to assess and fully rehabilitate an athlete following an injury, surgery or related illness. Lab time develops the skills required to implementarehabilitation programintheclinical setting.Designed to satisfy CAATE competences related to rehabilitation and exercise and intended for athletic training majors. Prerequisite: AT 389.
AT 391 Clinical Education in Athletic Training III (2) One of a seriesofsixclinicaleducationcoursesdesignedtoprovideproficiency instruction and clinical experience in the field of athletic training. Emphasis on basic taping and bandaging techniques, emergency procedures, and field assessment. Field experience includes local highschoolfootballcoverageandotherfieldexperienceasassigned. Studentworkstowardcompletionoftheproficiencycheck-offsheet. Classmeetsformallyatdiscretion oftheinstructoroutsideoftheclinical setting to ensure adequate progress is being made toward completion of the respective clinical proficiencies. Prerequisite: AT 292.
AT 392 Clinical Education in Athletic Training IV (2) One of a series of six clinical education courses designed to provide clinical experience in the field of athletic training. Emphasis given to evaluation of athletic injuries and illness. Field experience spent with a college trainer working primarily in a traditional college athletic training room setting. Student works toward completion of the proficiency check-off sheet. Class meets formally at discretion of the instructor outside of the clinical setting to ensure adequate progress is being madetowardcompletion oftherespectiveclinical proficiencies.Prerequisite: AT 391.
AT 451 Psychological Interventions in Athletic Health Care (3) This course will provide an overview of the rapidly developing field of sport psychology. A wide range of topics in sport and exercise psychology will be reviewed, including anxiety and performance, overtraining and burnout, psychometric characteristics of sport participants, and other psychological factors that may affect sport performance and injury. Although the major interest of American sport psychology involves applications intended to enhance athletic performance, this course will also cover topics of exercise and mental health as well. This course is designed to satisfy related CAATE competencies and is intended for Pro-fessional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 475 Advanced Nutritional Issues in Athletic Training (3) This course addresses a variety of nutritional and well-being topics in order to develop the students competence as an athletic trainer. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as 3+2 student.

AT 480 Graduate Clinical Education I (1) This course is one of a series of five clinical education courses in the Graduate Professional Athletic Training Program designed to provide proficiency instruction and clinical experience in the field of Athletic Training. The emphases in this course are clinical anatomy, goniometry, patient assessment, and modalities. This includes palpation of various bony landmarks and soft tissue structures; goniometric skill development; various taping techniques; clinical assessment skills such as blood pressure, pulse rate, and documenting relevant medical history; taping, bracing, wrapping, padding, and strapping; and modality usage. Clinical application and understanding are emphasized. The field experience rotations will be assigned per the clinical instruction plan. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 481 Graduate Clinical Education II (2) This course is one of a series of five clinical education courses designed to provide proficiency instruction and clinical experience in the field of Athletic Training. The emphasis in this course is basic taping and bandaging techniques,emergency procedures and on field assessment. The field experience portion will include UE athletic team coverage, local college or high school football coverage, and other experience as assigned. This class will meet formally at the discretion of the instructor outside of the clinical setting to ensure adequate progress is being made toward completion of the respective clinical proficiencies. Total clinical hours will be a result of clinical rotations among the various clinical sites. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 482 Graduate Clinical Education III (3) This course is one of a series of five graduate clinical education courses designed to provide clinical experience in the field of Athletic Training. Each course has a specific area of emphasis to ensure a diverse experience and provide an opportunity to become proficient in required skills within Athletic Training. The emphasis in this course is the evaluation of athletic injuries and illness. Clinical time will be spent with an athletic trainer working in various athletic training facilities. The athletic training student will work toward completion of the proficiency check-off sheet. This class will meet formally at the discretion of the instructor outside of the clinical setting to ensure adequate progress is being made by the student toward completion of the respective clinical proficiencies. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 483 Evidence-Based Inquiry (3) Theory and practice of evi-dence-based sports medicine for both clinical and research environments, with emphasis on understanding the results of health care interventions and practices for patients and research subjects. This course will introduce the student to clinical epidemiology and the evaluation of the efficacy of prevention, diagnostic, and treatment strategies for acute and chronic conditions. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as 3+2 student.
AT 484 Foundational Skills in Athletic Training (3) This course addresses a variety of topics in order to develop the students competence as an athletic trainer. Emphasis is placed upon skills such as construction and application of protective devices, taping and bandaging techniques, on-field assessment techniques, and emergency care. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Ath-
letic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 485 Advanced Athletic Injury Rehabilitation (3) Lecture/lab course provides the student knowledge related to all aspects of the rehabilitation of athletes. Emphasis placed on development of a theoretical model to assess and fully rehabilitate an athlete following an injury, surgery or related illness. Lab time develops the skills required to implement a rehabilitation program in the clinical setting. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.

AT 486 Applied Human Anatomy Lab (2) This course is designed for graduate students who need to study human anatomy in a more detailed format. Emphasis is placed on the gross anatomy of the human skeleton, muscular, nervous, and circulatory systems using previously dissected cadavers. Students will explore, in greater detail, specific areas related to orthopaedic clinical evaluation (ankle, knee, hip, wrist, elbow, shoulder). Additionally, students will be expected to complete a teaching component based on instructor assignment of a body area. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 487 Advanced Therapeutic Modalities (3) This course addresses the principles, indications, contra-indications, physiological effects, safety procedures and application of therapeutic modalities for the treatment of athletic injuries. This course is designed to satisfy related CAATE competencies and is intended for Pro-fessional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 488 Evaluation of the Lower Extremity (3) This course addresses the principles, techniques, and theories behind athletic injuries and their assessment from the waist down. The student will be able to assess an injury and determine which special tests to use to conclude about what has occurred to the athlete and what needs to be done in a timely manner. Also, a thorough knowledge of bony landmarks, dermatomes, and myotomes will aid the athletic training student in injury assessment. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.
AT 489 Evaluation of the Upper Extremity (3) This course addresses the principles, techniques, and theories behind athletic injuries and their assessment from the head to waist. The student will be able to assess an injury and determine which special tests to use in order to come to a conclusion about what has occurred to the athlete. Also, a thorough knowledge of bony landmarks, dermatomes, and myotomes which will aid the student in injury assessment. This course is designed to satisfy related CAATE competencies and is intended for Professional-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as 3+2 student.
AT 490 Pharmacology and Medical Conditions (3) Offers insight on current trends in pharmacology use in an athletic training environment. Also offers current evaluation of general medical conditions, treatment, and a referral base for conditions found in athletics.
AT 491 Clinical Education in Athletic Training V (2) One of a series of six clinical education courses designed to provide clinical experienceinthefield ofathletictraining.Emphasis giventorehabilitation.

Field experience assigned per the clinical instruction plan and may include time in a physical therapy outpatient setting. Student works toward completion of the proficiency check-off sheet. Class meets formally at discretion of the instructor outside of the clinical setting toensureadequateprogressisbeingmadetowardcompletion ofthe respective clinical proficiencies. A case study approach is utilized to emphasize integration of previously learned skills intothe complete care of the athlete. Prerequisite: AT 392.
AT 492 Clinical Education in Athletic Training VI (2) One of a series of six clinical education courses designed to provide clinical experience in the field of athletic training. Emphasis placed on pharmacology, nutritional aspects, psychosocial intervention, and referral. Emphasis also placed on preparation for the BOC exam. Class meets formally at discretion of the instructor outside of the clinical setting to ensure adequate progress is being made toward completion of the respective clinical proficiencies. Field experience assignment made per the clinical instruction plan. Prerequisite: AT 491.
AT 496 General Medical \& Pharmacology in Athletic Health Care (3) Offers insight on current trends in pharmacology use in an athletic training environment. Also offers current evaluation of general medical conditions, treatment, and a referral base for conditions found in athletics. This course is designed to satisfy related CAATE competencies and is intended for Profession-al-Level Masters Athletic Training Students. Prerequisite: Enrollment in MSAT program as $3+2$ student.

## Biology (BIOL)

BiologycoursesaretaughtbythefacultyoftheDepartmentofBiology.
BIOL 100 Fundamentals of Biology (4) Course for non-science majors that explores fundamental concepts of biology and relates them to social issues. Three hours lecture, two hours lab. Credit not applicable for biology majors or minors. Fall, spring, summer.
BIOL 107 General Biology (4) Course for health science majors that introduces basic principles of cell biology, metabolism, genetics, molecular biology, and evolution. Three hours lecture, two hours lab. Fall. Spring.
BIOL 110 Clinical Microbiology (3) Introduces microorganisms and includesisolation, pathogenicity,serology,identification,ecology, and thesignificanceofmicroorganismstohumans.Twohourslecture,two hours lab. Credit not applicable for professional biology majors. Fall.
BIOL 112 Human Anatomy and Physiology I (4) Introduces basic anatomyandphysiologyusingasystemsapproach.Emphasizescells, tissues, musculoskeletal system, and nervous system. Three hours lecture, two hours lab. Credit not applicable for biology majors or minors. Same as EXSS 112. Fall.
BIOL 113 Human Anatomy and Physiology II (4) Continues the study of topics covered in Biology 112 and includes the endocrine, cardiovascular, immune, respiratory, urinary, and digestivesystems. Threehours lecture, two hours lab. Credit not applicableforbiology majors or minors. Prerequisite: Biology 112 with a grade of C- or better or permission of the instructor. Same as EXSS 113. Spring.
BIOL 118 Modern Biology: Environmental Perspectives (3) Gives biology majors foundational knowledge and skills for subsequent coursesinthemajor.Seminarstylecourseintroducesenvironmental topicsbyexploringecological, societal,andethicalissuessurrounding therelationship ofhumanstotheirenvironment.Prerequisite:Freshmenadmissiontothebiologyorenvironmentalsciencesprogramsor permission of the chair of the Department of Biology. Spring.
BIOL 119 Introductory Biology: Molecular Perspectives (4) Course
designedforstudentsmajoringinappliedbiology, professionalbiology, biochemistry, neuroscience and clinicallab science. Introduces basicprinciplesofbiochemistry,molecularbiologyand genetics,and theirrelevancetomodernsociety.Fourhoursintegratedlectureand lab.
BIOL 120 Introductory Biology: Organismal Diversity (4) Provides an introduction to the major groups of living organisms, with an emphasis on their structure, function, and evolutionary relationships. Four hours of integrated lecture and lab. Fall, Spring

BIOL 199 Special Topics in Biology (1-4) Lectures, discussions, or special laboratory topics not covered in regular course offerings. Provides greater depth to topics of special interest or explores rapidly changing areas in biology. May be repeated. Prerequisites announced when specific topics scheduled.

BIOL 201 Human Genetics and Society (3) Discusses human genetics and its relation to social issues. Credit not applicable for biology majors or minors.
BIOL 214 Field Zoology (3) Emphasizes the identification, structure, functions, ecology, and behavior of animals. Regional field study involved. Summer.
BIOL 215 Field Botany (3) A study of mosses, ferns, conifers, and flowering plants, including identification, morphology, and ecology. Field study involved. May be taken twice for credit if the field sites are different. Summer.
BIOL 220 Biological Perspectives on Sex and Gender (3) Through readings and class discussions, this course will examine our understanding of sex determination, reproduction, and the evolution of sex and gender in animals, including humans. We will explore the complexity of gender diversity among animals and the roles of genetics, development, anatomy, and physiology in defining sex, gender, and fertility. Subject matter will cover sex assigned at birth and gender identity, including intersex and transgender. We will also critically evaluate misconceptions regarding the use of biology in sociopolitical discussions of sex and gender identity. Prerequisite: Gender and Women's Studies 101, Biology 119, Biology 120, or Biology 107, or permission from instructor.
BIOL 225 Horticulture (3) A study of the growth, development, and technology involved in the production, maintenance, use, and marketing of horticultural plants and products. Two hours lecture, two hours lab. Spring, alternate years.
BIOL 255 Phage Genomics (3) Designed to provide students with an authentic experience in scientific research. In this course, students will annotate the genome of a novel bacteriophage from the environment. Students will also learn about the use of bacteriophages in research, industry, and medicine. Class meets for three hours combined lecture and lab each week. Prerequisite: Biology 119 or permission of instructor. Spring.
BIOL 299 Special Topics in Biology (1-4) Lectures, discussions, or special laboratory topics not covered in regular course offerings. Provides greater depth to topics of special interest or explores rapidly changing areas in biology. May be repeated. Prerequisites announced when specific topics scheduled.
BIOL 305 Microbial Ecology (3) Concerned with the wide range of microorganisms that exist and their roles in the environment. Concentrates on the following areas:(1) microbial environments; (2) detection ofmicrobial activity; (3)impact of microbialactivity on the environmentintermsofnutrientcyclingandpollutantfate;(4)detectionandcontrolofpathogensintheenvironment;(5)bioremediation (includes riskassessmentand environmental biotechnology). Three hours lecture,field studies at sites that utilize microbes (e.g.,sewage
treatment plants,fermentorfacilities). Prerequisite:A 100-level biology course with a grade of C - or better or permission of instructor. Spring, alternate years.
BIOL 310 History of Life (3) A study of major events in the history of life from the origin of life some four billion years ago to the extinction and speciation episodes that have resulted in the variety of organisms that occupy the planet in more recent geologic time. Prerequisite: A 100-level biology course with a grade of C- or better or permission of instructor. Spring, alternate years.
BIOL 315 Ethnobotany (3) Examines the intimate connection between plants and human society. It is integrative in thatitincludes informationfrombotany, chemistry, archaeology, anthropologyand history.Topics covered willincludeagriculture, geneticallymodified crops, medicinal plants, plant secondary compounds and psychoactive plants. The goal of the course is to provide students with a betterunderstanding oftheimportanceofplantsand plantproducts to human civilization. Students will gain experience in reading and summarizing scientific articles and books.
BIOL 320 Evolution and Ecology (4) Introduces principles and concepts of evolution and ecology, with emphasis on the intricate andintrinsicrelationshipbetweenthesedisciplines.Examinesmechanisms of evolutionary change and interactions of organisms, populations, and communities of organisms within their environment. Addresses how these interactions occur, what effects they have on the functioning ofnatural communities, and how they influence the evolutionofpopulationsandspecies. Threehourslecture,threehours lab. Prerequisites: BIOL 118 with a grade of C- or better. Fall.
BIOL322Biological Physics (3)Introduces biophysicalmethodsfrom aphysics perspectiveanddiscussestheapplicationofthesemethods toward research questions in biology. Topics include biomolecular structures, structure determination and simulation, and molecular motors. Three hours lecture. Prerequisite: MATH 221; PHYS 121 or 210. Same as PHYS 322.

BIOL 323 Tropical Ecology of Costa Rica (3) Provides a detailed understanding of the natural history and ecology of Costa Rica, including the identifiable features of many plants and animals of Costa Rica. Designed primarily for biology and environmental studies majors, the course develops writing and presentation skills, whilealsoframingstudentlearninginanecologicalandconservation context. The course culminates in a trip to Costa Rica ( $\sim 2$ weeks); the trip component of the course helps to solidify student learning through experiential learning. Two hours lecture, field trip to Costa Rica. Prerequisite: BIOL 118 with a grade of C - or better or permission of instructor. Spring.
BIOL 330 Mycology (4) Introduces fungi with emphasis on ecology, morphologyandtaxonomy ofrepresentativegroups. Twohourslecture, four hours lab. Prerequisites: BIOL 119 and 120 with a grade of C - or better or permission of instructor.
BIOL 331 Genetics (4) Fundamental principles of inheritance in animals, plants, and microorganisms with emphasis on molecular genetics. Three hours lecture, three hours lab. Prerequisite: Biology 119 with a grade of C - or better or permission of instructor. Recommended: BIOL 120 with a grade of C- or better. Fall, spring.
BIOL 333 Animal Behavior (3) Provides students with an understanding of the four major questions in animal behavior as originally outlined by Tinbergen. We will explore aspects of physiology, development, genetics, ecology and evolution that help us understand behavior and frame these questions in a modern context. Three hours lecture, field studies. Prerequisite: BIOL 120 with a grade of C - or better or permission of instructor. Spring.
BIOL 340 Cellular and Molecular Biology (4) Covers the princi-
ples of eukaryotic cell structure and function and the molecular bases of cellular processes. Topics will include: macromolecules; energetics; membranes; cellular organelles; gene expression; signaling; cell division; DNA replication; RNA and protein synthesis and processing; and molecular aspects of immunology, cancer and recombinant DNA technology. The course will build on the survey knowledge from the required prerequisite courses. Three hours lecture, four hours lab Prerequisite: BIOL 331 or permission of instructor. Spring.
BIOL 350 Vertebrate Zoology (4) Emphasizes the taxonomy, comparativemorphology,behavior,andlifehistory ofvertebrates. Three hours lecture, three hours lab, field studies. Prerequisite: BIOL 120 with a grade of C - or better or permission of instructor. Spring.
BIOL 360 Summer Field Station Study (1) Biology studies conducted at a marine, freshwater,mountain, or desert field station. Summer.
BIOL 399 Special Topics in Biology (1-4) Lectures, discussions, or special laboratory topics not covered in regular course offerings. Provides greater depth to topics of special interest or explores rapidly changing areas in biology. May be repeated. Prerequisites announced when specific topics scheduled.
BIOL 414 Plant Diversity (4) Studies the identification and classification of local vascular plants. Herbarium collection required. Three hours lecture, four hours lab. Prerequisite: BIOL 120 with a grade of C- or better or permission of instructor. Spring, alternate years.
BIOL 415 Biostatistics (4) Explores biological systems using quantitative biological models. Application of statistical tools, numerical data sets, and computer-based techniques to test hypotheses, create predictive models, and interpret results and patterns. Three hours lecture, three hours lab. Prerequisite: BIOL 320 with a grade of C - or better or permission of instructor. Fall, alternate years.
BIOL 423 Ecology (4) Examines how organisms interact with each other and with their environment. Addresses the physical environmentandthewayphysiologicaladaptationsorganismshaveevolved toexploitit,populationdynamics,interactionsbetweenspeciespopulations,biogeography, andenvironmentalissues,especiallythosethat relatetotheimpactofhumansontheecology ofnatural populations ofplantsandanimals. Threehourslecture,threehourslab,fieldstudies. Prerequisite: BIOL 320 with a grade of C - or better or permission of instructor. Fall, alternate years.
BIOL 425 Developmental Biology (4) Studies the cellular, genetic, andmolecularinteractions ofanimal development. Threehourslecture, three hours lab. Prerequisite: BIOL 331 with a grade of C - or better or permission of instructor. Spring, alternate years.
BIOL 427 Animal Physiology (4) Studies the normal functions of animalorgansandsystems.Topicsincludemetabolism,transmission ofnerveimpulses,reproduction, andeffectsofhormones. Threehours lecture, two hours lab. Prerequisites: BIOL 119 or 120, and CHEM 240 with a grade of C - or better; or permission of instructor. Fall.
BIOL 428 Plant Physiology (4) Major biological activities of higher plants with emphasis on water relations, mineral nutrition, metabolism, growth, and development. Three hours lecture, two hours lab. Prerequisites: BIOL 120 and CHEM 118 with a grade of C - or better; or permission of instructor.
BIOL 430 Microbiology (4) Covers general principles of bacterial growth and activities. Three hours lecture, four hours lab. Prerequisite: BIOL 119 with a grade of C or better; or permission of instructor. Recommended: BIOL 120 with a grade of C - or better. Fall.
BIOL 434 Parasitology (4) Studies the nature of parasitism with respectto morphology, physiology, and host parasite relationships.

Three hourslecture, two hours lab. Prerequisites:BIOL 119 and 120 with a grade of C - or better; or permission of instructor. Fall, alternate years.
BIOL 436 Human Physiology (3) A detailed study of human function, beginning at a cellular level. Emphasis is placed on the neuromuscular, cardiovascular, pulmonary, renal, and endocrine systems. Theeffectsofexerciseand pathologyareintegratedintoeachsystem. Prerequisite: PT 431 or permission of the instructor. Fall.
BIOL 440 Cell Biology (4) Studies the basic principles and information that form the foundation of cell biology, provides exposure to some ofthe underlying questions of cell biology, and improves skills inanalyzingandcommunicatingscientificinformation. Threehours lecture, two hours lab. Prerequisites: BIOL 340 and CHEM 240 with a grade of C- or better; or permission of instructor. Spring.
BIOL 442 Immunology (4) Studies cellular and molecular aspects of theimmuneresponse.Twohourslecture,twohourslab.Prerequisites: BIOL 119, 120, 340 and CHEM 240 with a grade of C or better; or permission of instructor. Spring, alternate years.
BIOL 445 Molecular Biology (4) Considers the molecular aspects of biology at the cellular and subcellular levels. Emphasis on the genetic material and intercellular processes and laboratory procedures for studying biology at the molecular level. Three hours lecture; three hours lab. Prerequisites: Biology 331 and Chemistry 240, 341 with a grade of C- or better; or permission of instructor.
BIOL 450 Evolution (3) Addresses a variety of topics related to evolutionary biology, includingthehistory ofevolutionarythought, evolutionofsex,groupselection,speciation,phylogeneticsystematics, coevolution, andmolecularevolution. Threehourslecture. Prerequisite: BIOL 320 with a grade of C - or better or permission of instructor. Recommended: BIOL 119. Spring, alternate years.
BIOL 455 Genomics in Research \& Medicine (4) Examines current toolsandtechniquesingenomicsresearchanddiscussesapplications of genomics, especially in healthcare and medicine. Topics include the use of home genomics kits to infer ancestry and predict health outcomes;genomicsandpersonalizedmedicine;genomicsinspecies conservation and evolution, etc. Students will also use a variety of genomics tools to investigate a novel genomics research problem.
BIOL 460 Special Problems (1) Independent research of a biological problem under the guidance of a faculty member. Prerequisite: permission of instructor. Fall, spring.
BIOL 478 CLS Clinical (0) BIOL 478: Clinical Laboratory Science Clinical (0) Credit granted upon successful completion of two semesters of clinical experience and a summer clinical. Prerequisite: Successful admission into clinical laboratory program.
BIOL 480 Senior Seminar I (2) Focuses on the interdisciplinary nature of biology and how life sciences relate to contemporary problemsandcircumstances.Involvesinvestigative projects, written reports, and presentation of reviews. Prerequisites:Atleastone400level biology course; senior standing. Fall.
BIOL 481 Senior Seminar II (2) Focuses on interdisciplinary nature ofbiologyandhowlifesciences relatetocontemporaryproblemsand circumstances. Involves written and oral analysis of class material. Prerequisites:Atleastone400-levelbiologycourse;seniorstanding. Spring.
BIOL 482 Biology Senior Seminar (3) Focuses on interdisciplinary natureofbiologyproblemsandcircumstances.Involves investigative projects, writtenreports, presentation ofreviews, andintegrativebook reviews primarily in seminar format. Prerequisites: at least one 400level biology class.
BIOL 498 Internship in Biology (1) Internships are designed to meet theeducationalneedsofstudents' professionalgoalsandto provide
practical experience in a position relating to a specific area of career interest. Developed by the student in conjunction with a faculty supervisor and site supervisor.
BIOL 499 Special Topics in Biology (1-4) Lectures, discussions, or special laboratory topics not covered in regular course offerings. Provides greater depth to topics of special interest or explores rapidly changing areas in biology. May be repeated. Prerequisites announced when specific topics scheduled.

## British Studies (BRIT)

British Studies courses are taught by the British faculty of Harlaxton College.
BRIT 201 The British Experience I (British Studies 1) (3) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present. Taught only at Harlaxton College.
BRIT 202 The British Experience II (British Studies 2) (3) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present. Taught only at Harlaxton College.
BRIT 220/BRIT 320 British Studies: Historical Perspectives (3) BRIT 220, 320 offers students an historical perspective on the emergence of modern Britain. The central theme of the course is the development of a sense of national identity within the British Isles and the problems associated with a British national identity. Students are encouraged to reflect on the issues and stereotypes that emerge out of competing national identities and contested borders in England, Scotland, Wales and, Ireland. Prerequisite for BRIT 320: Sophomore status or permission of instructor.
BRIT 230/ BRIT 330 British Studies: Literary Perspectives (3) This course introduces students to a range of literary perspectives in relation to the development of modern Britain. The central theme of the course is the development of a sense of national identity within the British Isles and the ways in which literature has both shaped and questioned British identity. We will consider how national identity intersects with other key themes including gender, race, class and belonging. Includes field trips to locations of literary interest and experiential learning opportunities such as visits to Shakespeares Globe Theatre in London, Romantic poet John Clares cottage and garden, and a walking tour of Bloomsbury. Moving broadly chronologically, the course will examine a variety of literary styles and genres (including plays, poetry, novels and slave narratives) to explore how different writers responded to a changing Britain and sense of what it means to be British. We will look at a selection of literary works including some classic British literature alongside texts and voices previously marginalised or left out of the canon. These include writers such as William Shakespeare, Aphra Behn, William Wordsworth, Dorothy Wordsworth, Mary Shelley, Virginia Woolf and Benjamin Zephaniah. How have these different writers articulated what it means to be British? How were these works shaped by, and how did they respond to, the changing historical, political and cultural contexts in which they were written? Prerequisite for BRIT 330: Sophomore status or permission of instructor.
BRIT 280 Cultural Capitals of Britain and Europe (3) British Studies Faculty travel between Britain and Europe has shaped and continues to shape Britain's national identity. ID 280 considers both historical and contemporary points of cross-cultural and political contact between Britain and Europe. The course is available for General Education credit and for Honors. ID 280 is a journey that runs in parallel with the Harlaxton summer travel program, giving
students the opportunity to visit the cultural capitals of Britain and Europe (London, Paris, Rome, Florence, Edinburgh, York, Lincoln, Cambridge) as an informed traveler. London and Lincoln are both required trips. The trips to the other cultural capitals are highly recommended. Students may have their own plans to visit different cultural capitals in Europe or the UK. Regardless of the destination, rather than simply being a tourist, you will become an observer and commentator able to produce an assessed e-portfolio of your travels and conclusions regarding Britain's relationship with Europe.
BRIT 282 The British Experience From the Celts to Present Day (6) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present.
BRIT 295 The Harlaxton Internship (0-6) Internships are supervised and structured assignments and field experiences that are carried out in a workplace or similar setting. They are designed to meet the educational needs of students professional goals and to provide practical experience in a position relating to a specific area of career interest. Students maintain a log of experiences and activities and complete academic projects related to their experience or research topic. The project will be developed by the student in conjunction with both a faculty and a site supervisor. Location-specific internships at Harlaxton will relate to living, working, and learning in the United Kingdom in a Grade 1 listed historic building set amidst 170 acres of farmland, woodland and gardens. Topics may include: National heritage, cultural identity, and the English country house; the environment, conservation, and the English countryside; the cultural significance of the English landscape and garden; the English country house and the countryside as a business; country house libraries, archives and building conservation; independent research or field experience in British Studies or related topics. Other internship opportunities may be available locally.
BRIT 301 The British Experience I (3) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present. Taught only at Harlaxton College.
BRIT 302 The British Experience II (British Studies 2) (3) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present. Taught only at Harlaxton College.
BRIT 382 The British Experience From the Celts to Present Day (6) Interdisciplinary introduction to the broad cultural and historical developments within British society from the earliest times to the present.
BRIT 395 The Harlaxton Internship (0-6) Internships are supervised and structured assignments and field experiences that are carried out in a workplace or similar setting. They are designed to meet the educational needs of students professional goals and to provide practical experience in a position relating to a specific area of career interest. Students maintain a log of experiences and activities and complete academic projects related to their experience or research topic. The project will be developed by the student in conjunction with both a faculty and a site supervisor. Location-specific internships at Harlaxton will relate to living, working, and learning in the United Kingdom in a Grade 1 listed historic building set amidst 170 acres of farmland, woodland and gardens. Topics may include: National heritage, cultural identity, and the English country house; the environment, conservation, and the English countryside; the cultural significance of the English landscape and garden; the English country house and the
countryside as a business; country house libraries, archives and building conservation; independent research or field experience in British Studies or related topics. Other internship opportunities may be available locally.
BRIT 495 The Harlaxton Internship (0-6) Internships are supervised and structured assignments and field experiences that are carried out in a workplace or similar setting. They are designed to meet the educational needs of students professional goals and to provide practical experience in a position relating to a specific area of career interest. Students maintain a log of experiences and activities and complete academic projects related to their experience or research topic. The project will be developed by the student in conjunction with both a faculty and a site supervisor. Location-specific internships at Harlaxton will relate to living, working, and learning in the United Kingdom in a Grade 1 listed historic building set amidst 170 acres of farmland, woodland and gardens. Topics may include: National heritage, cultural identity, and the English country house; the environment, conservation, and the English countryside; the cultural significance of the English landscape and garden; the English country house and the countryside as a business; country house libraries, archives and building conservation; independent research or field experience in British Studies or related topics. Other internship opportunities may be available locally.

## Business (BUS)

Business courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.
BUS 100 Introduction to Business (3) Introduces students to basic concepts related to the business environment, such as economic principles, stakeholder relationships, organizational structures, ethics, and corporate social responsibility. Includes a survey of the business functions in corporations, e.g., marketing, accounting and finance, production systems, and human resources. Students will research, write, and present a comprehensive corporate profile of a Fortune 500 company, with emphasis on learning the writing skills expected of business professionals.
BUS 200 Global Business Ethics (3) Students will develop an understanding of their own ethical perspective through the study of ethical frameworks, personal reflections on business cases and films, and peer discussion. The class will challenge students to analyze and move beyond their preconceptions about the purpose of business and their everyday interactions in the world as they experience ethical dilemmas, global and domestic ethical concerns, and corporate social responsibility. Prerequisite: BUS 100.

BUS 365 Contemporary European Business Issues (3) Strategic business concepts in the context of the European Union. Multidisciplinary approach to issues related to the European Monetary Union, global challenges facing European business, and comparative business and leadership experiences. Students participate in site visits in the United Kingdom to develop understanding of operations of corporations from a global perspective. Exposure to historical and cultural context of European business to enhance business decision-making skills. Conducted at Harlaxton College. Open to majors in accounting, business administration, or economics. Prerequisite: Grade of C- or better in BUS 100 or ECON 102.
BUS 380 Special Topics in Business (3) Covers topics not included
in other courses to give greater depth in certain areas and to explore current topics. Repeatable course. Content changes each time course is offered. Prerequisite: Grade of C- or better in BUS 100. Offered periodically.

BUS 398 Internship in Business (3) First internship; a structured assignment in which student gains practical experience in a business position related to an area of career interest. Student is directed by the internship director and supervised by a member of the cooperating organization. A contract (available from the business schools internship director) must be approved and an offer letter from the internship provider must be on file before registering for course. Enrollment in course must be concurrent with the work experience. Sponsoring institutions may require students to have completed specific course(s) in addition to the following prerequisites prior to beginning the internship. Prerequisites: at least one of FIN 361, MGT 311, MGT 377, or MKT 325; permission of the internship director of the Schroeder Family School of Business Administration.

BUS 400 Skills for Career Success Program (0) The Schroeder Skills for Career Success Program provides a roadmap for students to develop their professional careers and networking contacts progressively throughout their time at UE. The program has three areas: Career Readiness, Networking \& Job Search, and Personal Development. Students earn points by participating in a variety of activities, some of which are required and others optional. Examples include internships, career fairs, employer information sessions, and workshops on resume writing, professional communication, and workplace etiquette. Activities are approved and documented by the Schroeder Family School of Business Office for Career Success. Enrollment limited to students majoring in business or accounting. Take MGT-497-Must be taken either prior to or at the same time as this course.
BUS 498 Internship in Business (3) Second internship; a structured assignmentinwhichstudentgainspracticalexperienceinabusiness position related to an area of career interest. Must be a distinct work experience from that provided by Accounting 398 or Business 398. Credits earned apply only as freeelective credits. Student is directed by the internship director and supervised by a member of the cooperating organization. Enrollment in course must be concurrent with theworkexperience.Acontract(availablefromthebusinessschool's internship director) must be approved and an offer letter from the internship provider must be on file before registering for the course. Sponsoring institutions may require students to have completed specific course(s) in addition to the following prerequisites prior to beginning the internship. Prerequisites: Grade of C- or better in ACCT 398 or BUS 398; permission of the internship director of the Schroeder Family School of Business Administration.

## ChangeLab (CHNG)

ChangeLab courses are taught by an interdisciplinary faculty.
CHNG 101 Creative Problem Solving (0-4) This is an experiential learningopportunityinwhichstudentshavetheopportunitytolearn concepts in creative problem solving and apply them in a hands-on format to address a real world challenge. Students will learn creative problemsolvingstylesandprocessesforproblemdefinition,ideation, andsolutiondevelopment.Theywillapplyconvergentanddivergent thinking skills in a collaborative team environment to drive innovation. Courseisrepeatableastopicchangeseachtimecourseistaught.
CHNG 105 Dance for Change (3) Learn fundamental bronze syllabus figures in three dances in American Rhythm and Smooth (Rumba, Salsa and Waltz), become familiar with bronze level technique, study the cultural history of the dances, as well as helpadmin-
isterUE's MadHotBallroomprogram, acity-widedancecompetition forelementaryandmiddleschoolstudentsbasedontheaward-winning documentary. Summer.
CHNG 201 The Science of Well-Being (3) This class is the first of twoclassesthathelpstudentsidentifytheirpassionandlearnhowto enact meaningful change in their own life and community. In this first class, participants get an introduction to positive psychology, socialinnovation,socialentrepreneurship,transformativeaction, and thedevelopmentofchangemakers-includinganin-depth portfolio exercisewheretheyexploretheirowndreams, passions, talents, and strengths. Fall.
CHNG 280 Social Entrepreneurship (0-4) This course will explore the motivation for social entrepreneurship and the various forms of social ventures. Social entrepreneurship will be contrasted with traditional models of charity and social assistance. This course will examine successes and failures of social ventures,emphasizinghow businessstrategiesandmarketprinciplescanbeusedtoachievesocial goals in ways that are self-sustaining. Students will propose projects that identify new, innovative approaches to address social and environmental problems.
CHNG 300 ChangeLab Project (0-4) This is an experiential learning opportunityinwhichstudentscompletereal-world projectsforstartups or organizations (business, not-for-profit, civic, or educational). Projects have a social responsibility focus. All teams are guided by acoach.Competenciesaredevelopedinprojectmanagement,teamwork, professionalinteraction, and presentationskills.Studentsdraw upondiverseteammemberstrengthstodelivervalueontheirprojects. Course is repeatable.Projectschangeeachtimethecourse istaught.
CHNG 310 ChangeLab Project Social Responsibility (0-4) This is anexperientiallearningopportunityinwhichstudentscompleterealworld projectsforstart-upsororganizations(business, not-for-profit, civic, or educational). Projects have a social responsibility focus. All teamsareguided byacoach.Competenciesaredevelopedin project management,teamwork, professionalinteraction, and presentation skills.Studentsdrawupondiverseteammemberstrengthstodeliver value on their projects. Course is repeatable. Projects change each time the course is taught.
CHNG 320 ChangeLab Project International (0-4) This is an experientiallearningopportunity in which studentscompletereal-world consulting projectsforstart-upsorexisting organizations (business, not-for-profit, civic, or educational). Projects have an international focus and may include international travel. All teams are guided by acoach.Competenciesaredevelopedin projectmanagement,teamwork, professionalinteraction, and presentationskills.Studentsdraw upondiverseteammembersstrengthstocreatevalueontheirprojects. Projects change each time the course is taught.
CHNG 330 Social Innovation Concepts and Application (0-4) This is a course in which students propose their own social innovation project. Projects are completed in teams guided by a coach. Competenciesaredevelopedinsocialinnovation,empathy,creative problem-solving, designthinking,story-telling,projectmanagement, teamwork, and presentationskills.Studentsdrawupondiverseteam memberstrengthstocreateimpactonasocial orenvironmentalissue. Course is repeatable.Projectschangeeachtime the course istaught. Prerequisite CHNG-280 and/or permission of instructor.

## Chemistry (CHEM)

Chemistry courses are taught by the faculty of the Department of Chemistry.
CHEM 100 Fundamentals of Chemistry (4) Includes historical developmentofsomefundamentalconceptsillustratingmethodologyand
experimental basis of chemistry. Examines impact of chemistry on modernsociety.Creditmaynotbeappliedtosciencemajors.Intended for students with little or no chemistry background. Threehours lecture, two hours lab. Fall.
CHEM 103 The Chemistry of Adult Beverages (3) Introduction to the chemical principles of adult beverages. Fundamental themes of chemistry and biochemistry will be introduced by examining the processes and production of adult beverages. Critical historical and cultural themes will also be explored.
CHEM 108 Elementary Chemistry (4) Considers fundamental concepts of chemistry, organic chemistry, and biochemistry and their applicationsinscience,technology, and society. Threehourslecture; two hours lab. Prerequisite: CHEM 100 or two semesters of high school chemistry. Spring.

CHEM 118 Principles of Chemistry (4) Covers principles of stoichiometry,chemicalbondingandstructure,thermochemistry, chemical equilibrium, andkinetics. Threehourslecture,twohourslab.Prerequisite: Two semesters of high school chemistry. Fall, spring.
CHEM 195 Introduction to Chemical Research (1-3) Participation in a directed research project. Prerequisites: CHEM 118; permission of instructor. Fall, spring. Repeatable
CHEM 240 Organic Chemistry I (4) Introduction to the structure, nomenclature, and chemistry of carbon compounds. Covers all major functional group classes and their simple characteristic reactions. Introduces mechanistic considerations as a basis for understanding reactions. Laboratory includes basic techniques, simple reactions, and qualitative analysis. Three hours lecture, three hours lab. Prerequisite: CHEM 118 with a grade of C- or better. Spring.
CHEM 280 Inorganic Chemistry I (4) An introduction to the inorganic chemistry of metallic and nonmetallic elements with special attention giventotheapplied industrial and biochemical uses oftheir compounds.Surveysthebehaviorofselectedelementsandcoordination compounds. Threehours lecture, three hourslab. Prerequisite:CHEM 240 with a grade of $C$ or better or permission of instructor. Spring.
CHEM 299 Special Topics in Chemistry (1) Lecture, discussion, or lab course devoted to a topic not covered in regular chemistry course offerings. Topics vary depending on interests of faculty and students. May be repeated. Prerequisites announced when course scheduled. Fall, spring.

CHEM 341 Organic Chemistry II (5) Studies the reactions of organic and bioorganic molecules organized around mechanistic principles. Introduces multistep syntheses and synthetic strategies. Laboratory includes studies of reactions, synthesis, and identification of compounds. Four hours lecture, four hours lab. Prerequisite: CHEM 240 with a grade of C- or better. Fall.
CHEM 351 Physical Chemistry I (4) Introduction to thermodynamics and chemical kinetics as applied to the states of matter, chemical reactions, and chemical equilibria. Three hours lecture, four hours lab. Prerequisites: CHEM 280; MATH 222; PHYS 121 or 210. Fall.

CHEM 360 Quantitative Analysis (4) Studies fundamental principles of chemical analysis and their application. Topics include data handling,chemicalequilibrium, gravimetricandvolumetricanalysis, and certain instrumental methods of analysis. Laboratory experiments illustraterealistic examples ofchemicalanalysis. Threehourslecture, four hours lab. Prerequisite: CHEM 240 or 280 with a grade of C- or better, or permission of instructor. Fall.
CHEM 370 Biochemistry I (3) An introduction to biologically importantmolecules and their role in biological systems at a cellular level. Three hours lecture. Prerequisite: CHEM 341. Fall.

CHEM 371 Biochemistry I Lab (1) An introduction to important basic techniques used in the biochemistry laboratory. Four hours laboratory. Fall.
CHEM 452 Physical Chemistry II (4) Introduction to quantum theory and statistical thermodynamics. Emphasis on the study of thestructure ofsmallmoleculesusing visible,infrared, andmagnetic resonancespectroscopy.Threehourslecture,fourhourslab.Prerequisites: CHEM 351; MATH 323; PHYS 122 or 211. Spring.
CHEM 461 Instrumental Analysis (4) Studies modern methods of instrumental analysis. Topics include electronics in instrumentation, spectroscopic methods of analysis, and separation science. Laboratory experiments provide experience with instrumental design and operation. Three hours lecture, four hours lab. Prerequisites: CHEM 341, 351, 360. Spring.
CHEM 473 Biochemistry II (3) A discussion of advanced topics includes biologically important compounds and their role in biological systems at a cellular level. Three hours lecture. Prerequisites: CHEM 280, 360, 370 with grades of C- or better. Spring.
CHEM 474 Biochemistry II Lab (1) An introduction to advanced techniques used in the biochemistry laboratory. Four hours laboratory. Prerequisites: CHEM 370 and 371 with grades of C- or better, must be taken concurrently with CHEM 473. Spring.
CHEM 483 Inorganic Chemistry II (4) Surveys classical and contemporaryapproachestothestudy ofmolecularstructure,chemical bonding,spectra, acid-basechemistry, the solidstate, andcoordination compounds. Three hours lecture, four hours lab. Prerequisites: CHEM 341, 351, 360. Fall.
CHEM 493 Short Topics in Advanced Chemistry (1) Each 4 1/2 week section explores an advanced topic in chemistry. Topics vary, depending on interests offaculty and students.May be offered with or without lab. Fourteen class hours, four lab periods iflab is offered. Prerequisites:Varybutgenerallyincludeseveralupperlevelchemistry courses. Fall, spring.
CHEM 495 Research (1) Involves participation in and completion of an individual research project under the direction of a faculty member.Requireswrittenandoralreportoftheliteraturesearchand laboratory work. Prerequisite: Permission of instructor. Fall, spring.
CHEM 498 Internship in Chemistry or Biochemistry (1) Supervised and structured assignment in a workplace or similar setting where studentworkswithchemical orbiochemical professionalsand gains practical experience in a position related to a specific area of career interest.Internshiparrangedinadvancebythestudent,thesitesupervisorandthefacultysupervisor.Prerequisites:Completion ofatleast eighthoursofcollegechemistrycourses; permissionoffacultyadvisor and faculty internship supervisor. Fall, spring, summer.
CHEM 499 Chemistry Senior Capstone (3) Required of all senior chemistry and biochemistry majors. Serves as a senior capstone for students majoring in chemistry/biochemistry. Involves individual and group writing projects and oral presentations, a review of chemistry course material, and oral and written assessment of student knowledge in chemistry.

## Civil Engineering (CE)

Civil engineering courses are taught by the faculty of the Department of Mechanical and Civil Engineering. Pre-engineering students and students not admitted to the College of Engineering and Computer Science may not enroll in any civil engineering (CE) course numbered 200 or above without specific permission of the instructor, chair, or dean.
CE 101 Introduction to Civil Engineering (3) A hands-on introduc-
tion to civil engineering. Topics include the use of the computer in engineering, an introduction to different specialty areas of civil engineering and the civil engineering design process. Student teams complete a design project. Prerequisite: Completion of all required English language courses or permission of instructor. Fall.

CE 183 Surveying (3) Introduces students to modern surveying instruments, surveying methods, and engineering graphics. Includes instruction in measurement of distances, horizontal angles and vertical angles, traverse and differential leveling, mapping, survey computations, and computer applications using AutoCAD. One hour lecture, five hours lab. Fall.
CE 221 Civil Engineering Materials (3) Introduction to civil engineering materials in construction, specifically steel, timber, aggregate, Portland cement concrete, and asphaltic concrete. The focus is on the manufacture, origin, and design of materials; physical and chemical properties of materials; stress-strain behavior of materials up to failure; sustainability of materials and evaluation of materials throughdestructive and nondestructive methods. Hands-on labs emphasizecharacterization of physical and mechanical properties of materials,planning and execution of experiments, and interpretation of experimental data Prerequisite: CHEM 118, Corequisite: ENGR 232
CE 224 Construction Management (3) Covers basic construction management functions, general principles of planning, contracting, scheduling, and cost estimating. Also covers construction safety, sustainability, productivity, quality control and cost accounting. Includes the use of project scheduling and cost estimation software. Limited to engineering and construction management majors or permission of instructor
CE 338 Soil Mechanics and Soil Behavior (3) Covers soil origin, index properties of soil, weight volume relationships, soil classification, principles of effective stress, stress distribution, permeability, seepage, lab and field compaction, theory of consolidation, elastic and consolidation settlement, time rate of settlement, and shear strength of cohesive and cohesionless soil. Prerequisite: ENGR 232, C- or better. Spring.
CE 339 Soil Mechanics Laboratory (1) Experiments in index and engineeringpropertiesofsoilsuchasmoisturecontent,specificgravity, sieveanalysis,AtterbergLimits,permeability,fieldandlabcompaction, consolidation, triaxial, and direct shear. Corequisite: CE 338.
CE 340 Structural Analysis (3) Load determination and tributary area calculations, analysis of statically determinate structures for internalforcesanddisplacements,influencelinetheory,approximate analysistechniques, energy methods, and analysis of statically indeterminate systems. Prerequisite: ENGR 232 with a grade of C- or better or permission of instructor. Fall.

CE 341 Design of Steel Structures (3) LRFD design of basic structural steelmembers. Includes design for block shear and shearlagin tension members, lateral torsional buckling and bearing criteria of flexuralmembers,and effectivelength criteriaand baseplatedesign forcolumns.Designofsimpleboltedandweldedconnections.Prerequisite: CE 340. Spring.

CE 342 Design of Concrete Structures (3) Design and analysis of reinforced concrete structural members including rectangular sections for bending and shear. Design of columns for axial load and bending.Rebardevelopmentlengthconcepts.Prerequisites:CE331 \& CE 340. Fall.
CE 350 Transportation Engineering (3) Covers road vehicle performance, geometric design of highways, empirical pavement design, fundamentals of Superpave, traffic flow, traffic surveys, highway
capacity and level of service analysis and fundamental concepts in railwayengineering.Emphasisonlandtransportation. Prerequisites: CE 183; ENGR 213. Spring.
CE 374 Environmental Engineering I (3) Introduction to environmentalengineeringtopics, includingwaterquality, watertreatment processes, air quality, solid and hazardous waste management, and environmentalsustainability.Includesastudyofenvironmentallaws. Prerequisite: CHEM 118 with lab. Spring.
CE 380 Hydraulics Laboratory (1) Experiments in fluid mechanics andhydraulics,includingviscosity,flowmeasuringdevices, momentumforces, turbines, and weirs, andfrictionallosses and pipes. Corequisite: ENGR 366. Fall.
CE 438 Geotechnical Engineering (3) Application of soil mechanics to the design of building foundations, including shallow and deep foundation systems; foundation repair; stability analysis of earth slopes; lateral earth pressures and design of retaining walls. Also includessubsoilexplorationandseismicsitecharacterization.Prerequisite: C- or better in CE 338 or permission of instructor. Fall.
CE 443 Intermediate Structural Analysis (3) Analysis of statically determinateandindeterminatestructuresusing forceand displace-mentmethodssuchasenergymethods,stiffnessmethod,slope-deflection relationships, moment distribution, and matrixtechniques. Settlement and sideway calculations are considered throughout. Prerequisites: CE 340.
CE 449 Advanced Structural Design (3) Advanced topics in structural design including steel connections, plate girders, composite beams,steelandconcreteframes,two-wayslabs,andreinforcedconcrete foundations. Prerequisites: CE 341, 342.
CE 450 Advanced Pavement Design \& Management (3) Application of mechanistic empirical methods for flexible and rigid pavement design, perpetual designof pavements, design ofcontinuouslyreinforced concrete pavements, airfield pavement design, network \& projectlevel pavementmanagement, distresses in rigidand flexible pavements,distresssurveys,pavementmanagementsystemdevelopment, maintenance strategies for rigid and flexible pavements, and newandemergingtechnologiesinpavementdesign,managementand rehabilitation practices. Prerequisite: CE 350.
CE 468 Engineering Hydrology (3) Study of the hydrologic cycle, watershed characteristics, unit hydrographs, stream flow analysis, groundwaterhydrology,floodfrequencyanalysis,floodhydrographs, routingmethods, and hydrologicdesignusing computersimulation models. Prerequisite: ENGR 366.
CE 469 Design of Hydraulic Structures (3) Design methods for open channels, spillways, outlet works, and conduits. Water distribution system design and pipe network analysis. Design of drainage structuressuchasinlets,stormdrainpipes, detentionandretentionbasins, and culverts. Prerequisite: ENGR 366. Fall.
CE 475 Environmental Engineering II (3) Design and analysis of unit operationsand processesforwaterandwastewatertreatment.Topics include physical, chemical, and biological unit processes. Design of sewer networks. Analysis of water treatment plant processes and wastewater treatment plant facilities. Prerequisites: CE 374; ENGR 366; Or permission of the instructor.
CE 495 Civil Engineering Design Project I (3) Introduces concepts of project management, business, public policy, globalization, and leadership,theimportanceofprofessionallicensure, professionaland ethical responsibility, and skills such as technical writing, time management, teamwork, and negotiations. Selection of senior project, incorporating appropriateengineeringstandards, multiplerealistic constraints, and sustainability concepts. Written and oral presenta-
tion of preliminary work. Prerequisites SeniorStanding, as indicated by concurrent enrollment in CE 342, CE 438, and CE 469 or permission of the instructor.
CE 497 Civil Engineering Design Project II (3) Completion of project selected in Civil Engineering 495. Design plans and a formal written reportcoveringall phasesoftheprojectarepreparedandsubmitted. Oral presentation ofthe design before peers, professional sponsors, and faculty. Discussion of the projects impact on the environment, compliancewithengineeringcodes,standards,andsociety.Prerequisite: CE 495.
CE 498 Independent Study in Civil Engineering (1) Independent study oftopic of interesttothestudent.Requiresfacultysponsorand approved detailed study plan of proposed topic.
CE 499 Special Topics in Civil Engineering (1) Study of topics of special interest. Topics will be announced. Repeatable course. Content changes each time course is offered. Prerequisite will be announced when scheduled.

## Cognitive Science (COGS)

Cognitivesciencecourses aretaughtbythefaculty ofseveraldepartments.
COGS 100 Proseminar in Cognitive Science (0) Explores current issuesincognitivescienceinsofarastheyarepertinenttotheinterests ofstudentsasindividuals.Facilitatesoralpresentationskillsbyhaving studentsmakeshortpresentationsandreceivingfeedbackfromother students and the instructor. Grading for the course will be pass/fail. Students may take the course for 1 hour of credit no more than three times. Freshmen should enroll in COGS 100, sophomores in COGS 200, juniors in COGS 300, and seniors in COGS 400. Prerequisite: A declared major in cognitive science.
COGS 111 Introduction to the Mind (3) Surveys the study of the mind from ancient Greek philosophy to contemporary cognitive science. Introduces basic concepts, issues and methodologies associated with the interdisciplinary study of human cognition.

COGS 200 Proseminar in Cognitive Science (0-1) Explores current issuesincognitivescienceinsofarastheyarepertinenttotheinterests ofstudentsasindividuals.Facilitatesoral presentationskillsbyhaving studentsmakeshortpresentationsandreceivingfeedbackfromother students and the instructor. Grading for the course will be pass/fail. Students may take the course for 1 hour of credit no more than three times. Freshmen should enroll in COGS 100, sophomores in COGS 200, juniors in COGS 300, and seniors in COGS 400. Prerequisite: A declared major in cognitive science.
COGS 292 Internship in Cognitive Science (1) Offers students the opportunity for supervised field experience in teaching or research eitheroncampusoratsomeotherfacilityappropriatetothestudent's field of study. Repeatable for credit.

COGS 300 Proseminar in Cognitive Science (0-1) Explores current issuesincognitivescienceinsofarastheyarepertinenttotheinterests ofstudentsasindividuals.Facilitatesoral presentationskillsbyhaving studentsmakeshortpresentationsandreceivingfeedbackfromother students and the instructor. Grading for the course will be pass/fail. Students may take the course for 1 hour of credit no more than three times. Freshmen should enroll in COGS 100, sophomores in COGS 200, juniors in COGS 300, and seniors in COGS 400. Prerequisite: A declared major in cognitive science.
COGS 345 Complex Systems (3) Studies non-linear dynamics involved in multi-agent systems. Focuses on basic complex systems concepts (e.g., adaptability and resilience, constraint, diversity, self-organized criticality, etc.) insofar as they characterize collective behavior in natural and social systems. Specific topics
may include collective intelligence and decision making, belief propagation, prejudice reduction, and civil unrest. Prerequisite: Major or minor in Cognitive Science and junior or senior standing or permission of the instructor. Spring.
COGS 350 Brains, Bodies and Environments (3) [This course] explores and critically evaluates the contemporary view that cognition emerges from complex brain-body-environment systems. Topics include the role of the body and environment in cognition, the view that cognition does not depend on mental representation, and the claim that cognitive processes may extend beyond the brain to include bodily movements and external artifacts as components. Prerequisite: Any course in Cognitive Science, Psychology, Neuroscience or Sociology.
COGS 400 Proseminar in Cognitive Science (0-1) Explores current issues in cognitive science insofar as they are pertinent to the interests of students as individuals. Facilitates oral presentation skills by having students make short presentations and receiving feedback from other students and the instructor. Grading for the course will be pass/fail. Students may take the course for 1 hour of credit no more than three times. Freshmen should enroll in COGS 100, sophomores in COGS 200, juniors in COGS 300, and seniors in COGS 400. Prerequisite: A declared major in cognitive science.
COGS 492 Internship in Cognitive Science (1-3) Offers students the opportunity for supervised field experience in teaching or research eitheroncampusoratsomeotherfacilityappropriatetothestudent's field of study. Prerequisite: At least two courses in cognitive science, philosophy, psychology or computer science. Repeatable course.
COGS 498 Seminar in Cognitive Science Psychology (3) Explores a specificinterdisciplinarytopic that is pertinent to the contemporary studyofcognitionandbehavior.(Coursemayberepeatedforcreditas topicchanges;however,itmaybecountedonlyonceasarequirement towardthecognitivesciencemajor.) Prerequisite:Fourothercourses in cognitive science, philosophy, psychology, or neuroscience.
COGS 499 Independent Study in Cognition and Behavior (1) Offers research on special problems or persons under the direction of an individualfacultymember.Prerequisite:Permission ofthedirectorof the cognitive science program.

## Communication (COMM)

CommunicationcoursesaretaughtbythefacultyoftheDepartment of Communication.
COMM 120 Information Gathering and Distribution (3) Introduces concepts of information gathering from primary and secondary sources including (but not exclusive to) library resources, archival information, Internet resources, public records, and interviews. Also includes methods of presenting gathered information in writing, including news media, research papers, and writing for audio, video, and spoken presentation.
COMM 130 Introduction to Communication (3) Introduction to the fundamental questions, methods, and theories that define the communication discipline and professions in advertising, journalism, public relations, multimedia production, and organizational communication.
COMM 210 Professional Speaking (3) This course focuses on a variety of presentations

COMM 211 Advertising \& Promo Strategy (3) Focuses on the practical and creative skills necessary for advertising professionals. Students learn broad fundamentals of advertising, including brand positioning, copywriting and media placement. An introduction to marketing research is included, allowing students to learn how to create advertising that sells based on qualitative
and quantitative research. How advertising fits into an overall integrative communication plan will be discussed. Prerequisite: COMM-130 or permission of instructor.
COMM 221 Media Writing (3) Develop basic writing and research skills necessary for creating persuasive tools in print, broadcast, and online media. Special focus on developing a competency in the mechanics of concise clear writing through appropriate use of Associated Press style. Prerequisite: COMM 130 or permission of instructor.
COMM 240 Live Events (3) From running the camera to producing from the truck, this course teaches students the necessary skills to be part of a live event broadcast, and offers hands-on opportunities to apply those skills in real-world settings. Fall.
COMM 251 Principles of Multimedia (3) Introduces basic concepts ofWebsitedevelopment,videoproduction, andPhotoshop.Prerequisite: COMM 130 or permission of instructor.
COMM 312 Media Design and Layout (3) Emphasize on creative strategies, idea generation, message creation, design, and com-puter-assisted layouts in various media contexts. Prerequisite: All 200-level communication classes.
COMM 314 Integrated Communication Campaigns (3) Details the establishment of communication strategies, and the execution and evaluation of outcomes using research-based goals. Students create and carry out an integrated communication campaign for a real-world client. Course offers an opportunity for students to integrate prior learning and problem-solving for a comprehensive campaign plan which incorporates traditional and new media platforms.Prerequisites: COMM 211.
COMM 325 Sports Promotion (3) This course covers relationship management within the sports industry, including sponsorship (endorsement and licensing). Students will gain skills in research and market segmentation, marketing mix consideration, ticket sales and special events. Prerequisites: COMM 130, 221 and 231.
COMM 332 Advanced Writing and Editing (3) In-depth instruction and critiques of student-created work for clients. Various forms of news gathering, research, reporting, and interviewing will occur to write, edit and publish feature articles and create, edit and produce podcasts. Prerequisite: COMM 120 and COMM 221.
COMM 333 News Copyediting (3) Overview of the skills and uses of editing.Emphasizesthepracticeofcopyeditingandheadline-writing skillsforprintandonlinepublications.Skillsdevelopedincludetightening writing, sharpening leads, headline writing, cutline writing, and basics of layout. Prerequisite: COMM 231.
COMM 335 Sports Writing (3) This writing-intensive course helps students gain skills in sports journalism through various story forms, including newspapers, magazines and social media. Students will explore human-interest stories with social significance and gain understanding of the role of sports in society. Prerequisites: COMM 130, 221, and 231.
COMM 340 Sound Reinforcement and Recording for Live Events (3) Focuses on the equipment and strategies used to optimize sound both within the space and via recording of live events, including (but not exclusive to) music and theatre performances, speeches and presentation, and corporate conferences and events. Prerequisites COMM 240 or permission of instructor
COMM 345 Video Production (3) The focus of this class will be on understanding the key principles and characteristics of video production - from concepts to the final edit. Prerequisite: COMM 251. Fall.

COMM 355 Multimedia Sound (3) Emphasizes the equipment and
requirements for sound mixing and design in video, including on-set recording, post-production mixing, and the identification and creation of needed Foley, sound effects, and musical elements to create a professional video presentation. Prerequisite: COMM 251
COMM 380 Intercultural Communication (3) Examines the communication process of individuals from different cultures or subcultures. Explores possible sources of misunderstandings in intercultural communication (e.g., time/space factors, linguistic and nonverbal factors, ethnocentric communication, communication problems of persons engaged in personal or professional intercultural contacts).
COMM 381 Relationship Management (3) Critical examination of research and theories dealing with selected variables in one-to-one relationships. Explores development, maintenance, and deterioration stages of professional and personal relationships. Prerequisite: COMM 130 or permission of instructor.
COMM 382 Team Building and Group Communication (3) Theoretical foundations and practical skills for examining and applying communicationprinciplesingroups.Surveysconceptssuchascohesiveness,leadership,groupthink, deviance,networks,choiceshift,and brainstormingastheyrelatetocommunication. Prerequisite:COMM 130 or permission of instructor.
COMM 383 Conflict Management (3) Examination of the factors that lead to conflicts, and theory and practice in using communication strategies to resolve conflict. Prerequisite: COMM 130 or permission of instructor.
COMM 390 Practicum (1) Supervised practical experience in student media or other university information outlets. May be repeated for up to three hours credit. No more than six hours total credit given for COMM 390 and 395 combined.
COMM391 Professional Development(1)Supervised practicalexperience in student media or other university information outlets. May berepeatedforuptothreehourscredit.Nomorethansixhourstotal credit given for COMM 390 and 395 combined.
COMM 395 Internship (1) Supervised practical experience in an off-campusmass communication related organization. Application required.Mayberepeatedforuptothreehourscredit.Prerequisites: one course from COMM 211, 221, 231, 251, 341; GPA of 2.50 or better; 36 hours of completed academic credit.
COMM 410 Health Communication (3) Provides students the opportunity to learn how communication in different contexts (interpersonal, organizational, mediated, etc.) can be utilized effectively to promote physical, mental and social well-being. Contexts include provider-patient communication, communication in healthcare organizations, risk communication and new media technologies related to health communication.
COMM 483 Media Theory and Research (3) Introduction to theory and research in the field of mass media. Examines the role of mass media in modern society and the influence of media institutions and messages on individuals, communities, and society. Includes an overview of basic research methods associated with media research. Students integrate theoretical knowledge into media research areas relevant to communication professionals today. Prerequisite: Junior or senior standing.
COMM 485 Media Law and Ethics (3) Examines the rights, responsibilities, and constraints on public communication in the United States. Emphasis on the effects and interaction of differing ethical constructsandFirstAmendmenttheoriesandsources ofconstraints on the mass media.Covers regulatory policies affecting advertising, public relations, journalism, and present and future electronic mass
mediums.Alsoexamineslegalareasoflibel, privacy,obscenity,access to and ownership of information, and media outlets. Prerequisite: Junior or senior standing.
COMM 488 World Media Systems (3) The focus of this class will be tohelpstudentsidentifyandunderstandthekeyelementsthatdefine and influence media systems around the world. These will include specific philosophies of media systems, the state's relationship with media, how the media isfinanced, accessibility ofthe media, and the influence of culture on media audiences. Specific attention will be given to the process of media globalization and how media imports andexportsinfluencevariousmediasystems. Studentswillhavethe opportunitytoanalyzespecificmediasystemsthroughcomparative analysis allowing them to not only have a broader understanding of the variety of media systems around the world, but also to develop a greaterappreciationforthefactorsthatinfluencethedevelopmentof the media system of the United States.
COMM 490 Special Topics in Communication (3) Varied topics of periodic interest not covered in regular course offerings. May be repeated.Prerequisite:Seniorstandingand permission ofinstructor.
COMM 499 Independent Study in Communication (1) Completion of individual course of study under faculty supervision. Topic and credit hours must be approved in advance in accordance with University policy. May be repeated twice for up to six hours credit.

## Construction Management(CM)

CM 101 Introduction to Construction Industry (3) This course provides an overview of the construction industry before dealing with the in-depth content of construction management. The history on the development of construction industry, the function of construction, sectors of construction industries, and the overall contents of a construction project are covered.
CM 110 Construction Graphics (3) This course introduces graphic communication and visualization used in construction projects. This course provides a basic understanding of plan reading and covers skills needed to create and manipulate drawings with Auto CAD. In addition to Auto CAD, various graphic communication programs and applications for drawing visualization are introduced.
CM 210 Construction Methods and Equipment (3) This course introduces construction equipment and diverse construction methods used throughout the construction process, from start to completion. This includes evaluating the economics and productivity of construction equipment to select the necessary construction equipment for each stage of the construction project.
CM 221 Construction Materials Lab (3) This lab course deals with testing of construction materials used in the construction of buildings, bridges, and other infrastructure. It introduces manufacturing components and material terminology on wood, steel, and concrete. Students will get an in-depth understanding of construction materials for foundations, framing, and building envelopes. Through hands-on experience in the lab, students test construction materials, measure its quality, and properties. 1 hour lecture, 2 hours Lab.
CM 230 Construction Contracts and Codes (3) This course covers all aspects of construction contracts. Students review the most up-to-date current contract systems and documents in use through real world case studies. Students also review and analyze US labor laws related to construction labor contracts, employment regulations, workers' compensation, and safety.
CM 240 Construction Estimation I (3) This course covers the most basic information for preparing construction project estimates. Students learn the basic concept of quantity take-off for each material and learn the skills and tools necessary through plan
reading. Prerequisites: CM 210
CM 340 Construction Estimation II (3) This course introduces the steps of creating a detailed bidding estimate using construction documents. Students will generate direct and indirect costs based on historical data, labor, and productivity rate as detailed estimates for the final bidding stage. Students also analyze subcontractor bids and apply project margins to complete building estimates. Prerequisites: CM 240
CM 350 Construction Safety (3) This course deals with construction safety management methodology to reduce fatal accidents occurring at construction sites. Work practices for the safety of workers on construction sites, compulsory training, compliance with OSHA worker safety and environmental safety law inspection procedures, and safety law violations are covered. Through projects, students learn hazard awareness procedures, site safety meetings, and accident investigations. Prerequisites: CM 210.
CM 370 Mechanical, Electrical and Plumbing (3) This course introduces the basic principles of mechanical, electrical, plumbing (MEP) systems and heating, ventilating, air conditioning, and cooling (HVAC) systems for the building environment. This includes an understanding of the basic design principles, energy usage, and MEP components and installations based on the fundamental scientific principles of each system.
CM 360 Construction Scheduling (3) This course provides students with a thorough and practical knowledge of the planning and scheduling of construction projects. The course covers the development and use of current techniques including bar charts, critical path method, precedence method, probabilistic method, network diagrams, and other selected topics such as resource leveling, network conflicts, earned value management, ethics and schedule risk. The course also focuses on creating actionable schedules while applying industry standard software Primavera 6 and Microsoft Projects for project planning and scheduling. Prerequisites: CE-324.
CM 380 Building Information Modeling (3) This course explains the basic principles and concepts of Building Information Modeling (BIM) for Virtual Design and Construction (VDC). This course, through hands-on practice, focuses on the skills and information needed to effectively design and use a building information model to plan and execute a construction project, from planning and design through to construction and operation, the entire life cycle of a construction project. This course covers 3D modeling and model coordination, 4D scheduling, and 5D estimation in a variety of disciplines with architectural, structural, mechanical, and plumbing models. Pre-req CM-110 or permission of the instructor.
CM 420 Construction Laws and Ethics (3) This course introduces students to the legal issues encountered during construction projects. This course focuses on the construction laws, rules, and regulations governing design and construction. Various construc-tion-related issues that may arise under local, state, or federal law are also covered including contracts, procurement, delays and accelerations, field conditions, warranties, terminations, tort claims, dispute resolution, and ethics. Pre-Req: CM 230.
CM 495 Senior Deisng Project 1 (3) This is the first course in a yearlong capstone project that provides an opportunity for students to apply the knowledge and skills acquired from other courses. Students complete a real-world project under the supervision of the faculty and or an industry partner. Pre-Reg: Senior standing, or permission of the instructor
CM 497 Senrio Design Project II (3) This is the second course in a yearlong capstone project that provides an opportunity for students to apply the knowledge and skills acquired from other courses. Students complete a real-world project under the
supervision of the faculty and or an industry partner, submit, and present their work to project stakeholders. Prerequisite CM 495.

## Computer Science (CS)

ComputersciencecoursesaretaughtbythefacultyoftheDepartment of Electrical Engineering and Computer Science. Pre-engineering studentsmaynotenrollinanycomputerscience(CS) coursenumbered 206orabove withoutspecificpermission ofaninstructor,chair,ordean.

CS 101 Introduction to Computer Science (3) Hands-on introduction to computerscienceandengineering.Meets with electrical and computer engineering sections of Engineering 101. Includes short introductions to programming, robotics, and sensors. Fall.
CS 105 Survey of Computer Science (3) Intended for students who are not computer science or engineering majors. Provides broad introductiontovariousconceptsandtoolsusedincomputing.Topics includenumbersystems,Booleanalgebra, problemsolving,computability, databases, networking, Internet/Web, user interfaces, artificial intelligence, robotics, and short introduction to programming. Background should include two semesters of high school algebra. Credit not given for more than one of CS 101 or 105 or ENGR 101.
CS 205 Programming for the Sciences (3) Explores the power and limitations of using computers in the sciences. Includes the study of various approachesto solving scientific problemssuch as numerical representations, computational numerical methods, and scientific simulations.Coursemaynotbecountedtoward graduationforcomputer science or engineering majors. Prerequisite:MATH 134 or 221.

CS 210 Fundamentals of Programming I (3) Emphasizes prob-lem-solving techniques used in the analysis and design of software solutions, includingstructuredtop-downdesign, abstraction, good programmingstyle,debugging,andtesting.Programmingconstructs covered include control structures, functions, and basic, and aggregate data types. Introduction to recursion and dynamic allocation. Fall, spring.
CS 215 Fundamentals of Programming II (3) Project and prob-lem-solving course emphasizes the use of classes for encapsulation of abstract data types and abstract data structures. Topics include classes, templates, dynamicallocation, searching and sorting, recursion, and exception handling. Introduction to algorithm analysis. Prerequisite: Grade of C- or better in CS 210. Fall, Spring.
CS 220 Logic Design and Machine Organization (3) Introduction to logic design and computer hardware concepts. Topics include Booleanalgebra, numberrepresentations,sequentiallogic, counters and registers, microcomputer architecture, and assembly language programming. Spring.
CS 290 Object Oriented Design (3) In-depth study of abstract data types andobjects, including inheritanceand polymorphism, frameworksanddesignpatterns, andtheuseofthese principlesinproblem solving and program design. Prerequisite: CS 215. Spring.
CS 310 Puzzle Programming (1) Study of problem solving under timepressure.Simulation oftheprogrammingcontestenvironment. All problems considered come from past programming contests. Highly recommended for any student interested in programming competitions. Prerequisite: CS 215 or permission of instructor. May be repeated for up to three credit hours. Fall.
CS 315 Algorithms and Data Structures (3) Design and implementation of algorithms and advanced data structures with attention to complexityandspaceanalysis.Problem-solvingstrategies including greedy and divide-and-conquer algorithms as well as dynamic programming techniques. Prerequisites: CS 215, MATH 370. Spring.
CS 320 Computer Architecture (3) Studies the architecture of computer systems from four-bit machines to supercomputers. Memory
systems,I/O processors, and multi-computer systems are studied in detail. RISC, CISC and Neural Nets are introduced. Establishes the relationship of hardware and software. Includes hands-on projects dealingwithgraphicaluserinterfacesandtheirimplementation. Prerequisites: CS 210; CS 220 or EE 254. Spring.
CS 350 Computer/Human Interaction (3) Study of user interface design, including ergonomic factors. Includes hands-on projects dealing with graphical user interfaces and their implementation. Prerequisite: CS 215.
CS 355 Computer Graphics (3) Fundamental course in com-putergraphics.Topicsincluderenderingtwoandthree-dimensional images, two and three-dimensional transformations, line clipping, hiddenlines, shading, andperspectiveprojections.Prerequisites:CS 215; MATH 323.
CS 375 UNIX System Programming (3) Coverage of UNIX software developmentand UNIX administration. Includes discussion of common shells and scripting languages, X Windows, and interprocess communication. Prerequisite: CS 215.
CS 376 Small Computer Software (3) Introduction to graphical user interface provided by Windows(TM) operating system using C\#.NET. Topics include console applications, windows forms, elementary graphics, ASP.Net web forms, ADO.NET, TCP/IP connection between computers, and dynamic-link libraries (DLLs), and/or device drivers. Prerequisites: ENGR 123 or CS 210; EE 254 or CS 220. Same as EE 356. Fall.

CS380ProgrammingLanguages(3)Comparativeanalysis ofselected high-levellanguages.Coversvirtualcomputersrepresentedbyvarious programminglanguages,representationofdatatypes,sequencecontrolconstructs, dataaccess,scoping,typingsystems,runtimestorage management, languagessemantics,alternative, programmingparadigms, and parallel language constructs. Prerequisite: CS 215. Fall.
CS 381 Formal Languages (3) Models of computation including finite automata, regular grammars, regular expressions, pushdown automata, context-freegrammars, Turing machines, computability, and undecidability. Prerequisites: CS 210; MATH 370. Fall.
CS 390 Software Engineering (3) Study of the software design and development process in the context of a large group-programming project. Topics covered include: project management, software management, requirements and specifications methods, software design and implementation, verification and validation, aspects of softwaretestinganddocumentationstandards, technicaldocuments, contracts, risks, and liabilities. Prerequisite: CS 215. Recommended: CS 290. Fall.

CS 391 Software Engineering II (3) A continuation of CS-390 Software Engineering. Real-world experience developing a large-scale, ongoing software applications for external clients. Topics covered include: project management, quality assurance, and expectation management. Prerequisite: CS 390. Spring.
CS 395 Software Project Management (3) Issues and techniques formanaging software projects. Projectevaluation, scope management,stakeholdermanagement,riskassessment,scheduling,quality, rework, negotiation and conflict management. Ethics of software development.Prerequisite:CS390eitherpreviouslyorconcurrently.
CS 413 Software Security (3) Provides a systematic treatment for software design and implementation to create computer programs andapplicationsthataresecure.Types ofvulnerabilities andsecurity issues involving software implementation and as well as web, cryptographic, andnetworking applications areidentified and solutions providedincludingsoftwaredevelopmentlifecyclemodelsthatincorporatesecurity.Prerequisite:CS390eitherpreviouslyorconcurrently.

CS 415 Cryptography (3) Introduces conventional and public-key cryptography, cryptosystems suchasDES and RSA, and applications of cryptography to network and system security. Prerequisites: CS 215; MATH 370.

CS 430 Artificial Intelligence (3) Basic ideas and techniques underly-ingthedesignofintelligentcomputersystems.Topicsincludeheuristicsearch, problemsolving, gameplaying,knowledgerepresentation, logical inference, and planning. Advanced topics such as robotics, expertsystems,learning, andlanguageunderstandingastimeallows. Prerequisite: CS 215. Recommended: CS 315, 380.
CS440 Databases (3) Presents database concepts and architectures. Topics include basic file structures, data dictionaries, data models, languages for data definition and queries, and transaction managementfordatasecurity, concurrency control, andreliability. Hands-on experience with database and query systems. Prerequisites: CS 215; MATH 222.

CS 445 Programming in the Large (3) Techniques for scaling software to large numbers of users. Topics will include web application programming, database scalingtechniques, using web services and APIs, virtualization and containers. Prerequisite: CS 380.
CS 455 Advanced Computer Graphics (3) Advanced course in computergraphics.Topicsincluderastergraphics, texturemapping,curve approximation, and ray tracing. Prerequisite: CS 355.
CS 470 Operating Systems (3) Components of operating systems. Tasking and processing, processcoordinationandscheduling,memory organization and management, device management, security, networks, distributed and real-time systems. Prerequisite: CS 215. Recommended corequisite: CS 320. Spring.
CS 472 Concurrent \& Parallel Programming (3) The various programming models used for parallel architectures. Topics will range from concurrent programming on clusters, to multi-core programming, to highly parallel and GPU programming. Parallel algorithms and strategies. Prerequisite: CS 470.
CS 473 Mobile Application Development (3) Hands-on, project-oriented course that explores the principles and tools involved in the design and construction of applications for mobile devices. Topics include and overview of mobile application development, application architecture, managing application resources, designing user interfaces, data storage options, integrating audio and video, and location-basedservices.Each offering will concentrate on oneofthe currentmobileplatforms.Repeatablecoursefordifferentmobileplatform content. Prerequisite: CS 215. Recommended: CS 290.
CS 475 Networks (3) Digital data communication systems in hardwareandsoftware,synchronousandasynchronouscommunication, standards, protocols, networkconfigurations, networkapplications. Prerequisites: CS 215; MATH 222.
CS 478 Embedded Systems and Real-Time Programming (3) Covers real-time programming techniques that are commonly used on embedded systems. Topics include real-time operating system concepts,concurrent programmingandtaskschedulingalgorithms, mutual exclusion and synchronization methods, and interprocess communication. Students gain real-world experience by writing applicationsfortwo popularembeddedoperating systems. Prerequisites: EE 354 or CS 215; or permission of instructor. Same as EE 458. Spring.

CS 491 Software Quality Assurance (3) Various aspects of software quality assurance. Dynamic analysis approaches, such as assertions and testing. Static analysis approaches such as reviews and verification.Emphasisonvarioustestingtechniquessuchasunit,integration, system,acceptanceandregressiontesting.Corequisite:CS390either
previously or concurrently.
CS 494 Senior Project Seminar Programming (0) Provides guidance fortheselection ofatopicfortheseniordesignproject.Projects(some industry-sponsored) are presentedforstudentselection. An outline andshortpresentationoftheprojectselectedisrequired.Prerequisite: 12 hoursof300-levelcomputersciencecourses.Computerengineers may substitute EE 494. Spring.
CS 495 Senior Project Phase I (3) Plan the computer science project and formulate the preliminary design under the guidance offaculty and industrial advisors. Discussion of the relationship of computer scienceasadisciplinetothehumanities andsocial sciences.Preparation of a writtenformal proposal and an oral presentation of the proposal.Seminarsessionaddressesethical,environmental,economic, safety,andergonomicaspectsofcomputerscience.Writtenreactionto seminar topics. Prerequisites: CS 494; GPA of at least 2.0. Computer engineers may substitute EE 495. Fall.
CS 497 Senior Project Phase II (3) Student completes and builds the design proposed in CS 495.A formal design review is conducted early in the semester. A practice oral report, a written final report, a final oral report, and a demonstration of the completed project are required. Prerequisite: CS 495. Computer engineers may substitute EE 497.

CS 498 Independent Study in Computer Science (1-3) Independent studyofatopicofinteresttothestudent.Requiresfacultysponsorand approved detailed study plan.
CS 499 Special Topics in Computer Science Programming (1-3) Study of topics of special interest. Topics will be announced. May be repeated. Prerequisites will be announced when scheduled.

## Cooperative Education (COOP)

COOP 081 Concurrent Co-Op (0-1) Part-time employment in a professionalorparaprofessional roleassociated withthestudent's major. Requires full-time student status, prior approval of the job description by the co-op director and submission of a written summaryand evaluationoftheworkexperience.Studentsareexpectedtowork8-15 hours perweek. At least 10 weeks of workmustbecompleted during the semester. May be repeated. Co-requisite: 12 hours of enrolled credit during the fall and spring.
COOP 091 Professional Practice (0-1) For co-op students only. Students register for Cooperative Education 9X during the Xth co-op work period (e.g., Cooperative Education 93 during the third work period). Requires satisfactory work performance and written co-op work report.
COOP 092 Professional Practice (0-1) For co-op students only. Students register for Cooperative Education 9X during the Xth co-op work period (e.g., Cooperative Education 93 during the third work period). Requires satisfactory work performance and written co-op work report.
COOP 093 Professional Practice (0-1) For co-op students only. Students register for Cooperative Education 9X during the Xth co-op work period (e.g., Cooperative Education 93 during the third work period). Requires satisfactory work performance and written co-op work report.
COOP 094 Professional Practice (0-1) For co-op students only. Students register for Cooperative Education 9X during the Xth co-op work period (e.g., Cooperative Education 93 during the third work period). Requires satisfactory work performance and written co-op work report.
COOP 095 Professional Practice (0-1) For co-op students only. Students register for Cooperative Education 9X during the Xth
co-op work period (e.g., Cooperative Education 93 during the third work period). Requires satisfactory work performance and written co-op work report.

## Creative Technology (CT)

CT 497 Creative Technology Internship (1-3) Provides advanced students with the opportunity to work or study in a commercial enterprises or with a professional training program while earning college credit. Program developed in conjunction with faculty. Prerequisite Junior or senior standing; completion of core requirements in field of study; minimum GPA of 3.0; permission of faculty
CT 499 Creative Technology Capstone (3) Prepares students to interview/apply for opportunities in professional fields, graduate programs, and internships. Acquaints students with the nature of postgraduate training and career options.

## Criminal Justice (CJ)

Criminal justice courses are taught by the faculty of the Department of Law, Politics, and Society.

CJ 201 Professional Development in Criminal Justice (1) This course is a professional orientation for criminal justice majors and provides an overview of various internship opportunities, career pathways, and graduate school options available in the discipline. In addition, the course serves as an introduction to academic writing, ethics, and research in criminal justice. Cannot earn credit for SOC 201, PSYC 201, and CJ 201
CJ 205 Introduction to Criminal Justice (3) Views crime and crime control in historical and societal context. Explores the extent of crime and its impact on modern society. Explores causes of crime and the development and operation of the criminal justice system with emphasis upon constitutional restraints. Explores the police, court, and correctional system.
CJ 210 Deviance and Crime (3) Examines deviance through a number of sociological and other perspectives.
CJ 301 Special Topics - Criminal Justice (3) Topics chosen on the basis of programmatic need or student interest. Prerequisite: CJ 205 or 210.
CJ 342 Criminal Law (3) Studies both substantive and procedural law including specific topics in each. Prerequisite: CJ 205 or LS 125.
CJ 354 Introduction to Forensic Science (3) Studies the organization and functions of investigative agencies, basic considerations in the investigation of crime, collection and preservation of physical evidence, and the apprehension process. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 360 The Correctional System (3) Explores the entire correctional process: history and development, probation and parole, institutional corrections, and community based corrections. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 370 The Police (3) Survey of the organization and functions of police agencies, focusing on law enforcement, peacekeeping, and public service responsibilities. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 380 Courts and Justice (3) Introduction to the American court system. The role of the criminal courts emphasized. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 410 Juvenile Delinquency (3) Studies the nature, extent and
causes of juvenile crime, at-risk behavior and child abuse. The juvenile justice system and methods of prevention, treatment and correction are analyzed. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 420 International Crime and Justice (3) Focuses on international criminals and a cross-cultural examination of criminal justice systems. Also deals with the relationship between international crime and crime in the United States. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 440 Criminal Justice Ethics (3) This course provides an overview and exploration of the study of ethics as they relate to the criminal justice system. The course begins with a broader approach and examination of general ethics and morality and then applies ethical frameworks to issues of crime and justice. Specific attention is paid to issues surrounding law enforcement, the law and courts, and corrections issues - especially issues surrounding the punishment of criminals. Prerequisite: Complete one course from: CJ 205, CJ 210, SOC 105, SOC 210, or LS 125; or permission of instructor.
CJ 450 Senior Seminar in Criminal Justice (3) Students complete an original research paper that uses data gathering and interpretive skills. Course content includes the general topics of social organization,socialchange,andsocialstratificationastheyrelatetotheworld cultures courses. Prerequisite: SOC 343, 344 and criminal justice or sociology major; or permission of instructor.
CJ 496 Internship (1-6) Internships available to majors of junior or senior standing who have completed core courses. GPA requirements must be met and student must file an internship application with advisor. Prerequisites: Criminal justice major; junior or senior standing.

## Discussion (DISC)

Discussion groups are sponsored by faculty members from various Universitydepartments.Thesegroupsareorganizedthroughoutthe academic year, and are available for academic credit.
DISC 100 Journeys \& Discoveries (1) This discussion class is designed to encourage new UE students who are undecided about their academic major to examine their own journeys and discoveries as college students, including their explorations of new subjects throughgeneraleducationclasses, readingsandactivitiesoutsidethe classroom. The course will feature readings about personal quests, focused exploration of majors, opportunities to talk with faculty from various disciplines, attendance at cultural events that broaden students' perspectives, andinteractionwithCareerServicesandother relevant student support services. Class discussion and oral reports are required. A grade of P for passing or a grade of F for failure will beassigned upon completion. Enrollment is limited to entering studentswhohavenotdeclaredanacademicmajor.Learningobjectives include practice in critical reading, thinking and discussion.
DISC 110 Student Success Strategies (1) This course is designed for freshman or those transferring to the University. The goal of this course is to increase students' college knowledge by providing academic and social support as they begin their UE college career. Topicsinclude:time-managementand balancing, campusacademic resources, careerservices,strategiesforplanningandachievingacademicandcareergoals, andcampuspoliciesand procedures.Falland spring.
DISC 300 Faculty Sponsored Discussion Group (1) Provides a forum in whichteachersandstudents meetinsmallgroupsto discuss readingseach week.May be repeatedforatotal ofthreecredithourstobe
used as free elective credit only. A grade of Pfor passing or a grade of Fforfailurewillbeassigneduponcompletion.Each discussiongroup centersonasingletopic.Studentsarerequiredtoreadone-and-a-half totwo hours perweek and then meetforonehour perweekwith the group (including a faculty member) to discuss the reading assignment. Students are limited to one discussion group enrollment per semester. Prerequisite: Permission of instructor.

## Economics (ECON)

Economics courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the Schroeder Family School of Business Administration section of this catalog for the complete leveling policy.
ECON 101 Principles of Macroeconomics (3) Macroeconomics is thebranch ofeconomicsthatstudiesthedomesticeconomicsystem as a whole and its interaction with foreign economies. This course focusesonthebehavioroftheaggregateeconomyasitpertainstothe determinationofnationalincome, production,levelofemployment, general pricelevel, and traceflows. Particularattention is devoted to fiscal policy and monetary policy and their respective impact on the economic system. Satisfies Outcome 9.
ECON 102 Principles of Microeconomics (3) Markets are among the oldestsocial institutions knowntoman.Microeconomics is abranch of economics that studies the dynamics of individual markets and prices.Focusesonthebehaviorofproducersandconsumersandthe interdependence in the market process. Pays particular attention to thestructureandevolutionofcompetitivemarkets.SatisfiesOutcome 9. ECON 101 is not a prerequisite.

ECON 300 Regression Analysis (3) Second course in applied statistics for students in economics and other social sciences, business administration, mathematics, or natural sciences. Topics include simple and multiple regression analysis, extensions of the classical regressionmodel,and problemsassociatedwithforecasting.Assigned workexposesstudentstoproblemsfromawiderangeofapplications. Thiscourseincludesintroductiontoeconometricsoftwareandexperiments involving a variety ofreal world datasets.Prerequisite:Grade of C- or better in QM 227 or another course in principles of statistics. Offered alternate fall semesters.
ECON 320 Environmental Economics (3) The content in this course usesconceptslearnedinprinciples ofmicroandmacroeconomicsto examinecausesandevaluatepolicysolutionstoenvironmental problems such as air and water pollution, climate change, and depletion of natural resources. This class teaches important concepts in envi-ronmentaleconomicssuchasexternalities,cost-benefitanalysis,and the valuation of non-market goods. Class material draws both from thetextbookandfromacademicstudiesinenvironmentaleconomics. Prerequisites: Grade of C- or better in MATH 105, 134, or 221 and either ECON 101 or 102.

ECON 345 Intermediate Microeconomics (3) Microeconomics providesthefoundationforlogicalanddisciplinedreasoninginvirtually every aspect of economics. A rigorous introduction to the behavior of buyers and producers and their interaction in the market, course covers theories of rational choice, principles of production, and the economic costs of production. Attention devoted to the nature of competitive and monopoly markets and to markets for factors of production.Ineach area,emphasizestheprinciples ofeconomicefficiency and the concept of economic welfare. Prerequisites:Grade of C- or better in ECON 102 and MATH 134 or 221. Offered alternate years.
ECON 346 Intermediate Macroeconomics (3) Macroeconomics is
the study of the economy as a whole. Course analyzes the factors determining the growth in income, changes in prices, and the rate of unemployment.Asappropriate,thecoursemakesuseofmodelssuited tothelongrunandtheshortrunandmodelsofbothopenandclosed economies. Prerequisites: Grade of C- or better in ECON 101, 102, and MATH 134 or 221. Offered alternate years.
ECON 372 Money and Banking (3) Monetary economics examines the effect of money on economic outcomes. The course focuses on the theory and applications of monetary economics with emphasis on how money supply and interest rates are controlled in practice. Discussiontopicsincludetheroleofinterestratesintheeconomyand their determination infinancial markets,operating goals and proceduresoftheFederal Reserveinitsimplementationofmonetarypolicy, and alternative theories regarding the determination of aggregate output,employment, and prices. Prerequisites: Grade of C-orbetter in ECON 101 and 102. Offered alternate years.
ECON 380 Special Topics in Economics (3) Covers topics not includedinothercourses, togivegreaterdepthincertainareasandto explorecurrenteconomictopics.Repeatablecourse.Contentchanges each time course is offered. Prerequisites: Grade of C- or better in ECON 101 and 102. Offered periodically.
ECON 395 Independent Study (1-3) Independent research in economicsconductedunderfacultysupervision. Prerequisite:Permission of instructor.
ECON 398 Internship in Economics (3) A structured assignment in which student gains practical experience in an economics position. Student is directed by the internship director and supervised by a memberofthecooperatingorganization. Enrollmentincoursemust be concurrent with the work experience. A contract (available from the business school's internship director) must be approved and an offer letter from the internship provider must be onfile before registeringforcourse.Sponsoringinstitutionsmayrequirestudentstohave completedspecific course(s) inadditiontothefollowing prerequisites prior to beginning the internship. Prerequisite: EXED 090, Grade of C- or better in ECON 101, ECON 102 and one from ECON 300, 345,346,372; permission of the internship director of the Schroeder Family School of Business Administration. Not repeatable.
ECON 400 Econometrics (3) Continuation of Economics 300. An introductory treatment of econometric techniques and their applicationtobusinessandsocialscienceresearch.Topicsincludegeneral linearregressionmodels,nonlinearregression,simultaneousequation models, and models with limited dependent variables. Based on a seriesofexperimentsusingrealworlddatasets.Prerequisite:Gradeof C- or better in ECON 300. Offered periodically.
ECON 425 International Trade (3) Analyzes theories and empirical foundations of international trade and factor movement, trade barriers, internationalmonetaryrelations,foreignexchangesystems, balanceof payments, and currentinternationaleconomic problems. Prerequisites: Grade of C- or better in ECON 101 and 102. Offered alternate years.
ECON 435 International Monetary Economics (3) This course focuses on the theory of international monetary economics and appliesittowardsgaininganunderstanding ofcurrentdevelopments and policy issues. The discussion topics on the theory side include the national income accounting, the foreign exchange markets and exchange rate determination, the effect of money and inflation on interestratesandexchangerates, theeffectofexchangeratesonaggregatedemandandoutput,thechoiceoftheexchangerateregime,and the effect of monetary and fiscal policy on employment and output in anopeneconomy underflexibleandfixedexchangerateregimes. The insights gained from the theoretical discussion will help discuss
various topics such as the US current account deficit, the impact of theChineseexchangeratepolicyonitstradepartners, theroleofmonetaryandfiscal policycoordinationintheaftermathoftheglobalfinancial crisis. Prerequisites: Grade of C- or better in ECON 101 and ECON 102.
ECON 470 Financial Institutions and Markets (3) The operation and management offinancial institutions and the markets in which they operatediscussed.Managerialand public policyissuestowardfinancial institutions and markets also addressed. Same as FIN 470. Prerequisite: Grade of C- or better in FIN 361 . Offered alternate years.
ECON 497 Research Seminar (3) This course is the research portion of the economics major and students will draw on skills that they have acquired throughout their major coursework. During the course of the semester students will develop an original contribution to the existing body of economic knowledge. Students will develop original research questions within a chosen field of economics; choose the appropriate empirical approach, through the use of econometric tools, to address economic problems; and effectively communicate the results of empirical inquiry in both written papers and oral presentations. Prerequisites: Grade of C- or better in both ECON 101 or ECON 102 and ECON 300 or STAT 361.

## Education (EDUC)

Educationcoursesaretaughtbythefaculty oftheSchool ofEducation.
EDUC 100 History and Foundations of American Education (3) History of schooling in America and how the current structures, philosophies,and policiescametobe.Covershowcontemporaryschools are structured, managed, funded, and staffed. Helps students identify and build the necessary skills (writing, communicating, using technology, knowing content, and building lifelong skills) to teach. Fall, spring.
EDUC 150 Foundations \& Diversity in American Educ (3) This course is a combination of lecture/seminar/small group practicum. Afteraboutsixweeks ofclassworkdirectedtoward thehistorical and foundational aspects of American education, students are placed in local schools thatareclassified as highly diverse with respect to both ethnicityandeconomiccircumstances(highlevelsoffreeandreduced lunch).The coursewillremainclassifiedasawriting-intensivecourse, andallofthecurrentwritingassignmentswill beretained;thesewriting assignments are related to both the foundational and historical components of schooling as well as the various multicultural componentsthat will help students becomemore culturally competent.
EDUC 200 Introduction to Diversity in Schools, Teachers, and Learners (3) Examines the complex realities of schools, teachers and learners in contemporary American society. Issues include cultural competency, models of effective teaching, diversity in learning, professionalstandards, andaccountability.Includessignificanttime spent in local school placements. Prerequisite or corequisite: EDUC 100. Fall, spring.

EDUC 201 Introduction to Special Education (3) An overview of exceptionality and special education, including definitions, basic legal requirements, and the history and development of the field. Alsoexaminesetiology, characteristics, and educationalinterventions as they relate to following categories of special education: behavior disorders, communication disorders, health impairments, learning disabilities, intellectual disabilities, orthopedic disorders, and visual impairments.Finally,addressescurrentissuessuchasinclusion,early childhood programming, transition, assessment, andmulticulturalism.
EDUC 204 Teaching Students W/ Mild/High Disability (3) Examines perspectives on mental retardation history, definition, assess-
ment, causes, and prevention. Also focuses on characteristics of individualswhohavedifferentlevels ofretardationandtopics related to educational services, family concerns, individual and legal rights, institutional and community learning, and current issues.
EDUC 205 Clinical Intern I - Mild Intervention Elementary Level (3) Emphasizes practical application of the content in Education 204 or 206. All clinical experiences involve assignments of approximatelythreehoursaday,fourdays a week,for 14weeks. Studentsare assignedtoaspecialeducationclass,resourceroom,itinerantteacher or community agency serving children with disabilities. Activities in the clinical placement are designed to enhance the instruction presented in the corequisite courses. Corequisite: EDUC 204.
EDUC 210 Introduction to Special Education and Mild Disabilities (3) Introductiontoeducational servicesforchildrenwhoareincluded in the exceptional children categories of mild intellectual disability and learning disability. A brief overview of educational services for students in low incidence categories of physical and health impairment, visual impairment, hearing impairment and communication disorders, intellectual disability, and severe emotional disorders. Other areas covered are etiological, psychological, and sociological factors related to each disability category. Emphasis on elements of coordinatedprogrammingbetweenspecialandregulareducationpersonnelthatarerequiredtoeffectivelyeducatespecial needslearners.
EDUC 224 Introduction to Kindergarten Education (3) Introduces historical roots and current practices involving a holistic approach to educating a diverse population of young children. Areas of initial explorationincludephilosophy,scheduling,developmentallyappropriate materials, and transitions to kindergarten from preschool environmentconceptof"readiness"forschoolsituations.Laboratory experiences provided. Prerequisites: EDUC 100, 200. Fall.
EDUC 230 Experiences in the Arts for Young Children (3) Acquaints studentwithactivities, materials,equipment,andmethodsappropriate in music, creative play, and arts programming foryoung children.
EDUC 233 Child Development (3) Studies general behavior theory and child development techniques for helping the child deal with problemsinthehomeandschool, preventingandeliminatingdeviant andundesirablebehaviors, anddeveloping parentalcooperationand educational programs.Identification,observation, andrecording of maturationsequencesemphasized.Laboratoryexperiencesincluded. Prerequisite: PSYC 226 or permission of instructor.
EDUC 235 Mathematics for Primary School Children (2) Emphasizes the value of science and mathematics experiences for young children.Proceduresandmaterialsusedtodevelopmathematicaland scientific concepts through the inquiry method are studied.
EDUC 236 Classroom Techniques for Teacher of Preschool Children (3) Discussions cover motivational techniques, classroom activities, use of methods and materials, and construction of lesson plans to meet individual needs of young children. Emphasizes relationships between techniques and goals of early childhood education.
EDUC 264 Assessment, Evaluation, and Remediation of Students with Special Needs (3) Students learn the nature of educational assessmentbystudyingtheprinciplesand practicesofdiagnosticprocedures in special education. Examines formal and informal assessments,standardizedtests,testadministration,testinterpretation,and summary writing in the primary academic areas of reading, mathematics, andwrittenexpression.Learntoutilizeassessmentasameans forformulatingeducational goals andinstructionalobjectivesalong with measuring a student's progress. An instructional remediation practicuminreading, mathematics, andwrittenexpressionassigned.
EDUC 265 Role and Application of Computers in Education (3)

Introductiontotherolesofcomputersineducation withanemphasis oncomputer-assistedinstructionandcomputer-managedinstruction. Students learn to use software tools and write simple programs. Two hours lecture, two hours lab.
EDUC 306 Teaching Students with Emotional \& Behavioral Disorders (3) Covers issues of definition, incidence, and prevalence in a historicalcontext.Classificationsystemsareidentifiedalongwiththe majorconceptualmodels(e.g.,biological/biogenic,behavioral,cognitive/behavioral,ecological/sociological,psychodynamic/humanistic, and psycho-educational). Finally, educational planning techniques andstrategiesoutlinedforimprovingbehaviorsandteaching socialization.

EDUC 307 Clinical Intern III/Intervention ED/BD For Students With $\mathrm{EH} / \mathrm{BD}$ (3) Emphasizes practical application of the content in Education 306. Corequisite: Education 306. Note: All clinical experiences involve assignments for three hours a day, four days a week,for 14 weeks.Studentsareassignedtoaspecialeducationclass, resource room, itinerantteacher,orcommunityagencyservingchildrenwithdisabilities.Activitiesintheclinical placementaredesigned to enhance the instruction presented in the corequisite courses.

EDUC 308 Teaching Students with Severe and/or Multiple Disabilities(3)Introduces prevalence,etiology, anddefinitionsofsevereand/ ormultipledisabilities.Studentslearntodesigneducation programs anddevelopcommunityserviceprogramstosupplementfamilysupport.Additional issues includeassistivetechnology,functionalskills, and vocational skills. Finally, the idea of inclusion and the transition ofstudentswithseveredisabilities fromschool tocommunitylifeare discussed.
EDUC 309 Clinical Intern IV - Intense Intervention (3) Emphasizes practical application of the content in Education 308. All clinical experiences involve assignments for three hours a day, four days a week,for 14 weeks.Studentsareassignedtoaspecialeducationclass, resource room, itinerantteacher,orcommunityagencyservingchildrenwith disabilities.Activities intheclinical placementaredesigned to enhance the instruction presented in the co-requisite course. Co-requisite: EDUC 308.
EDUC 320 Teaching Strategies in K-12 Schools (3) For prospective kindergarten-12 teachers. Addresses curricular and teaching issues from both the theoretical and practical perspectives. Emphasis on understanding the K-12 curriculum and preparing developmentally appropriate instructional strategies. Prerequisites: EDUC 100 and 200 or EDUC-150; or permission of instructor. Fall, spring.

EDUC 321 Teaching Social Studies (3) Examines methods of teaching the social sciences using current materials and basic concepts. Unit planning and inquiry methods of teaching, including the knowledgeanduseoflearning resources,emphasized. Prerequisite: EDUC 320. Corequisites: EDUC 323, 324, 419; or permission of instructor. Spring.
EDUC 322 Strategies for Special Needs Students In K-12 Schools (3) DesignedforK-12teachers,includesdevelopmentofskills,strategies, andknowledgeneededtomeettheeducationalneedsofstudentswith specialneeds.Specialneedsstudents,includingthosewithlearning disabilities, cultural or language differences, or other conditions that inhibit learning, have a right to access the regular education curriculumandareoftenincludedin regular classrooms. Thiscourse includes a practicum in local schools. Prerequisites: EDUC 100 and 200 or EDUC-150. EDUC-320. Or permission of instructor. Fall, spring.
EDUC 323 Teaching Science, Conservation, and Ecology (3) The discovery approach to teaching science emphasized. Prerequisites: Two general science courses; EDUC 320. Corequisites: EDUC 321, 324, 419; or permission of instructor. Spring.

EDUC 324 Principles and Practices in Mathematics Education (3) Provides experiences in methods, materials, and organization of elementary and middle school mathematics education. Emphasis onactivity-basedlearningandmeeting individualneedsofstudents includingmainstreamedstudents. Two hourslecture,twohourslab. Prerequisites: EDUC 320; MATH 101, 202. Corequisites: EDUC 321, 323, 419; or permission of instructor.
EDUC 327 Integrated and Innovative Approaches in ENL (3) Continuation of ENL techniques and methods covered in EDUC 326. Provides students more in-depth knowledge and additional applications ofENLfoundations, techniques, and learning variables. StudentsstudythelatestENLapproachesandthenworkontheapplication ofthese principles as they pertaintoclassroommanagement, learningstyles,andclassroominteraction/dynamicsParticipantsalso examine the acquisition of both first and second languages so they cancompareandcontrastthetwo processesforabetterassessmentof errors and approaches for learning.
EDUC 330 Literature for the Elementary and Adolescent Child (3) Literature, stories, essays, issues, and language materials for kindergarten through young adult reviewed. Prerequisite: EDUC-320. Spring.
EDUC 331 Communicating Values of Literature (2) Studies values of literature for middle school (grades five to nine) and junior and seniorhighschoolstudents, anddevelopstechniquesforhelpingthe character.Teachers and community leaders are trained tolead small andlargegroupdiscussions.Materialsareselectedtofurthertheinterests, tastes, and values of all available literature. Prerequisites: One general education literature course; EDUC 100, 200; or permission of instructor.

EDUC 345 Designing Developmentally Appropriate Curriculum for KindergartenEducation (3) Models ofkindergarteneducationbased onvariouschildgrowthanddevelopmentphilosophiesofhowyoung children grow and develop are utilized as the basis for designing age-appropriateeffectiveinstructionformeaningfulschool programs for young children. Topics include developmentally appropriate curriculumplanning,classroommanagement(rules, procedures,discipline), environmental design, organization, and administration of modelprograms.Laboratoryexperiencesareprovided.Prerequisite/ Corequisite: EDUC-320. Fall.
EDUC 362 All-Grade Curriculum and Teaching Strategies (3) For prospective teachers in all-grade art, music, and physical education programs. Addresses curriculum and teaching issues at elementary, middleschool, and seniorhigh schoollevels.Practicumexperiences included. Should be taken in the same semester that the teaching major special methods course is taken. Prerequisites: EDUC 100, 200; or permission of instructor.
EDUC 363 Principles and Strategies of Teaching in Secondary Schools (3) The application of learning principles, analysis of forces influencing the educational process, and the general methods and procedures used in teaching in secondary schools are studied. Intern teaching experiences required in addition to class time. Additional internship hours required. Junior-level course. Prerequisites: admission to teacher education. Fall, spring.
EDUC 385 Multicultural Understanding (3) Introduction to diverse lifestyles related to a variety of cultural groups. The worth of each individualemphasized, and theimportance ofthis view for developingtheunderstandingrequiredforinterculturalrelationshipsstressed.
EDUC 401 Dev Educ Prog Indiv With Disabilities (3) This course evaluates various types of educational programs (IFSP, IEP, and ISP) developedacrossthelifespan(birthtoadulthood)ofindividualswith disabilities.Effectivestrategiesforcollaborationbetweeneducational professionals and related service providers are examined.

EDUC 403 Classroom Management Techniques for the Elementary Teacher (1) Introduces basic classroom management techniques designed to promote teaching with individuals and groups. Areas of emphasis include avoiding behavior problems, solving behavior problems, and fostering personal growth. Utilizes research-based approach. Prerequisites: EDUC 100, 200. Fall.
EDUC 409 Internship in Kindergarten Education (4) Opportunities tointegratebasicskillsandknowledgeinapplied practicesituations. Observations, assessment, lesson presentation, and curriculumplanning in primary setting stressed. Laboratory experiences provided. Prerequisites: EDUC 224, 345. Fall.
EDUC 410 Program Preschool Children W/Disabilities (3) Explores avariety ofmethods,materials, andtheoriesregardingtheidentification and integration of children with disabilities 0-5 years of age into preschool programs.Emphasizesidentification,assessment, intervention, teachingtechniques, childdevelopment, programadministration, curriculum revision, physical facilities and adaptations, referral processes, and resources. Prerequisite: PSYC 226 or permission of instructor.
EDUC 411 Creative Learning and Play Experiences for Young Children(3)Stressestheroles of creativelearning and playexperiencesin the child's intellectual, social, and emotional development. Studies the developmentalandtherapeutic aspects of play and appropriate methods and materials for structuring play.
EDUC 412 Home School Relationships/Preschool (3) Ways to build effective home-school relationships and provide parent effectiveness training emphasized; teaching parents how to teach their children stressed.
EDUC 414 Interdisciplinary Internship and Seminar (4) Coordinates the teaching of reading, English language arts, mathematics, science, and social studies in the elementary school. Provides internship experiences that allow the pre-service teacher to apply developing pedagogy. Supervision by the classroom teacher and university supervisor will blend theory, research, methodology, and practical experience in teaching reading, English language arts, mathematics, science, and social studies in the classroom. Seminar sessions will focus on the best practices in each subject area. Pre-Requisites EDUC 320; PSYC 226; EDUC 421 or permission of the instructor
EDUC 416 Kindergarten Education (2) An overview of kindergarten programming. Topics include the social climate of the classroom, ways to provide for the child's well-being, available equipment and supplies, curricular and daily schedule plans, preparing records and reports,foundationsoflearning andreadinessforfirstgrade,andkindergartenorganizationandadministration.Laboratoryexperiences included. Prerequisites: EDUC 100, 200. Offered alternate spring semesters.

EDUC 418 Internship Implementing the Lang Arts Curr Arts Curriculum (4) Integrates communicative skills with classroom experiences. Gives students opportunity to apply skills and methodology learned in language arts, reading, and children's literature courses in actual classroom situations in individualized, small group, and whole group teaching situations. Supervision by the classroom teacher and the college instructor blends theory, research, methodology, and practical experience in teaching the language arts in the classroom. Additional internship hours required. Prerequisites: Junior status; EDUC 100, 200, 320. Corequisites: Admission to teacher education; EDUC 403, 421, 422; or permission of instructor. Fall.
EDUC 419 Internship Implementing Math/Sci Cur And Science Curriculum (4) Coordinates the teaching of math and science in
the elementary school. Gives students an opportunity to apply skills and methodology learned in math and science courses in actual classroom situations in individualized, small group, and whole group teaching situations. Supervision by the classroom teacher and the university supervisor blends theory, research, methodology, and practical experience in teaching math and science in the elementary classroom. Additional internship hours required. Prerequisite: EDUC 300, Admission to Teacher Education. Spring.
EDUC 420 Teaching Language Arts in the Elementary Schools (3) Theprocesses, procedures, and problemsencounteredinteachingthe language arts discussed. Consideration for developing and refining the Pupil's proficiency in the oral and written language domains included. Spelling, usage, handwriting, and linguistics for the classroom teacher also studied. Prerequisite: EDUC 320. Corequisites: EDUC 330, 418, 426; or permission of instructor.
EDUC 421 Preschool and Beginning Reading Skills (3) Explores developmentalaspects of reading acquisition as they relateparticularly to theearly stages oflearning to read. Provides backgroundand techniquestopromotereading acquisition.Evaluation, diagnosis,and remediation of those early skills stressed. Students learn to involve parentsinthedevelopmentofpre-readingskills.Prerequisites:EDUC 100 and 200. Fall.
EDUC 422 Teaching Reading and Language Arts in the Elementary School (4) Explores process, procedures, and problems in teaching readingandlanguagearts.Readingcontentincludesbasicknowledge and competency required for planning and implementing developmental reading programs. Language arts content includes basic knowledge and skills for instruction designed to develop and refine students' proficiency in oral and written language. Prerequisites: EDUC 100, 200; or permission of instructor.
EDUC 426 Teaching Reading (3) Theory and methodology of teachingreadingemphasized.Stressesbasicknowledgeandcompetency required for planning and implementing developmental reading programs intheelementaryschool.Basicinstrumentalemphasis on developingthediagnostic-prescriptiveinstructionaldesign. Prerequisite: EDUC 320. Corequisites: EDUC 330, 418, 420; or permission of instructor. Fall.
EDUC 427 Corrective Reading (3) Diagnosis and treatment of reading difficulties for the classroom teacher are discussed. Emphasizes diagnosticstrategiesandtreatmentproceduresforcommonkinds of reading problems.Clinicalexperiencesintegraltothiscourse.Prerequisite: EDUC 422. Spring.
EDUC 428 Reading in the Content Areas (3) Provides Overview of basicreadingskillsandspecificcomprehensionandvocabularyskills forthe contentareas. Studytechniques, reading levels, and comprehension development are examined, and skills in teaching content area lessons developed. Field placement included. Prerequisites: EDUC 426, 427, 436, 443; or permission of instructor. Fall, spring.
EDUC 430 Supervised Teaching in Kindergarten Education (6) Studentsreceivingkindergartenendorsementsmustcompleteteaching and other observational and Participatory activities under the supervision of a cooperating kindergarten teacher and a University supervisor.AgradeofCorbettermustbeearnedinstudentteaching toberecommendedforateachinglicense.Prerequisites:Admittedto teacher education; grade C or better in all education courses; EDUC $224,345,411$ with GPA of at least 2.75 in these courses; senior status with at least 2.70 overall GPA. Spring.
EDUC 432 Supervised Teaching in Elementary School (6) Teaching, observation, and participation activities under the supervision of a cooperating teacher and a University supervisor. A grade of $C$ or
bettermustbeearnedinstudentteaching to berecommendedfora teachinglicense.Prerequisites:Admittedtoteachereducation;grade of $C$ or better in all education courses; ART 102, EDUC 320, 321, $323,324,418,419,420,426$, MUS 270, with GPA of at least 2.75 in these courses; senior status with at least a 2.70 overall GPA. Fall, spring.
EDUC 434 Supervised Teaching in Middle School (6) Teaching and otherobservationand participationactivities underthe supervision of a cooperating teacher and a University supervisor. A grade of C or bettermustbeearnedinstudentteaching to berecommendedfora teachinglicense.Prerequisites:Admittedtoteachereducation; grade of $C$ or better in all education courses; EDUC 426, 427, 443, with at least a 2.75 GPA in those courses; at least 15 hours of course work in the teaching subject with at least a 2.80 GPA in those courses; senior status with at least a 2.70 overall GPA. Fall, spring.
EDUC 435 Supervised Teaching Seminar (2) Emphasis is on the discussion of professional expectations and student teaching experiences. Topics of importance and interest to teachers will be presented by authorities in those areas. Corequisite: Supervised teaching - EDUC 432, 433, 434, 436, 437ED, 439ED, 497, MUS 478 or 479.
EDUC 436 Supervised Teaching in Senior High or Middle School (6)Teaching andotherobservationand participationactivities under thesupervision ofacooperatingteacherandaUniversitysupervisor. A grade of C or better must be earned in student teaching to be recommendedforateachinglicense.Prerequisites:Admittedtoteacher education; grade of $C$ or Better in all education courses; EDUC 363, 428 , and special methods course (may be taken concurrently) with GPA of at least 2.75 in those courses; at least 30 hours of course work in the major teaching subject with a GPA of at least 2.80 in those courses;atleast 18 hours ofcourseworkintheminorteaching subject with a GPA of at least 2.50 in those courses; senior status with at least a 2.70 overall GPA. Corequisites: EDUC 428, 443. Fall, spring.
EDUC 437ED Supv Tchg in Special Classes (for Disab) (6) Teaching and other activities under the supervision of a cooperating teacher andaUniversity supervisor in special education. Prerequisites:Passing grade in EDUC-400, Admission to Student Teaching. Students register for EDUC 437 MD, SD, EH according to the educational setting desired. Students in the Clinical Training Program in special education enroll in EDUC 437 and in EDUC 439. Fall, spring.

EDUC 437MD Supervised Teaching in Special Classes - Mild Disabilities (6) Teaching and other activities under the supervision of a cooperatingteacherandaUniversitysupervisorinspecial education. Prerequisites:Admitted to teacher education; grade of C orbetter in all required courses; EDUC 210, 324, 420, 426, 427, with GPA of at least 2.75 in those courses; senior status with overall GPA of at least 2.70. Students register for EDUC 437 MD, SD, ED according to the certification area desired. Students in the Clinical Training Program in special education enroll in EDUC 437 and/or in EDUC 439 in a second exceptionality area. Fall, spring.
EDUC 437SD Supv Tchg in Special Classes (for Disab) for Severe Disabilities (6) Teaching and otheractivities underthesupervision of acooperatingteacherandaUniversitysupervisorinspecialeducation. Prerequisites: Passing grade in EDUC-400, Admission to Student Teaching. Students register for EDUC 437 MD, SD, EH according to the educational setting desired. Students in the Clinical Training Program in special education enroll in EDUC 437 and in EDUC 439. Fall, spring.
EDUC 439ED Supv Tchg in Special Classes (for Disab) for Emotionally Handicapped (6) Teaching and other activities under the supervision of a cooperatingteacherandaUniversity supervisorin special
education. Prerequisites: Passing grade in EDUC-400, Admission to Student Teaching. Students register for EDUC 437 MD, SD, EH accordingtotheeducational setting desired.Students intheClinical Training Program in special education enroll in EDUC 437 and in EDUC 439. Fall, spring.
EDUC 439MD Supv Tchg in Special Classes (for Disab) for Mild Disabilities (6)Teaching and otheractivities underthe supervision of acooperatingteacherandaUniversitysupervisorinspecialeducation. Prerequisites: Passing grade in EDUC-400, Admission to Student Teaching. Students register for EDUC 437 MD, SD, EH according to the educational setting desired. Students in the Clinical Training Program in special education enroll in EDUC 437 and in EDUC 439. Fall, spring.
EDUC 439SD Supv Tchg in Special Classes (for Disab) for Severe Disabilities (6)Teaching and otheractivities underthe supervision of acooperatingteacherandaUniversitysupervisorinspecialeducation. Prerequisites: Passing grade in EDUC-400, Admission to Student Teaching. Students register for EDUC 437 MD, SD, EH according to the educational setting desired. Students in the Clinical Training Program in special education enroll in EDUC 437 and in EDUC 439. Fall, spring.
EDUC 443 Curriculum and Learning in Junior High/Middle School (3) Designed for prospective teachers in junior high and middle schools.Addressescurricularissuesandlearningissuesfrom thetheoretical and practical vantage pointsfor the middle school. A strong focus on developing an understanding of the curriculum in junior high and middle schools, how it is designed and taught, and the policiesthathaveanimpactonitscontinueddevelopment.Examines learning theories in relationships to student needs in junior high andmiddleschools.Field placementincluded.Additionalinternship required. Prerequisites:EDUC 320;admission to teacher education.
EDUC 447 Intellectual Disab \& Assorted Severe Disabilities (3) Examines the psychological, sociological, and educational implications of intellectual disabilities and its causes, characteristics, diagnosis, and treatment. Special problems of individuals with low functioning, multiple disabilities are analyzed. Prerequisite: EDUC 201 or PSYC 121 or permission of instructor. Fall.
EDUC 451 Methods of Teaching Science in Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of science in middle, junior, and senior high levels. The course is specifically designed to connect the student's training in science to educational theories. The course will focus on issues surrounding science instruction and teaching techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.

EDUC 453 Methods of Teaching English in Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of English Language Arts in middle, junior, and senior high levels. The course is specifically designed to connect the student's training in English Language Arts to educational theories. The course will focus on issues surrounding English Language Arts instruction and teaching techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.
EDUC 454 Methods of Teaching Foreign Language In Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of foreign language in middle, junior, and senior high levels. The course is specifically designed to connect the students training in foreign language to educational theories. The course will focus on issues surrounding foreign language instruction and teaching
techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363. or EDUC 443
EDUC 456 Methods of Teaching Mathematics in Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of mathematics in middle, junior, and senior high levels. The course is specifically designed to connect the students training in mathematics to educational theories. The course will focus on issues surrounding mathematics instruction and teaching techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.
EDUC 457 Methods of Teaching Physical Education In Elementary, Senior High, Junior High Middle Schools (2) Prerequisite: Admission to teacher education. Corequisite: Education 363 or EDUC 443.

EDUC 459 Methods of Teaching Theatre Arts in Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of theatre arts in middle, junior, and senior high levels. The course is specifically designed to connect the students training in theatre arts to educational theories. The course will focus on issues surrounding theatre arts instruction and teaching techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.
EDUC 460 Methods of Teaching Speech in Senior High, Junior High, Middle Schools (2) Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.
EDUC 461 Methods of Teaching Social Sciences in Senior High, Junior High, Middle Schools (2) This course is a one-semester introduction to methods and issues surrounding the teaching of Social Studies in middle, junior, and senior high levels. The course is specifically designed to connect the students training in social studies to educational theories. The course will focus on issues surrounding Social Studies instruction and teaching techniques. Prerequisite: Admission to teacher education. Corequisite: EDUC 363 or EDUC 443.

EDUC 463 Inclusion and Collaborative Teaching (3) Studies the integration of special education in the regular classroom. Service delivery models for students with special needs are identified and analyzed.Emphasisoncollaborativeprocedures,specialservices,and instructionaladaptationthatregularandspecialeducationteachers use to meet the learning needs of special needs students enrolled in general education classes.
EDUC 465 Advanced Application of Computers in Education (3) Teachers, counselors, and administrators introduced to the roles of computers in education in the areas of administration, comput-er-assistedinstruction,computer-managedinstruction, and comput-er-assisted guidance programs. Computer-assisted instruction and computer-managed instruction emphasized. Prerequisites: EDUC 100, 200, 265.
EDUC 472 Adolescent Development and Learning Patterns (3) A detailedstudyofthephysical, intellectual,social,andemotionalcharacteristics of early adolescence (from about 14 to 18 years). Instructional implications of developmental patterns investigated. Topics include the developmental characteristics of youth as they relate to and determine curriculum goals, relevance of content, instructional organization,independenceandleadershipdevelopmentgoals,career educationgoals, and other special needs oftheearlyadolescentand middle student. Prerequisite: PSYC 226 or permission of instructor. Alternate years. Fall.

EDUC 475 Supervision and Organization of Clinical Experiences in Literacy (4) Experiences to engage in supervision and organization of diagnosis and remediation of literacy difficulties in a classroom setting. Under supervision of a University instructor. Prerequisites: EDUC 422, 427, or permission of instructor. Fall, spring.
EDUC480 Orientationto Deafness (1) General overview ofdeafness. Many aspects of the deaf community and skills necessary for individualswhoplantoworkorassociatewith deafpersonsemphasized. Anatomicandmedicalaspectsofdeafness,audiology,communication with the deaf,telecommunicationdevices,educationalissues, vocational rehabilitation, sociological factors, psychologicalfactors, and legal aspects of deafness.
EDUC 481 Basic Sign Language (3) Familiarity with the basic structures of sign language. Emphasizes acquisition of a core vocabulary of signs and finger spelling in American Sign Language or signed English.Developsskillsandtechniques ofnonverbalcommunication necessary to communicate effectively with deaf persons.
EDUC 482 Intermediate Sign Language (3) Expands sign vocabulary and ability to utilize the manual alphabet. The use of conceptually appropriatesignsinconversationemphasized;receptiveskillsdeveloped further. Prerequisite: EDUC 481 or permission of instructor. Spring.
EDUC 483 Advanced Sign Language (3) Opportunities to communicate solely in sign language in a variety of activities and situations. Prerequisites: EDUC 481, 482; or permission of instructor.
EDUC 487 Education of Gifted and Talented Children (3) Examines definitions of the term "gifted," delineates characteristics unique to thegiftedandtalented, andreviewsproceduresusedtoidentifythese children. The nature of creativity and the direction of programs for youth ofdiverseabilitiesconsidered.Relatedresearch reviewed.Prerequisite:Juniorlevelinteachereducationorpermission ofinstructor.
EDUC 488 Curriculum and Methodology in Gifted/Talented Education (3) Reviews curricular programs for gifted and talented children and youth. Introduces methods for developing creativity and prob-lem-solvingskills.Examinesproceduresforcontentaugmentationare consideredand programmodels.Prerequisite:Juniorlevelinteacher education or permission of Instructor.
EDUC 490 Schools in a Changing Society (3) Capstone course in education. Focusesonthemanywayseducationandothersocialinstitutionsareinfluencedbysocietalandculturalchanges.Historicaland currentsocialissues affectingeducationareanalyzedandevaluated from historical, economic, political, multicultural, legal, moral, and ethical perspectives.Limitedtoseniorswhohavebeenfullyadmitted toteachereducationandwhomeetallstudentteachingrequirements or who have permission of instructor. Fall, spring.
EDUC 497 Supervised Teaching and Observation in Elementary, Middle School, Junior High, and Senior High (1-12) Teaching, observation, and participation activities under the supervision of a classroomteacherorcommunityagencystaffmemberandaUniversity supervisor. Fall, spring.
EDUC 498 Seminar: Field Experience in English Schools (1) Study of the British education system. May include both classroom and field-basedexperiencestopromoteunderstanding ofcontrastsand comparisons of the American and British system.
EDUC 499 Seminar: Basic Issues in Education (1-3) Seminar, workshops,orindependentresearch projectsonissuesand problems in modern education. Prerequisite:Instructor's approval. Forgradu-ate-level courses, please refertothegraduate coursedescriptionsin this catalog.

EDUC H498 Seminar: Field Experience in English Schools (1) Study of the British education system. May include both classroom and field-basedexperiencestopromoteunderstandingofcontrastsand comparisons of the American and British system.

## Electrical Engineering (EE)

Electrical engineering courses are taught by the faculty of the Department of Electrical Engineering and Computer Science. Pre-engineering students and students not admitted to the College of Engineering and Computer Science may not enroll in any electrical engineering (EE) course numbered 200 or above without specific permission of the instructor, chair, or dean.
EE 101 Introduction to Electrical and Computer Engineering (3) A hands-on introduction to electrical and computer engineering. Topics include the use of the computer in engineering and an introduction to the design process. Student teams led by faculty (typically the students academic advisor) complete design projects in a particular discipline. Fall.
EE 210 Circuits I (3) Integrated lab/lecture covers the fundamentals of electrical circuit analysis. Introduces foundational circuit theorems and analysis methods. These include: Ohm's law, Kirchhoff 's laws, circuit reduction, node voltage analysis, mesh current analysis,superposition, and Thevenin and Norton equivalent circuits. The current-voltage characteristics for resistors,capacitors, inductors, diodes, and transistors are discussed. Additional topics include analysis of resistive DC circuits, operational amplifiers, the natural and step responses of first and second-order RLC circuits, the steady-state sinusoidal response of RLC circuits, and common diode and transistor applications. Theoretical principles verified by circuit construction and measurement and through the use of circuit simulation software. Students learn to use a variety of electrical test equipment including voltmeters, ammeters, ohmmeters, and digital and analog oscilloscopes. Prerequisite: MATH 222. Fall, spring.

EE 215 Circuits II (3) An integrated lab/lecture covers linear system theory as applied in the analysis of electrical circuits. Topics include the sinusoidal steadystate response and phasors, the Laplace transform, Fourier series and the Fourier transform, passive and active frequency selective circuits (filters), and Bode diagrams. Theoretical principles verified by circuit construction and measurement and through the use of circuit simulation software. Prerequisites: EE 210. Corequisite: MATH 324 or permission of instructor. Spring, summer.
EE 224 Electrical Engineering Programming Lab (2) Provides advanced programming conceptsforelectricalengineeringmajors. Thecourseisspecificallyaimedatprogrammingmicrocontrollersand theuseofprogrammingtoolsinelectricalengineering.Topicscovered includebitmanipulation, memoryallocationconcepts, architectural considerations, realtimeevents,specializedmicrocontrollerl/O, and programming with MATLAB and other simulation tools. Prerequisites: EE 210 and either ENGR 123 or CS 210. Spring.
EE 254 Logic Design (3) Presents a thorough treatment of combinational and sequential logic design. Topics include number systems, Booleanalgebra,minimization procedures,sequentialcircuitdesign, flipflops, counters, registers, andfinite-statemachines.Logicdesign is applied to computer architecture and microprogramming and hard-wiredconceptsareintroduced.Programmablelogicdevicesand computeraideddesigntoolsfordigital circuitsusedforclassprojects. Spring.
EE 310 Signals and Systems (3) ProviThe course covers continu-ous-time signals and systems. Topics include introduction to the mathematical representation of signals, system characterization,
convolution, and system analysis in the time and frequency domains. Fourier and Laplace transform analysis techniques of signals and systems are presented.analysis presented. Prerequisites: EE 215; MATH 324. Fall.

EE 311 Digital Signal Processing (3) This course provides a solid foundation in the theory and methods used in filtering digital signals with a focus on audio and image processing. Topics include Sampling, Discrete-Time Signals and Systems, the z-Transform, the Discrete Fourier Transform, FFT Algorithms, FIR and IIR filter design, and Digital Filter Structures. Prerequisite: EE 310. Spring.
EE 330 Introduction to Power Systems (3) Introduces the principles and concepts that are the basis of electric power systems. Topics include single phase and three phase systems, the per-unit system, synchronous generators,single phase and three phase power transformers modeling and design, transmission line models for steady state operation, transmission system design, line load-ability and stability limits, power flow analysis,fault tolerance, and optimal dispatch of generation. Prerequisite: EE 215.
EE 331 Energy Conversion Systems (3) Introduces theory of operation and analysis of energy conversion devices and systems. Topics include magnetic and electric forces, electromechanical energy conversion, motors, energy storage, solar electric, wind power, small hydro,fuel cells, biomass, and geothermal. Includes a project lab. Prerequisites: EE 210; MATH 222.
EE 342 Electronics I (2.5) Lecture/project covers analysis and design of diode and transistor circuits. Diode, metal-oxide-semiconductor field-effect transistor (MOSFET) and bipolar junction transistor (BJT) device characteristics are explored in detail. Major topics include diode applications, transistor amplifiers, and digital logic families. Specific topics include amplifier characteristics, circuit models for amplifiers, the pn junction, ideal diodes, modeling diode forward characteristics, reverse breakdown of diodes, MOSFET and BJT device structures, MOSFET and BJT amplifiers in DC, MOS small-signal operation and discrete-circuit amplifiers, complementary metal-oxide-semiconductor (CMOS) inverters, CMOS logic-gate circuits, pass-transistor logic (PTL) circuits, and emitter-coupled logic (ECL) circuits. Several small team projects are used to reinforce theory and to develop design skills. Prerequisites: EE 210. Corequisite: EE 342L and EE 254 or permission of the instructor. Fall.

EE 342L Electronics I Lab (0.5) Lab portion of EE 342. Corequisite: EE 342.
EE 343 Electronics II (2.5) Lecture/lab with continued coverageof material presented in Electrical Engineering 342. Major topicsinclude BJT amplifiers, IC amplifiers, differential amplifiers, nonidealoperational amplifiers, and frequency effects. Specific topicsinclude small-signal operation and models of BJTs, dis-crete-circuitBJT amplifiers, IC amplifiers, current-mirrors with improved performanceBJT and MOS differential pair circuits, common-moderejection ratio, DC imperfections of op amps, large signal operationof op amps, LM741 op amp circuit, high frequency BJT and MOSmodels, and the high and low frequency response of transistor amplifiers.Several small team projects are used to reinforce theory and todevelop design skills. 2.5 hours lecture, 0.5 hours lab. Corequisite: EE 343L. Prerequisites: EE 215, 342.

EE 343L Electronics II Lab (0.5) Lab portion of EE 343. Corequisite: EE 343.
EE 354 Embedded Systems (3) Discusses the design of computer systems with emphasis on the interaction between hardware and software. Topics include register design, memory systems,
programmable I/O devices, interrupt driven I/O, controller design and microprogramming, bus systems, interface electronics, and assembly language programming. The C programming language is used for most projects. Prerequisites: EE 254. CS-210 or ENGR123; working knowledge of C or C+. Fall.
EE 356 Windows Application Development (3) Introduction to system programming in the Windows operating system. Topics include the console applications, windows forms, elementary graphics, ASP.NET web forms, ADO.NET, TCP/IP communication, and dynamic-link libraries (DLLs) and/or device drivers. Same as CS 376. Prerequisites: ENGR 123 or CS 210; EE 254 or CS 220. Same as CS 376. Fall.
EE 360 Linear Control Systems (3) Introduction to analysis and design of linear analog and digital feedback control systems. Topics includesystemmodeling,timeandfrequencydomain performance analysis, stability analysis, and controller design. Introduces both root locus and frequency domaintechniques of system analysis and design. Presents emulation techniques for digital controller design. Prerequisite: EE 310. Spring.
EE 380 Instrumentation (3) Automation software, interfacing methods and circuit fabrication techniques are presented. Students gain practical experience using test and measurement tools and equipment through a series of project assignments. Prerequisites: EE 215, 254, and 342 . Spring.
EE 410 Analog Circuit Synthesis (3) Lecture/project covers analysis and design of active circuits. Major topics include feedback, instrumentation amplifiers, active filter design, non-linear circuits, signal generators, andvoltageregulationcircuits. Prerequisites:EE310,343.
EE 415 Digital Image Processing (3) A study of the computer methods used in processing digital images. Topics include: image acquisition, image enhancement and restoration, image representation, computerimagefileformats, andimagecompression. Processing of bothmonochromeandcolorimagesisdiscussed. Representationand processing of images in the spatial (pixel) and frequency domains is covered. Prerequisite: EE 310
EE 420 Electromagnetics (3) Introduction to electromagnetic field theory. Topics include vector analysis, static and time-varying electric and magnetic fields, Maxwell's equations, capacitance, inductance, plane electromagnetic waves, and transmission lines. Prerequisites: EE 215, and MATH 323. Recommended: MATH 324. Fall.

EE 421 Photonics I (3) Introduction to basic optics, optical devices and lasers. Topics include geometrical and physical optics, ray matrices, optical fiber characteristics, losses, dispersion, transverse electromagnetic modes, and communications. Examples of current applications and laboratory demonstrations provided. Prerequisite: EE 215 Corequisite: EE 320. Spring.
EE 422 Photonics II (3) Introduction to lasers and laser systems. Topicsincludestableoptical cavitydesign,atomicmediacharacteristics, gain equations, rate equations, cavity modes, cavity devices mode control, and pulse forming networks. Prerequisite: EE 421.
EE 425 Lines Waves and Antennas (3) Examines transmission lines, waveguides, and antennas. Topics include transmission line equations, Smith charts, slotted lines, microwave impedance matching, plane wave propagation, radiation patterns, and antenna arrays. Prerequisite: EE 320. Taught by request.
EE 432 Analysis of Power Systems (3) Covers operation, control, protection, and stability of power systems. Topics include power flow analysis, synchronous machine transient analysis, symmetrical components, balanced and unbalanced fault analysis, power
system control, frequency control, automatic generation control, reactive power and voltage control, stability analysis, and protection of power systems. Prerequisite: EE 330 or 430.
EE 437 Power System Planning (3) Covers topics in distribution systemplanning,loadcharacteristics, designofsubtransmissionlines, distributionsubstations, primaryandsecondarysystems, application ofcapacitors,voltageregulation, distributionsystem protection,and reliability. Prerequisite: EE 330.
EE 438 Electric Power Quality (3) Focuses on such subjects as harmonics, noise, filtering, and communication interference in power systems. Modeling, analysis, and solutions are points of emphasis. Topics include measures and standards of power quality, measurements and errors, modeling and design of components, harmonics, loads which cause power quality problems, susceptibility ofloads to unwanted signals, and power quality improvement.
EE 440 Communication Electronics (3) Lecture/project focuses on circuits used in modern wireless communication devices. Topics includehighfrequencypassivecomponentmodels, transmissionline and microstrip theory and the Smith chart, multiport networks and scattering parameters, radiofrequencyfilterdesign, highfrequency activedevicesandmodels,matchingnetworks,radiofrequencyamplifiers, oscillators,and mixers. Prerequisites: EE 320, 470. Fall.
EE 445 Industrial Electronics and Controls (3) Introduces power electronic systems and design of power electronic devices used for commercial and industrial instrumentation and control. Topics include magnetic materials and design, semiconductor switches, power diodes, rectifiers, inverters, ac voltage controllers, level triggered switching devices, power MOSFETS, IGBT, pulsed triggered devices, thyristors, GTO, MCT, thyristor circuits, power transistors, dctodcconverters,switch-modepowersupplies, dctocontrolledac, UPS, ac to controlled ac, ac and dc motor drivers. Prerequisite: EE 342.

EE454 Microcontroller Applications (3) Focuses on the use of micro-controllersinreal-timeapplications.Organizedaroundseveralopenendedprojects.Each projectrequiresthecompletedesignofaworking microcontroller system for a given application and programming in C. Prerequisite: EE 354. Spring.

EE 456 Small Computer System Design (3) Project-based course coversadvanceddesignanddevelopmenttopics relatedtoreal-time microcomputer systems and networks. Topics include memory management, datastructures, networkarchitecture,communication protocols, power considerations, hardware design, and hardware/ software trade-offs. Prerequisites: EE 354, 454. Taught by request.
EE 458 Real-Time Operating Systems (3) Covers real-time operating system concepts including concurrent programming, task scheduling, mutual exclusion, synchronization, and inter-process communication. Practical experience is gained through a series of project assignments.Prerequisites: CS 215; EE 254 or CS 220; Spring.
EE 465 Digital Control Systems (3) Advanced analysis and design of linear systems. Analysis and design of digital control systems emphasizedthroughclassroomdiscussions,homeworkassignments anddesign projects.Bothclassicalandmoderncontrolsystemdesign techniques studied. Prerequisite: EE 360.
EE 470 Analog and Digital Communications Theory (3) Communicationtheoryforboth digitalandanalogsystems.Emphasisondigital systems. TopicsincludeFourieranalysis,modulationanddemodulationtheory, digitalsignalingformats,communicationsystemsdesign fundamentals, and applications. Probability and random processes introducedandappliedtothestudy ofnarrowbandnoise incommunication systems. Prerequisite: EE 310. Fall.

EE 471 Wireless Communication Theory (3) This is a senior level course that provides a systems-level view of modern wireless communication systems. Special emphasis will be placed upon development and understanding of the cellular telephone network. Topics include: wireless propagation, antenna radiation, channel characteristics, interference, cellular concepts including clustering, cell sectoring and splitting, traffic engineering, pulse detection, the matched filter, correlation receivers, digital modulation, spread-spectrum signaling, channel access methods including frequency division (FDMA), time division (TDMA), and code division (CDMA) multiple access. Prerequisites: EE 310. Spring.
EE 494 Senior Project Seminar (0) Provides guidance for the selection of a topic in the senior design project sequence. Projects, including industry-sponsoredprojects, presentedforstudentselection.Prerequisite: 12 hours of 300 -level electrical engineering courses. Spring.
EE 495 Senior Project Phase I (3) Plan the engineering project and formulate the preliminary design under the guidance of faculty and industrialadvisors.Seminarsessionsaddressprofessionalethicsand the social and political contexts ofengineering. Theeconomic,environmental, health, and safety aspectsofthe projectareaddressed in awrittenengineering proposal, as aretheissues ofmanufacturability and sustainability. An oral presentation of the proposal is required. Studentssubmitwritten reactiontoseminartopics. Prerequisites:EE 380, 494; GPA of at least 2.0. Fall, spring.
EE 497 Senior Project Phase II (3) Complete the design proposed in Electrical Engineering 495 and build a prototype. A formal design review conducted early in the semester. Written final report, oral report,anddemonstrationofthecompleted projectrequired. Prerequisite: EE 495. Fall, spring.
EE 498 Independent Study in Electrical Engineering (1) (variable credit) Independent study of a topic of interest to the student. Requires faculty sponsor and approved detailed study plan.
EE 499 Special Topics in Electrical Engineering (1-3) Study of topics of special interest. Topics will be announced. May be repeated. Prerequisites announced when scheduled.

## Engineering (ENGR)

Interdepartmental engineering courses are taught by the faculty of theCollege of Engineering andComputer Science.Pre-engineering studentsandstudents notadmittedtotheCollegeofEngineeringand Computer Science may not enroll in any engineering (ENGR) course numbered 200 orabovewithoutspecificpermission oftheinstructor, chair, or dean.
ENGR 071 Internship (0) Full-time employment for a period of 10-16weeksina professionalorparaprofessional roleassociatedwith the student's major. Students registerfor Engineering 07X in the Xth termofemployment.Requirespriorapprovalofthejobdescriptionby theco-opdirectorordesigneeandsubmission ofa written summary and evaluation oftheworkexperience.May be repeatedfora total of three experiences. Prerequisite: At least 18 hours of course work of whichatleastninehours represent progresstowardadegreeinengineeringorcomputersciencemusthavebeentakenduringtheprevious two academic terms.
ENGR 072 Internship (0) Full-time employment for a period of 10-16weeksinaprofessionalorparaprofessional roleassociatedwith the student's major. Students registerforEngineering 07X in the Xth termofemployment.Requires priorapproval ofthejobdescriptionby theco-opdirectorordesigneeandsubmission ofa written summary and evaluation oftheworkexperience.May berepeatedforatotal of three experiences. Prerequisite: At least 18 hours of course work of
whichatleastninehours representprogresstowardadegreeinengineeringorcomputersciencemusthavebeentakenduringtheprevious two academic terms.

ENGR 073 Internship (0) Full-time employment for a period of 10-16weeksina professionalorparaprofessional roleassociated with the student's major. Students register for Engineering 07X in the Xth termofemployment.Requirespriorapprovalofthejobdescriptionby theco-opdirectorordesigneeandsubmission ofawrittensummary and evaluation of the work experience. May be repeatedfor atotal of three experiences. Prerequisite: At least 18 hours of course work of whichatleastninehours representprogresstowardadegreeinengineeringorcomputersciencemusthavebeentakenduringtheprevious two academic terms.
ENGR 081 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent's major. StudentsregisterforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto work no less than eight and no more than 15 hours per week. At least 10weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at least six represent progress toward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 082 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent's major. StudentsregisterforEngineering08XintheXthterm ofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto work no less than eight and no more than 15 hours per week. At least 10weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progress toward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 083 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent's major. StudentsregisterforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto work no less than eight and no more than 15 hours per week. At least 10weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at least six represent progress toward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 084 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent's major. StudentsregisterforEngineering08XintheXthterm ofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours per week. At least 10weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progress toward
a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 085 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessionalroleassociatedwiththestudent'smajor. Students registerforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours per week. At least 10 weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which atleastsix represent progress toward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 086 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent'smajor. Students registerforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours per week. At least 10 weeks of workmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progresstoward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 087 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociatedwiththestudent's major. Students registerforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluationoftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours perweek. At least 10 weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progresstoward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 088 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent'smajor. Students registerforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluation oftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours per week. At least 10 weeks of workmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progresstoward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours, ofwhichthreerepresentprogress toward the degree during summer.
ENGR 089 Concurrent Co-op (0) Part-time employment in a professionalorparaprofessional roleassociated withthestudent'smajor. Students registerforEngineering08XintheXthtermofemployment. Requiresfull-timestudentstatus, priorapproval ofthejobdescription by the co-op director or designee and submission of a written summaryandevaluationoftheworkexperience.Studentsareexpectedto worknoless than eight and no more than 15 hours perweek. At least

10weeksofworkmustbecompletedduringthesemesterorsummer session. May be repeated. Corequisite: Registration for at least 12 hours of course work, of which at leastsix represent progress toward a degree in engineering or computer science during fall and spring semesters;registrationforsixhours,ofwhichthreerepresentprogress toward the degree during summer.
ENGR 100 Technical Learning Skills for International Students (3) Introduces technical concepts to students for whom English is a secondlanguage.Reviewsbasicmaterialfrommathematics,physics, chemistry,andcomputerapplication withemphasison problemformulation, technical communication skills, and teamwork. Offered as needed.

ENGR 101 Introduction to Engineering (3) A hands-on introduction to civil, computer, electrical, and/ormechanical engineering. Topics include the use of the computer in engineering and an introduction to the design process. Student teams led by faculty (typically the students'academicadvisor) completedesign projectsinaparticular discipline.Prerequisite:Completion of all required Englishlanguage courses or permission of instructor. Fall.
ENGR 102 Introduction to Engineering for International Students (3) Hands-on introduction to civil,computer, electrical and/or mechanicalengineering.Includestheuseofcomputersinengineering and an introduction to the design process. Completion of a project under the direction of a faculty member. Special attention given to proper use of the English language in engineering education and practice.EnrollmentlimitedtostudentsforwhomEnglishisasecond language. Credit not given for both ENGR 101 and 102. Offered as needed.
ENGR 123 Programming for Engineers (3) Introduction to structured programming of computers in a modern high level language. Students complete programming projects which include loop and branch constructs, theuseofsubprograms,algorithm design, arrays, debugging software and techniques, file I/O and class constructs. Spring.

ENGR 189 Technical Skills (1) An independently studied laboratory course in which students carry out projects designed to teach basic technical skills in the student's field of interest. Repeatable course. Contentchanges eachtimecourse is offered.Repeatableuptothree credit hours. Prerequisite: Permission of instructor.

ENGR 212 Statics (3) Includes resolution and composition of forces and moments using vector analysis, principles and application of equilibrium to trusses, beams, frames and machines, centroid calculations,secondmomentsofareas, internalloaddetermination,shear and moment diagrams, and friction. Prerequisite: MATH-221; C- or better, or permission of instructor. Fall, spring.
ENGR 213 Dynamics (3) Covers rectilinear and curvilinear motions, force, mass, acceleration, projectiles, pendulums, inertia forces in machines, work and energy, impulse and momentum, and impact. Prerequisite: ENGR 212 with a grade of C- or better. Fall, spring.
ENGR 230 Materials Science (3) Introduces properties of materials, discussesbonding, natureofmetals, polymers,ceramics,crystalsand crystaldefects,andstructuresensitiveandinsensitiveproperties.Prerequisite: CHEM 118 or permission of instructor. Fall.
ENGR 232 Mechanics of Materials (3) Covers general principles of stress and strain, including elastic and inelastic behavior stress and straintransformation, stresscalculationsfordirectshearandtorsion; analysis ofbeambehavior, includingflexuralstressesanddeflections, combined stresses, applications involving statically indeterminate systems, and buckling ofcompressionmembers.Prerequisite:ENGR212 with a grade of C- or better. Fall, Spring.

ENGR 283 Technical Skills for Archaeologists I (2) Introduces archaeology students to skills and techniques useful in field work. Topicsincludeintroductiontosurveyingequipment,measurementof distance, horizontal angles, traverses, differentialleveling, andmapping. Prerequisite: Sophomore standing. Fall.
ENGR 352 Numerical Methods for Engineers (3) Fundamental mathematical principles and techniques of numerical methods and how to apply them, using high level computer languages, to solve engineeringproblems.Developskillsinmathematicalcomputermodelingandanalysis ofengineering problems.Prerequisites:ENGR-213 and MATH-324, both with a grade of C- or better, or permission of instructor.
ENGR 366 Fluid Mechanics (3) Introduces the physical properties of fluids and the mechanics of fluid flow. Covers general properties of fluids, fluid statics and dynamics, and dimensional analysis. Applicationsstudiedincludepipesystems,aerodynamicdrag,openchannel flow, and compressible flow. Prerequisite: ENGR-213 with a grade of C- or better. Fall, Spring.
ENGR 390 Applied Engineering Mathematics (3) Develops understanding of practical mathematical analysis with applications in various engineering disciplines. Probability and statistical analysis. Practical numerical analysis. Linear algebra and matrices. Applications in civil, mechanical, and electrical engineering. Prerequisite: MATH 222. Fall, spring, summer.
ENGR 409 Engineering Economy and Decision Making (3) Introduction to engineering economy including cash-flow, time value of money, equivalence, annuities, present and future worth, rate of return, break-even analysis, replacement analysis, and benefit cost analysis. Includesindustrial costmeasurementtechniques, riskanalysis,andprojectschedulingandmanagementtechniques.Casestudies and guests from industry offer realistic perspective.
ENGR 495 Interdisciplinary Design Project I (3) Preliminary planning and conceptual design for interdisciplinary project. Students formteamswithmembersfromseveralbranchesofengineeringand/ or other disciplines as appropriate to the project. Students participate in class discussions on professional ethics, scheduling and time management, technology and society, as developed in one of: Civil Engineering 495, Computer Science 495, Electrical Engineering 495, Mechanical Engineering 495. Prerequisites: Permission of the College of Engineering and Computer Science Interdisciplinary Project Committee plus all prerequisites listed for one of CE 495, CS 495, EE 495, ME 495. Fall.
ENGR 497 Interdisciplinary Design Project II (3) Final design and construction of interdisciplinary project.Completion of workbegun inEngineering495.Studentsformteamswithmembersfrom several branches of engineering and/or other disciplines as appropriate to the project. Teams make oral and written presentations to faculty advisorsand projectsponsor(s).Performancestandardsdevelopedin one of CE 497, CS 497, EE 497, ME 497. Prerequisites: Permission of the College of Engineering and Computer Science Interdisciplinary Project Committee; ENGR 495. Spring.
ENGR 498 Independent Study in Engineering Management (1) Independentresearchprojectinengineeringmanagement.Requires reviewofcurrentliterature, interviewswith professional representatives, and other forms ofdata collection appropriateforthe research topic withresultsdocumentedinafinal researchreport.Prerequisite: ENGR 390 or 409 and permission of instructor.

## English (ENGL)

EnglishcoursesaretaughtbythefacultyoftheDepartmentofEnglish. ENGL 110 Exposition (3) Focuses on writing skills and the larger
elements of the expository essay: development of a central thesis, organization ofmaterial, andresponsibleuseofsupportingdetail.The courseworkwillalso concentrateontheanalysis and construction of successfularguments,engagingstudentsinassignmentsandactivities that promotetheacquisition of critical reading, writing, andthinking skills appropriate to college-level discourse.
ENGL 120 Introduction to Literature (3) Provides an introduction toclosereading inthethreemajorgenres-fiction, poetry, anddrama. Students willlearntechnicalvocabularyappropriateforliteraryanalysisandwritefrequentpapersbasedonreadingandclassdiscussion.
ENGL 122 Modern World Literatures (3) Covers poetry, short fiction, novel, and drama of the 20th and 21st centuries, primarily in translation.
ENGL 210 Approaches to Literature (3) This course engages students in the analytic reading and writing that characterize the field of literary studies. Students will read intensively in multiple literary genres (e.g. poetry, short fiction, the essay, drama, memoir, and the novel), and will develop writing skills appropriate to the discipline. Thematically-based; course topics change with the instructor. Meets requirements for Enduring Foundations Outcome 2 and Writing Across the Curriculum.
ENGL 223 World Classics (3) Explores some of the world's finest imaginative literature from the age of Homer through the 19th century. Specific works vary from section to section.
ENGL 231 Masterpieces of British Literature I (3) Studies major works of British literature from 750 to 1780 . Includes such authors as Chaucer, Spenser, Marlowe, Jonson, Milton, Defoe, and Swift.
ENGL 232 Masterpieces of British Literature II (3) Examines classics of British literature from 1780 to 1945. Considers such authors as Wordsworth, Byron, Shelley, Dickens, Wilde, Lawrence, and Woolf.
ENGL 233 Masterpieces of British Literature III (3) Studies major works of British literature from 1945 to the present. Includes such authors as Beckett, Pinter, Churchill, Hughes, Duffy, Murdoch, and Rhys.
ENGL 241 Major American Writers I (3) Focuses on significant American works before the U.S. Civil War; the emphasis is on the centralfigures oftheAmericanRenaissance, includingPoe,Emerson, Douglass, Thoreau, Hawthorne, Melville, Whitman, and Dickinson.
ENGL 242 Major American Writers II (3) Covers major American works from the U.S. Civil War to World War II. The course emphasizes writers such as Frost, Eliot, Faulkner, Cather, Hughes, Hemingway, Fitzgerald, and Steinbeck.
ENGL 243 Major American Writers III (3) Covers important American works published since World War II. The course may include writers such as Toni Morrison, James Baldwin, Philip Roth, John Updike, Tim O'Brien, Allen Ginsberg, JD Salinger, Bob Dylan, and Sylvia Plath.
ENGL 300 Early English Writers (3) Studies Anglo-Saxon verse as well as major works of later medieval literature such as The Canterbury Tales, Sir Gawain and the Green Knight, Pearl, Piers Plowman, Morte D'Arthur, and lyric poetry. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 310 The Renaissance \& 17th Century (3) Covers English literaturefrom WyattandSurreythroughMilton. Prerequisite:Complete one ENGL course or permission of instructor.
ENGL 316 Modern Irish Literature (3) Studies major works of Irish literature from 1900 to the present. Includes such authors as Boland, Carr, Friel, Joyce, Kavanagh, Heaney, and OCasey. Complete one ENGL course or permission of instructor.

ENGL 330 Special Topics in Literature (3) Focuses on particular writers or a particular literary movement, subject or period. Past topics have included Fitzgerald and Hemingway, Modern Irish Literature, and JRR Tolkien. Repeatable up to three times with different subject. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 335 Children's Literature (3) Focuses on classic or "golden age" children's literature as it develops in the nineteenth and early twentieth centuries.Considersthelastinginfluenceofsuchliterature, andmayalsoinclude study ofcontemporary picturebooks and"second goldenage"texts. Includes such writers as Carroll, Barrie, Baum, Burnett, Stevenson, Sewell, Grahame, Wilde, and Milne. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 340 Contemporary World Literatures (3) Explores contemporary literature (fiction, poetry, drama) in English and English translationfromaroundtheworld.Prerequisite:CompleteoneENGL course or permission of instructor.
ENGL 343 Norse Myth, Saga, and Legend (3) Studies the Eddas and sagas ofNorwayandlcelandplus relatedworkselsewhereinnorthern Europe. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 344 Masterpieces of Russian Literature (3) Explores the great works of 19th and 20th century Russian literature with focus on such writers as Pushkin, Gogol, Turgenev, Dostoyevsky, Tolstoy, and Chekhov. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 348 Women's Literature: Special Topics (3) Focuses on women writers in a variety of genres and contexts. Repeatable up to 3 times with title change. Topics have included: 20th Century American Women Novelists, Modernism in Women's Literature, and The Works of Jane Austen. Prerequisite: One ENGL course or permission of instructor.
ENGL 350 Shakespeare (3) Studies 8 of Shakespeare's greatest plays. This course engages with histories, the comedies and the tragedies. Prerequisite:CompleteoneENGLcourseorpermission of instructor.
ENGL 351 The British Novel (3) Explores the development of the British novel with focus on such major authors as Defoe, Goldsmith, Austen, Bronte, Dickens, Hardy, Joyce, and Woolf. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 352 Young Adult Novel (3) Explores the contemporary young adultnovel in context of the developing novel. Emphasizes diversity of genre and cultural/social context, and may include such authors as Alexie, LeGuin, Dickens, L'Engle, Meyer, Rowling, and Yang. Prerequisite:Completeone ENGL courseorpermission of instructor.
ENGL 353 The American Novel (3) Surveys several landmark achievements inthe American Novel. This course may includeworks by Melville, James, Cather, Fitzgerald, Hemingway, Faulkner, and others. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 361 African-American Literature (3) Focuses on significant texts and major aesthetic achievements of the African-American tradition, as well as their historical contexts. Includes politically and socially significant drama, poetry, short stories, novels, and essays. Prerequisite:Completeone ENGLcourseorpermission ofinstructor.
ENGL 370 Age of Enlightenment (3) Studies eighteenth-century British figures such as Pope, Swift, Johnson, Boswell, Sheridan and Goldsmith. Prerequisite: Complete one ENGL course or permission of instructor.

ENGL 375 The Romantic Movement (3) Covers major English writ-
ers from 1789 to 1837. Emphasizes Wordsworth, Coleridge, Byron, Shelley and Keats. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 380 The Victorian Period (3) Explores British literature from 1837 to 1901, with emphasis on the Victorian writer as poet, sage, and novelist. Includes such authors as Barrett, Browning, Tennyson, Newman, Gaskell, and Dickens. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 385 The Twentieth Century (3) Focuses on various authors, genres, andliterarymovements inthetwentieth century, depending on the emphasis chosen by the professor. Past topics have included American immigrant literature and European modernism. May be taken two times by permission of instructor. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 399 Independent Study in Literature (1-3) Provides the opportunity to do an independent study in English-language literature. This course might beone-on-one with a designated professororina small group. Prerequisite:Complete one ENGL course or permission of instructor.

ENGL 445 Critical Theory (3) Introduces students to the key fields of critical theory and the major theorists within those fields. Prerequisite: Complete one ENGL course or permission of instructor.
ENGL 480 Literature \& Its Relations (3) Relates a body of literature to theoretical and/or artistic works of kindred disciplines. Specific topics vary from semester to semester. Capstone course for English majors. Prerequisite: Complete one ENGL course or permission of instructor.

ENGL 495 Capstone Experience in Critical Theory(3)Introduces students to the key fields of critical theory and the major theorists within those fields. Emphasizes personal reflection on connection between general education and literary study.

## English Language (EL)

English language courses are taught by the faculty of the Intensive English Center. Enrollment is limited to students whose native language is other than English. A nonnative speaker of English may use up to nine hours of English language courses as elective credit if the student's program of study permits free electives.
EL 102 Pronunciation and Listening Comprehension (2) Focus on pronunciation problems and aural comprehension skills. Listening dictationwithemphasisonnote-takingskillsisamajorpartofcourse. Offered first half of each semester.
EL 103 Academic Conversation and Speaking (2) Focus on ability toparticipateeffectively inopendiscussionsandingiving speeches. Emphasisonlisteningtolecturesandcomprehendinganddiscussing main ideas. Continued pronunciation practice included. Oral presentations mayberequired. Offeredthe second halfofthe semester.
EL 106 Reading Development (2) Emphasizes a number of reading skills including skimming, inference, and dictionary usage. AppropriatefortheUniversitystudentwhohas learned English as aforeign language. Reading selections may be both prose and non-prose. Vocabularydevelopmentandreadingcomprehensionthroughcontext emphasized. Offered the first half of each semester.
EL 107 Advanced Reading (2) Expands upon skills learned in English Language 106andenablesstudentstoimprovecomprehension ofacademicwriting.Readingselectionsmaybeboth proseandnon-prose. Classactivities includediscussion, group work, projects, and written exercises. Offered the second half of each semester.
EL 110 Fund of Composition (3) For students whose primary lan-
guage is not English. Provides instruction in writing English sentences, well-organized paragraphs,shortcompositions,andresearch paperformat.Attentiongiventoallaspectsofcomposition-sentence structure, grammar, vocabulary, spelling, and punctuation.
EL 111 Advanced Composition (3) For students whose primary language is not English. Builds on writing skills studied in English Language 110 and applies these to compositions, reaction papers, andresearch papers.Emphasiscentersonvocabularychoice, syntax, conciseness, andreader-interesttechniques.Prerequisite:EnglishLanguage 110 ordemonstrated proficiencyonaUEadministeredwriting placement exam.

## Environmental Studies (ES)

Environmentalstudiescoursesaretaughtbyfacultymembersofvarious departments.
ES 103 Fundamentals of Environmental Science (3) Introduces interdisciplinary nature of problems relating to the human environment, including social, political, and economic aspects.
ES 240 Alternative Energy \& Energy Efficiency (3) The student team in this course will study current and developing alternative energy technologies to learn about the feasibility of installing them in commercial and residential buildings in Evansville. They will gain hands-onexperiencebytakingclientsfromthecommunityandthoroughly evaluating their buildings' energy use, its available solar and wind resources, waste heat, and power and heating needs. They will do calculations to determine feasibility of using various alternative energyandenergyefficiencytechnologiesandmakerecommendations on their implementation.
ES 299 Special Topics in Environmental Studies (1-4 credits) Lecture, discussion, and/or lab devoted to a topic not covered in regular environmentalstudiescourses.Topicsvarydependingoninterests of facultyandstudents.Mayberepeated.Prerequisitesannouncedwhen scheduled. Fall, spring.
ES 360 Science of Environmental Pollutants (3) Using discussion formatandstudent presentations, courseclarifies the sources of pollutantsandtheirtransportintheenvironmentanddiscussesmonitoring and remediation of pollution. Special attention given to pollution of theatmosphere,surfacewater,andgroundwater.Presumesafamiliarity withecologicalconcepts.Somediscussion ofimportantlegislation related to pollution incorporated. Prerequisite: CHEM 118. Recommended: BIOL 118 or ES 103
ES 440 Environmental Law and the Regulatory Process (3) Analysis of political and organizational processes that influence theformulation, implementation, and evaluation of public policy. Focus placed onecosystems, population, biodiversity, andglobalaswellasdomestic governance. Prerequisites: BIOL 118 or ES 103; PSCI 143.
ES 441 Alternative Energy \& Energy Efficiency (3) The student team in this course will study current and developing alternative energy technologies to learn about the feasibility of installing them in commercial and residential buildings in Evansville. They will gain hands-onexperiencebytakingclientsfromthecommunityandthoroughly evaluating their buildings' energy use, its available solar and wind resources, waste heat, and power and heating needs. They will docalculationstodeterminethefeasibility ofusingvariousalternative energyandenergyefficiencytechnologiesandmakerecommendationsontheirimplementation.ES441 is appropriateforstudentswho wanttoearn400-levelcreditforthealternativeenergycourseandwill assumealeadership/managementroleinthecourse.Studentswhodo not want a leadership role are encouraged to enroll in ES 240.
ES 495 Environmental Studies Internship (1) (3-8 credits) Field experiencefor environmental studies majors under the supervision
of a professional in an environmentally related area. Prerequisite: Written application for internship must be received by the environmental studies program director prior to beginning the internship. Fall, spring.
ES 499 Advanced Special Topics in Environmental Studies (1-4 credits) Lecture, discussion, and/or lab devoted to an advanced topic not coveredinregularenvironmentalstudiescourses.Topicsvarydependingoninterestsoffacultyandstudents.Mayberepeated. Prerequisites announced when scheduled. Fall, spring.

## Ethics and Social Change (ETH)

Ethics and Social Change courses are taught by faculty members of the Department of Philosophy and Religion.
ETH 121 Introduction to Ethics (3) Presents a systematic and historical discussion of moral and social values through classical and contemporaryreadings.Emphasisonapplyingmoraltheoriestoconcrete moral problems.
ETH 200 Social Justice Movements (3) This course provides an introductiontotheroleofworldreligionsinawiderangeofliberation struggles and social justice movements from around the globe.
ETH 201 Comparative Religious Ethics (3)Provides a comparative introduction to religious moral thinking, paying attention to the basis, nature, content, and consequences of ethical thought and the religious traditions that address them.
ETH 300 Writing for Social Justice and Social Change (3) In this course students will use public writing and critical thinking as a means to create positive social change. Students will identify a social justice issue that deeply concerns them, research the issue, and engage in brainstorming, organizing, drafting, revising, and editing to produce texts that can be used in efforts towards equity, inclusion, and change. Prerequistie: FYS 112.
ETH 301 Selected Topics in Ethics and Social Change (3) Studies selected topics related to ethics. Specific topics may vary each time the course is taught. May be repeated for credit as the selection of topics changes. Prerequisite: One course in ethics, philosophy, or religion; or permission of instructor.
ETH 305 Bible and Justice (3) Explores the Bible's relationship to contemporary social justice issues. Topics include issues linked to social identity (race, class, gender, sexuality, etc.) as well as global diversity (poverty, globalization, human rights). Prerequistie: FYS 112.

ETH 316 Environmental Ethics (3) Presents a systematic discussion of environmental ethics and key issues therein. Emphasis on applying moral theories to concrete moral problems. Prerequisite: FYS 112.
ETH 317 Bioethics (3) Considers selected problems in bioethics. Topics may include abortion, euthanasia, and genetic engineering. Prerequisite: Junior or senior standing, FYS 112 or permission of instructor.
ETH 345 Complex Systems (3) Studies non-linear dynamics involved in multi-agent systems. Focuses on basic complex systems concepts (e.g., adaptability and resilience, constraint, diversity, self-organized criticality, etc.) insofar as they characterize collective behavior in natural and social systems. Specific topics may include collective intelligence and decision making, beliefpropagation, prejudice reduction, and civil unrest. Prerequisite: Major or minor in Ethics and Social change and junior or senior standing or permission of the instructor. Spring.
ETH 375 Social Change Field Experience (3) Offers students the opportunity for supervised field experience in an area of work
directly relevant to ethics and social change, under the direction of a member of the Ethics Committee. To be completed by the end of sophomore year. Prerequisite: ETH 121. Open only to students majoring or minoring in Ethics and Social Change.

ETH 421 Ethical Theory (3) Studies ethical theories from historical and contemporary perspectives. Examines foundational ethical questions from a theoretical perspective. Sample topics include reasons to be ethical, moral realism and moral relativism, moral agency, ethics in relation to religion, law, and politics, etc. One other course in ethics or permission of instructor. Upper division standing recommended.
ETH 445 Religion, Peace \& Justice (3) Provides in-depth engagement with religious approaches to ethical concerns in the social sphere, especially related to questions of war and peace, violence and nonviolence, and economic and social justice. Predominantly focused on the Christian tradition, the course will also include engagement with significant figures in selected other religious traditions. Prerequisite: FYS 112 or permission of instructor.
ETH 475 Social Change Field Experience (3) Offers advanced students the opportunity for supervised field experience in an area of work directly relevant to ethics and social change, under the direction of a member of the Ethics Committee. Prerequisite: ETH200. Junior or senior standing. Open only to students majoring or minoring in Ethics and Social Change.
ETH 491 Direct Study in Ethics Social and Change (1) Offers the opportunityforindependentresearchinspecial problemsunderthe direction of a member of the ethics faculty. Repeatable course. Content changes each time course is offered. Prerequisite:Permission of instructor.
ETH 499 Ethics and Social Change (3) Provides opportunity for integration of the academic study of ethics with a particular ethical problem. Prerequisite: Senior standing and ETH 121, ETH 200 and ETH 375, or permission of instructor.

## Exercise and Sport Science (EXSS)

Exercise and sport science courses are taught by the faculty of the School of Public Health.
EXSS 112 Human Anatomy and Physiology 1 (4) First half of a two-semester course that provides a comprehensive study of the structure and function of the human body, from the cell to theentire organism.Usesasystems approachemphasizinghowthesesystems work together to maintain homeostasis. Systems studied include: integumentary, skeletal, muscular, digestive, reproductive. Three hours lecture, two hours lab.
EXSS 113 Human Anatomy and Physiology 2 (4) Second half of a two-semestercoursecontinuesstudyofthestructureandfunction of thehumanbodyusingasystemsapproach.Systemsstudiedinclude: nervous, endocrine, circulatory, immune, respiratory, urinary. Three hours lecture, two hours lab. Prerequisite: EXSS 112 with a grade of C- or better.

EXSS 150 Introduction to Health Sciences (2) Overview of the career opportunities available in exercise and sport science. Each student develops a personal profile which includes factors that influence an individual'scareerchoice.Includedinthisprofileisthedevelopment of both a personal and professional philosophy, assessment ofone's lifestyle preferences, plusa professional research projectinone's preferred career choice.

EXSS 201 Intro to Sport Management (3) This course introduces the studenttothesportmanagementprofession.Primaryfocus is onthe sportindustry,including professional sportentertainment, amateur sport entertainment, for-profit sport participation, nonprofit sport
participation,sportinggoods,sportstourismandsportservices.This classwill providethefoundationforconcepts relatedtothemanagement, marketing, legal and social aspects of sport management.
EXSS 211 History of Sport (3) Using interacting influences of economics, environment, nationalism, norms and values, philosophy, politics, religion, and technology, the evolution of physical activity and sport is investigated. Concentration is placed on Western Civilization and American sports. Special attention devoted to modern Olympic Games.
EXSS 218 Social Aspects of Sport (3) Explores the social roots of sport in contemporary society. Studentthinkscriticallyaboutsports toidentifyandunderstandsocial problemsandissuesassociatedwith sports in society. This class examines issues of physical performance and records to see sports as social constructions that influence how people feel, think, and live. Emphasis is placed on American sport and society.
EXSS 220 Essentials of Human Anatomy \& Physiology (4) Provides the essential details of anatomy and physiology of the body systems. Topicsandsystemscoveredincludecells,tissuesandorgans, grossanat-omy,andphysiologyofthenervous,endocrine,cardiovascular,respiratory, urinary, digestive, reproductive, muscular, and skeletal systems.
EXSS 222 Youth Fitness \& Health Awareness (2) Students apply professional skills working with young people of various ages from theEvansvillecommunity.Studentsparticipateininteractiveeducationalworkshops. Theworkshopsincreaseknowledgeandencourage healthy lifestyle choices in the youth of Evansville.
EXSS 244 Practicum (1) A directed experience for the student who demonstratesacareerinterestinoneofthemajorsoffered withinthe Department of Exerciseand Sport Science. Prerequisite: EXSS 150 or consent of instructor.

EXSS 245 Practicum (1) A directed experience for the student who demonstratesacareerinterestinoneofthemajorsoffered withinthe Department of Exerciseand SportScience. Prerequisite:EXSS 150 or consent of instructor.

EXSS 250 Officiating (1) Covers rules and procedures for officiating and providesopportunitiesforIHSAA certification in specificsports. Also offers practical experience in officiating.
EXSS 255 Recreational Sports Programming (2) Examines the fundamentalaspects ofarecreational sports programinvariedsettings. These settings include educational, industrial, correctional, public/ private, commercial, andmunicipal.Upon completion ofthiscourse, studentsunderstandtournamentandfacilityscheduling, participant development,equipmentconcerns,legalandfinancial concerns,and other aspects of recreational sports programming.
EXSS 310 Sport Law \& Ethics (3) Provides students with an overview of US lawand how it applies to the sport industry. Topics include tort law, contract law, anti-trust law, and constitutional law. It also helps students learn to question, reason, and think in a fashion that will aid them in ethical dilemmas they may face in their future careers. Prerequisite: EXSS 150 or permission of instructor.

EXSS 320 Nutrition for Performance \& Health (3) Provides an overview of the important concepts of nutrition that are required forathletic performanceand general health benefits.Currenttopics in nutrition, team nutrition, performance, ergogenic aids, and diets reviewed and critiqued. Prerequisite: Permission of instructor.
EXSS 350 Sport Facility and Event Mgt (3) The purpose of this course is to educate students with a broad knowledge infacility and event management. Students will learn fundamental skills that are necessaryfor sportmanagerstorunafacilityorhostanevent.Topics include management theory, planning, facility systems, site design,
volunteermanagement,andsocial responsibility.Prerequisites:EXSS 150; or permission of instructor.
EXSS 352 Physiology of Exercise (3) Introduces the physiological changesassociatedwithexerciseandsporttraining.Concentrateson cardiorespiratory, muscular, and metabolic adaptations to training, and how thesechanges affecthuman performance. This coursealso examinestheinfluenceofenvironmentalfactorsandergogenicaids upon exercise and athletic performance. Prerequisites: EXSS 112, 113 or 220.

EXSS 355 Practicum Intramural-Recreational Sports (1) Because coursefocusesonpracticalapplication ofrunningrecreationalsports programs,studentsare requiredto(1) plan,implement, and research new and existing events and sports offered within the existing UE intramural program; (2) areon-siteduring many of the eventstogain supervisoryexperienceineventmanagement;and(3)receiveindividual instruction from the intramural director and staff. Prerequisite: EXSS 255.
EXSS 356 Biomechanics (3) Covers principles of anatomy, physiology,physics, andotherrelatedsciences appliedtoanalysis ofmotion. Prerequisites: Junior or senior standing; PHYS 100 or 121.
EXSS 383 Cur Dev. Lifetime Fitness Act. (3) Provides an understanding of the concepts, movements, skills, and abilities needed to teachand participateinvarioushealth-relatedfitness andrecreational activitiesthroughoutlife.Alsogivesstudentanopportunity toteach various health-related fitness and recreational activities to diverse populations. Prerequisite: EXSS 112 and 113, or 220.
EXSS 384 Lifeguarding (2) Provides the knowledge and skills necessaryforthestudenttorecognizeandeliminateorminimize potential dangers at various types of swimming and diving facilities. Course content includes American Red Cross CPR certification for the professional rescuer. Additionally, the American Red Cross certification is available to successful candidates. Prerequisite:Permission of instructor.

EXSS 388 Exercise Prescription (3) Introduces and examines the anatomicandphysiologicprinciplesforprescribingexercise.Emphasis onskills requiredto evaluatefitnesslevels anddevelop programsfor various components offitness, including cardiorespiratory, flexibility, body composition, and strength for a variety of populations. Prerequisites: Junior or senior standing; EXSS 352; or permission of instructor.

EXSS 400 Principles Theories Strength \& Conditioning (3) Provides practical skills necessary to design strength and conditioning programs. Special emphasis placed on ability to evaluate exercise movements, prescribeappropriateexerciseprograms,administertests, and support program prescription with a sound knowledge of anatomicaland physiologicaladaptationtoexercise.Includeslaboratory experiences that teach skills such as how to organize speed, agility, andquicknessdrills;howtoselectandadministerappropriatetestsfor athleticperformance;andhowtoevaluateOlympicliftingtechnique. Prerequisites: EXSS 112 and 113,352 and 388.
EXSS 415 Exercise Physiology II (2) A continuation of Exercise and SportScience352.Focuses on cardiovascular, respiratory, andmetabolicresponsestoexercise.Emphasisonproperlaboratorytechniques, data collection, and data interpretation. Prerequisite: EXSS 352.
EXSS 417 Advanced Exercise Science (3) Provides an in-depth study of selected topics not contained in the required course work. Topics chosen from the following areas:anatomy,biomechanics, statistical analysis, andexercise physiology.Prerequisites:EXSS352;orpermission of instructor.

EXSS 427 Exercise Testing \& Leadership (2) The application of exer-
cisephysiologyandprescriptiontoexaminethephysiologicresponses toexercise.Emphasisisplacedonappropriatetestingmethodologies, formulation ofexerciseprescriptions, andsafeexerciseleadershipin a diverse population of individuals. Prerequisites: EXSS 352, 388; current CPR; or permission of instructor.
EXSS 428 Cardiac Rehab (3) A study of pathophysiology of common heartdiseaseswith concentrationinthedesignimplementationand administration ofmultidimensionaltherapeuticcardiacrehabilitation program.
EXSS 451 Exercise/Sport Psychology (3) Provides an overview of the rapidlydevelopingfieldsofexerciseand sportpsychology, including psychologicalaspectsofsportperformanceandpsychometriccharacteristics of sport participants. Topics inthisclass includetherelationshipofexercisetomentalhealth.Specialemphasisontheoreticaland research issues important in the field of sport psychology is given. Prerequisites: Junior or senior standing or permission of instructor; PSYC 121.

EXSS 452 Adapted Physical Ed for K-12 Grades (3) Provides instructioninappropriateteachingmethodsandstrategies ofincorporating appropriategames andactivitiesforchildrenwith special needs. Studentslearntodevelopandimplementanadaptedphysicaleducation curriculumforchildreninelementarythroughhighschool.Prerequisite: Junior or senior standing or permission of instructor.
EXSS 453 Motor Learning (2) Provides an overview of the factors that affect the acquisition and performance of motor skills. Topics include the neural basis of human movement, perception, psychomotor learning and theories of neuromuscular integration, information processing, and individual differences. Methods for structuring the learning environment for optimal learning also discussed. Prerequisites: EXSS 356 or permission of instructor.
EXSS 482 Curriculum Development in Individual and Team Sports (3) Provides a comprehensive understanding of the teaching of individual and team sports. Also offers students the opportunity to teach the movements and skills needed to participate in lifetime individual sports, as well as the ability to design and implement lesson plans. Focus of course on secondary physical education. Prerequisites: EXSS 112 and 113, or 220.
EXSS 488 Internship (2-12 credits) Provides the exercise and sport sciencemajorpracticalexperienceinaspecializedcareerarea.Fosters developmentofskills, competencies, andorganizationalandadministrative techniques needed for successful entry into the work force, whileworkingunderdirectsupervision ofselected professionals.Prerequisites: Exercise and Sport Science 150 for sport communication and sport management majors; EXSS 352, 388, and current CPR for all exercise science majors.
EXSS 491 Planning/Implement Coaching (2) Provides an in-depth overviewofthecompetenciestocoachinaspecificsportarea.Covers advancedtechniquesforteaching,coaching,and performing.Prerequisite: Junior or senior standing.

EXSS 493 Current Issues Exercise \& Sport Science (3) The capstone course for all majors in the department. Discussion topics include research methodology, the use of basic statistics and other selected areas ofresearch design.Studentslearntocritically read andevaluate research papers. Additionally, discussion and writing focuses on the current and future status of the student's career choice in today's society. Prerequisite: Final year status for majors in the department.
EXSS 499 Special Topics Exer Sport Science (1-3 credits) Provides students the opportunity to study topics of special interest not covered in regular course offerings. Topics announced. Course may be repeated, butthetopicmustbedifferent. Prerequisite:Permission of
instructor.
EXSS 221L Applied Human Anat/Phy Lab (2) Utilizes an in-depth regionalapproachtothestudy ofhumananatomythroughtheuseof previously dissected human cadavers. Prerequisites: EXSS 112, 221; or permission of instructor.
EXSS 321L Applied Human Anat/Phy Lab (2) Utilizes an in-depth regionalapproachtothestudyofhumananatomythroughtheuseof previously dissected human cadavers. Prerequisites: EXSS 112, 221; or permission of instructor.

## Experiential Education (EXED)

EXED 071 Internship (0-1) Full-time or part-time employment for a period of 10-16 weeks in a professional or paraprofessional role associated with the student's major. Requires prior approval of the job description by the co-op director or designee and submission of a written summary and evaluation of the work experience. May be repeatedforatotal ofthreeexperiences.Prerequisite:Atleast 18hours ofcourseworkofwhichatleastninehoursrepresentprogresstoward degreecompletionandmusthavebeentakenduringtheprevioustwo academic terms.

EXED 072 Internship (0-1) Full-time or part-time employment for a period of 10-16 weeks in a professional or paraprofessional role associated with the student's major. Requires prior approval of the job description by the co-op director ordesignee and submission of a written summary and evaluation of the work experience. May be repeatedforatotal ofthreeexperiences.Prerequisite:Atleast 18hours ofcourseworkofwhichatleastninehoursrepresentprogresstoward degreecompletionandmusthavebeentakenduringtheprevioustwo academic terms.
EXED 073 Internship (0-1) Full-time or part-time employment for a period of 10-16 weeks in a professional or paraprofessional role associated with the student's major. Requires prior approval of the job description by the co-op director ordesignee and submission of a written summary and evaluation of the work experience. May be repeatedforatotal ofthreeexperiences.Prerequisite:Atleast 18hours ofcourseworkofwhichatleastninehoursrepresentprogresstoward degreecompletionandmusthavebeentakenduringtheprevioustwo academic terms.
EXED 090 Building a Professional Image (0-1) Seminar for second yearstudentsseekinganinternshiporconsideringenteringtheco-op programforthefirsttime. Coversjob interviewing, résumé preparation, currently availableinternandco-opjobs, anddetailsof program administration. Application for admission to the co-op program is part of this seminar. Fall, spring.

## Finance (FIN)

Finance courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.
FIN 280 Introduction to Personal Finance (3) Covers information that allows students to begin their working careers well informed of theirfinancial responsibilities. Covers the fundamentals of personal finance andemphasizes the lifecycle approach to personalfinancial planning. Primary goals of course are (a) make participants aware of need to plan their financial future and (b) increase their knowledge ofthe various aspects of personal finance in orderto plantheirfinancial future effectively. Major topics are managing assets, credit and insurance, investments, andretirementplanning.Helpsparticipants
beginlifelongjourneytowardfinancialliteracy.Offered periodically. FIN 361 Fundamentals of Finance (3) Introduces core principles of time value of money, risk return analysis, financial forecasting, and security valuation. Analyzes foundations of capital budgeting techniques, cash flow estimation, taxation, and depreciation methods. Prerequisites: ACCT 210; ECON 102; or permission of instructor.

FIN 362 Corporate Financial Policy (3) Examines the capital budgeting, financing, dividend policy, and working capital decisions of value-maximizing firms with use of casestudies. Prerequisite:Grade of C- or better in FIN 361. Spring.
FIN 380 Special Topics in Finance (3) Covers topics not included in other courses, provides in-depth understanding of selectedareas in finance, and explores relevant current topics. Repeatable course. Content changes each time course is offered. Prerequisite: Grade of C- or better in FIN 361. Offered periodically.
FIN 383 Credit Analysis Lending Practicum I (3) This course sequenceisanexperientiallearning programthatengagesstudents directly with a participating lending institution. Students will team withsupervisingfacultyand commerciallending professionalsinthe processofassessingapplicationsforcommercialloans,formulation of lending decisions, and execution of the lending process. Additional emphasisisontheeffectsoflendingoutcomesonthebank'sfinancial statements. A maximum of 3 credit hours of practicum from FIN 383, 384,385 , and 386 will apply as an upper level elective in the major areaperdegreeforstudentspursuingtheBachelorofSciencedegreein Accounting;theBachelorofSciencedegreeinBusinessAdministration; ortheBachelorofSciencedegreewithamajorineconomics.Additional hours will count as free electives. Prerequisite: Grade of C-or better in FIN 361 or permission of instructor.
FIN 384 Credit Analysis Lending Practicum II (3) This course sequenceisanexperientiallearning programthatengagesstudents directly with a participating lending institution. Students will team withsupervisingfaculty andcommerciallending professionalsinthe processofassessingapplicationsforcommercialloans,formulation of lending decisions, and execution of the lending process. Additional emphasisisontheeffectsoflendingoutcomesonthebank'sfinancial statements. A maximum of 3 credithours of practicum from FIN 383, 384,385 , and 386 will apply as an upper level elective in the major areaperdegreeforstudentspursuingtheBachelorofSciencedegree in Accounting; the Bachelor of Science degree in Business Administration;ortheBachelorofScience degree with a majorineconomics. Additional hours will count as free electives. Prerequisite: Grade of $B$ or better in FIN 383.
FIN 385 Wealth Management Practicum I (2) This course sequence is an experiential learning program that engages students directly with individual clients in a participating wealth management firm. Studentswillteam withsupervisingfacultyandwealthmanagement professionalsintheprocessofclientconsultation,formationofclients' investmentobjectives,executionofportfoliostrategies,andevaluation of investment outcomes. A maximum of 3 credit hours of practicum from FIN 383, 384, 385, and 386 will apply as an upper level elective in the major area per degree for students pursuing the Bachelor of SciencedegreeinAccounting;theBachelorofSciencedegreeinBusinessAdministration;ortheBachelorofSciencedegreewithamajorin economics.Additionalhourswillcountasfreeelectives.Prerequisite: Grade of C- or better in FIN 361 or permission of instructor.
FIN 386 Wealth Management Practicum II (2) This course sequence is an experiential learning program that engages students directly with individual clients in a participating wealth management firm. Studentswillteam withsupervisingfacultyandwealthmanagement professionals in the process of client consultation, formation of
clients'investmentobjectives,execution of portfoliostrategies, and evaluation of investment outcomes. A maximum of 3 credithours of practicum from FIN $383,384,385$, and 386 will apply as an upper level elective in the major area per degree for students pursuing the Bachelor of Science degree in Accounting; the Bachelor of Science degreeinBusinessAdministration;ortheBachelorofSciencedegree with a major in economics. Additional hours will count as free electives. Prerequisite: Grade of B or better in FIN 385.
FIN 395 Independent Study (1-3) Independent research in finance conducted under faculty supervision. Prerequisites: Grade of C- or better in FIN 361, permission of instructor.
FIN 426 International Financial Management (3) Analyzes foreign exchange,currencyfutures,andoptionsmarkets.Examinesaspectsof internationalbanking,bond,andequitymarketsfromtheperspective ofmultinationalcorporationsandinstitutions. Prerequisites:Gradeof C- or better in ECON 101 and 102. Recommended: FIN 361.
FIN 427 Financial Derivatives \& Alt Investments (3) The course introduces financial derivatives and their applications. Topics include features of primary financial derivatives (forwards, futures, swaps, and options), the basics of derivatives analysis, and the structure of their markets. The course also covers some advanced topics in investment strategies and risk management; includes discussion of alternative investments and investing in commodities. Prerequisite: Grade of C- or better in FIN 361 or MATH 330.
FIN 455 Financial Analytics (3) This course covers topics such as computer-based modeling and forecasting and the use of analytics in auditing and consulting practices. Uses spreadsheets and other software products to analyze the impacts of financial decisions related to financial statement analysis, cash budgeting, and cost of capital determination, capital budgeting, and capital structure choices. The course covers a variety of techniques, such as sensitivity and scenario analysis, optimization methods, Monte Carlo simulation, and regression analysis. Same course as ACCT 455. Prerequisite: C- or better in both ACCT 310 and FIN 361.

FIN 462 Investments (3) Develops the principles governing investment of personal funds based on modern capital market theory. Common stocks, bonds, options, and futures contracts analyzed. Prerequisite: Grade of C- or better in FIN 361.
FIN 470 Financial Institutions/Markets (3) The operation and management offinancial institutions and the markets in which they operatediscussed.Managerialand public policyissuestowardfinancial institutions and markets also addressed. Prerequisite: Grade of C- or better in FIN 361. Offered alternate years. Same as ECON 470.
FIN 478 Risk Management (3) Examines the principles and terminologiesofinsurance.Analyzesvarietyofinsurancecontractsandrisk management plans. Discusses the public policy issues related to the insurance industry. Prerequisite: Grade of C- or better in FIN 361. Offered periodically.
FIN 482 Financial Planning: Process/Environment (3) Financial planning principles, areas, application, process, effective communication, riskevaluations, ethicsand practicestandards, financial planning problem solving, regulations,financialinstitutions. Prerequisite: Grade of C- or better in FIN 361. Offered periodically.

## First-Year Seminar (FYS)

The First-Year Seminar Sequence is the cornerstone of the Enduring Foundations General Education program. The courses aretaught by faculty members from all of the University's colleges and schools.
FYS 111 First Year Seminar (3) Topic-based seminar developed by individualfacultymembers.Engagesstudentsinclassroomactivities that promotetheacquisition of critical reading, writing, andthinking
skillsappropriatetocollege-leveldiscourse.Towardthatend,students willlearnthebasics oftheexpositoryessay:developmentofacentral thesis, organization of material, and responsible use of supporting detail.

FYS 112 First Year Seminar (3) Topic-based seminar developed by individualfacultymembers.Engagesstudentsinclassroomactivities that promotetheacquisition of critical reading, writing, andthinking skillsappropriatetocollege-leveldiscourse.Towardthatend,students will complete a significant research paper. Prerequisites: Placement based on ACT/SAT scores, Grade of C or better in FYS 111 or FYS 111E.

FYS 312 Writing Across the Disciplines (3) First Year Seminar for transferstudents. Engages studentsinclassroomactivitiesthat promote the acquisition of critical reading, writing, and thinking skills appropriatetocollege-leveldiscourse.Towardthatend,studentswill learnthebasics oftheexpositoryessay:developmentofacentralthesis,organization ofmaterial, andresponsibleuseofsupporting detail. Additionally, they will explore a variety of genres as well as writing practices and conventions for disciplines across the university.
FYS 499 Teaching Internship (3) Offers students the opportunity for supervised field experience in teaching at the college level.
FYS 111E First Year Seminar for EL Students (4) All sections of FYS 111 and 111E engage students in activities that promote the acquisition of critical reading, writing, and thinking skills necessary in collegiate discourseas wellas in professional and personal contexts. Toward that end, students will learn the basics of the expository essay:development of a central thesis, organization of material, and responsible use of supporting detail with emphasis on the writing process and rhetorical situation. First Year Seminar for EL Students provides additional structured support for ESL students in order to aid in the transition to college level courses that are reading and writing intensive.

## Foreign Languages and Cultures (FLC)

Foreign Languages and Cultures courses aretaught by the faculty of the Department of Foreign Languages and Cultures.
FLC 201 International Road Film (3) This course centers on the international road film. We will focus on the aesthetics as well as the content of the road film, in order to examine the genre as an art form and to explore different cultures. What can we learn about the literal, linguistic, political, national, historical, cultural, gendered, classed,etc.landscapes/geographies through which the characters travel? What causes them to travel? How do the films define travel? Film selections to be discussed come from the U.S., France, Germany, India, Latin America, Mongolia, Bhutan, Russia, Hungary, and Jordan.
FLC 230 Ethnic/Racial Representations (3) The course focuses on cross-cultural representations of the "other" in Hispanic/German/ French/Francophonecultures.Topicsvary.Canberepeatedwithcontent change. Representations of Native Americans, Asians, Africans, African Americans, Afro-Germans, Hispanics, Jews, Arabs, Islanders, etc. in world film and literature will be analyzed.
FLC 301 Topics in German, Austrian, Swiss Studies (3) This course is offered in English for non-German minors and majors. Topics vary. Repeatable course with content change. Topics range from aspects of German film, the Alps, crime novels, biographies, YA literature in translation, Berlin, Vienna, Bern, Kafka, Bachmann, Soccer and German identity, to other aspects of German, Austrian, and Ger-man-speaking Swiss culture and society.
FLC 333 Topics in Diaspora Studies (3) Course engages with issues of the diasporic experience as represented in literary, filmic, and
other cultural products. This course is offered in English by Foreign LanguagesandCulturesfaculty.Topicsvary.Coursemayberepeated with content change.
FLC 360 Language and Intercultural Competence (3) This online course focuses on the interpersonal dimensions of intercultural communication across different contexts. It introduces foundational concepts in this area of study (e.g., culture, communication, intercultural communication) and explains a deeper understanding and appreciation of what it means to be an intercultural communicator. This course addresses the way the language system is put to use in social encounters between human beings who have different first languages, communicate in a common language, and represent different cultures, unfamiliar communication styles, and different expressions of politeness.
FLC 361 Intercultural Citizenship (3) As our world and local communities have become more diverse and interconnected it is vital for all humans to make an effort to respect one another and live in harmony. This course combines the relational (focus on others), (trans)national and critical perspectives of intercultural competence with the civic action in the community component of citizenship education. This course focuses on practical dimensions of intercultural communication in everyday life in social interactions in multicultural environments, and the skills and attributes needed to become an intercultural mediator. It aims at developing an individuals intellectual appreciation for cultural differences and sensitivity regarding intercultural interactions.
FLC 401 Language/Literature/Culture (3) Capstone course for foreign language and international studies majors. Seminar examines how the concept of national identity is reflected cross-culturally in language and literature. Topics vary. Course taught in English.
FLC 420 Foreign Languages \& Cultures Internship (1-3) Students mustcompleteaninternshipapplicationandcontractwiththe Internship provider. Theseforms mustbeapproved by the FLCadvisorand the FLC department chair. To count as a 400 -level language course, students musttake 3 credits (even ifitis divided into differentinternships). Prerequisite: FLC major or minor.

## French (FREN)

FrenchcoursesaretaughtbythefacultyoftheDepartmentofForeign LanguagesandCultures.Allcoursesaretaughtinthetargetlanguage unlessotherwisenoted.Completion of311 orpermissionofinstructor required for all 300-and 400-level courses.
FREN 111 Elementary French I (3) Emphasizes practice in speaking, listening, writing, reading and cultural awareness. Fall (111), spring (112).

FREN 112 Elementary French II (3) Emphasizes practice in speaking, listening, writing, reading and cultural awareness. Fall (111), spring (112).

FREN 211 Intermediate French I (3) Continues practice in speaking, listening, writing, reading and cultural awareness. Fall (211), spring (212).

FREN 212 Intermediate French II (3) Continues practice in speaking, listening, writing, reading and cultural awareness. Fall (211), spring (212).
FREN 311 Conversation \& Composition (3) Includes oral-aural practice, free and directed composition and review of syntax. A prerequisite for all 300- and 400-level courses.
FREN 312 French Conversation in Context (3) Advanced oral practice and analysis of non-literary texts. Focus on pronunciation and
phonetics. Prerequisite: FREN 212.
FREN 313 French Phonetics (3) This course teaches students the theoryandpracticeofFrench pronunciation,includingchangingsounds and syllable structure when words are combined into phrases and sentences. It will also allow students to compare French and English phonetics. Students will learn and identify geographic and social variation in the pronunciation of French speakers.
FREN 314 Business French (3) Emphasizes speaking, writing, reading, and listening skills in business contexts as well as cross-cultural communication and comparison of French and American business cultures.
FREN 315 Intro French Literature (3) Studies French culture in literarycontext.IntroducesstudentstoFrenchliterature,literaryanalysis and discourse.
FREN 316 Quebec \& Francophone Studies (3) Introduces the literary, political, economic, and cultural traditions of Quebec and the Francophone world.
FREN 317 Intro French Theatre (3) Introduces students to major authors, periodsandconventions ofFrenchtheatre.Emphasizesconversation, composition, and reading skills and includes an introduction to literary analysis and discourse.
FREN 318 Translation (3) Introduces theory and practice of written translation in French cultural context. Includes translation of documentsfromthefollowing fields:law, medicine, business, entertainment, industry and technology, literature. Prerequisites: Two 300-level courses or permission of instructor.
FREN 330 Independent Study (1) Course content and credit hours determined in consultation with instructor. May be repeated with content change. Prerequisite:French 311 or permission of instructor. Department chair approval required.
FREN 333 Intro French/Francophone Cultures (3) Introduces French andFrancophonecultures,relatinghistoricaleventsandgeographical settings to the evolution of the language. Offered alternate years.
FREN 335 Foreign Lang Study Abroad (1) Foreign Language Study Abroad. Repeatable with content change.
FREN 415 Topics in French Literature (3) In-depth examination of French literature by author, period, and/or genre. Emphasizes advanced application of literary analysis and discourse. Topics vary. Coursemayberepeatedwith contentchange.Prerequisites:Two300level courses or permission of instructor.

FREN 434 French Civilization (3) Study of French civilization,art and culture from origin to present. Taught in French.
FREN 435 Foreign Lang Study Abroad (1) Used for study abroad course credit.

FREN 438 Adv French Language Seminar (3) Topics vary. Generally coversoutstandingFrenchauthorsandliteraryworks.Coursemaybe repeatedwith contentchange.Prerequisites:Two300-levelcoursesor permission of instructor.

## Gender and Women's Studies (GWS)

Core,cross-listed,andaffiliatedgenderandwomen'sstudiescourses are taught by faculty members of various departments.
GWS 101 Introduction to Gender, Women's, and Sexuality Studies(3) Through readings, films, and class discussion, students engage in a critical examination of theories of gender and their social implications. By examining their own experiences as well as the ways in which they fit, or do not fit, into the patterns revealed through gender, womens, and sexuality studies scholars, students arrive at a better understanding of the relationship of all
genders to the society at large.
GWS 492 Special Topics in Gender, Women's, and Sexuality Studies(3) Special topics in gender and women's studies not included in regular course offerings. May consist of lectures and discussion with an emphasis on research. May be repeated for a maximum of six credit hours. Prerequisite: GWS 101 or permission of instructor.

GWS 493 Independent Studies in Gender, Women's, and Sexuality Studies(3) Research in areas of gender, womens, and sexuality studies on topics not covered in existing courses. Subject and credit earned must be approved by a faculty member, coordinator of gender, womens, and sexuality studies, and dean of the College of Arts and Sciences. May be repeated or a maximum of six credit hours Prerequisite: Junior standing or permission of coordinator of Gender and Women's Studies.

## Geography (GEOG)

Geography courses are taught by the faculty of the School of Education.

GEOG 120 World Regional Geography (3) Introduction to regions oftheworldsuchasAnglo-America, WesternEurope,EasternEurope and the former Soviet Union, Monsoon Asia, Africa, and others. Emphasizes themes which give each of these regions a distinctive character.

GEOG 230 Physical Geography (4) Studies and analyzes the distributionofmajorelementsofthephysicalenvironment,includingearth inspace,earthmotions,timezones, theearth'satmosphericenvelope, topography, and mapping. Includes lab experience.
GEOG 240 Cultural Geography (3) Examines human technologies and cultural practices which give regions distinctive character. Emphasizes process of settlement and development and how the resulting cultural landscape varies through time and over space.

## Geology (GEOL)

Geology courses are taught by faculty members of the Department of Mechanical and Civil Engineering.
GEOL 130 Environmental Geology (3) A study of the relationship between humans and earth processes, such as earthquakes and volcanoes, geologic structures, plate tectonics, mountains, ocean basins,streams, glaciers, deserts,coasts,rocks, minerals,andmineral resources.

## German (GERM)

German courses are taught by the faculty of the Department of Foreign Languages and Cultures. All courses are taught in the target language unless otherwise noted. Completion of 311 or 312 is required for the major or minor. Students placing into 311 or above may automatically sign up for the upperlevel course offered their incoming semester.
GERM 111 Elementary German I (3) Emphasizes practice in speaking, listening, writing, reading, and cultural awareness. Fall (111), spring (112).

GERM 112 Elementary German II (3) Emphasizes practice in speaking, listening, writing, reading, and cultural awareness. Fall (111), spring (112).
GERM 211 Intermediate German I (3) Continues practice in speaking, listening, writing, reading, and cultural awareness. Fall (211), spring (212).
GERM 212 Intermediate German II (3) Continues practice in speaking, listening, writing, reading, and cultural awareness. Fall (211), spring (212).

GERM 311 Conversation and Composition (3) A systematic grammar review while focusing on the process and development of effective writing skills and expression in German. Pre-requisite: $P$ C- or higher in 212 or proficiency in 212 . Fall.

GERM 312 Topics in German Studies (3) Topics vary. Course may be repeated with contentchange.TopicsrangefromaspectsofGerman filmandtheAlps,tocrimenovelsandbiographies, tootheraspects of German cultureand society. Prerequisite:German 311 orpermission of instructor.
GERM 314 Career German (3) Studies the specialized vocabulary and nature of career German.

GERM 321 Survey of German Literature to 1830 (3) Readings for broadoverviewofliterarydevelopmentinGerman-speakingEurope.
GERM 322 Survey of German Literature From 1830 to Present (3) Readings for broad overview of literary development in Ger-man-speaking Europe.
GERM 330 Independent Study (1) Content and credit hours determined in consultation with instructor. May be repeated with content change. Prerequisite: German 311 or permission of instructor. Department chair approval required.
GERM 333 Introduction to German Culture (3) Introduces the studenttotheimpact of historical eventson Germanart, music, cinema, and literature.
GERM 335 Foreign Lang Study Abroad (1) Used for study abroad credit.
GERM 410 Advanced German Grammar (3) Primarily for German majors and minors. Emphasizes aspects of grammar important for high school instruction in the language.
GERM 414 20th-21st Century Literature (3) In-depth examination of major German, Austrian, and Swiss writers of the 20th and 21st centuries.

GERM 433 German Civilization (3) Traces history and culture of German-speaking Europefrombeginningstothepresent.Taughtin German.

GERM 435 Study Abroad (1) This is a 400-level course that is taught in the targetlanguate in a study abroad program and whose content does not match closely any of the 400-level courses offered in the department of foreign languages and cultures. Meets the 400-level majorrequirement.Mustbeapprovedbydepartmentchairforequivalency priortostudyabroad experience.Repeatablecourse.Content changes each time course is offered. Prerequisite: GERM-311 or 312.
GERM 438 Seminar (3) Outstanding German authors and literary works. Topics vary. Course may be repeated with content change.

## Gerontology (GT)

Gerontology courses are taught by the faculty ofthe Department of Law, Politics, and Society.
GT 225 Lifespan Development (3) This course will focus on the development of individuals across the lifespan. Beginning with prenatalandearlyinfancydevelopment,thecoursewillprogressthrough adolescence,adulthood, and topics in death and dying.Material will include aspects of physical, cognitive, social, personality, and emotional development. This class will place an emphasis on theoretical models and experimental findings. The course adopts a discussion format withtextbook, primary readings, reaction papers, and aterm paper. Prerequisites: PSYC 121.
GT 401 Biology, Health, and Personality Dimensions of Aging (3) This course covers the basic biological, health, and personality factors related to aging. Topics include life course changes, nor-
mal aging, nutrition, aging related diseases, frailty, incontinence, cognition, anxiety and depression, dementia, and personality changes. Prerequisite: SOC 105, 230, or GT 225 OR permission of instructor or Director of the Gerontology Center.

GT 403 Later Life and Spirituality (3) This course covers key issues facing elders and their families in later life related to health care, death, and the spiritual needs of elders. Topics include: dying, ethical issues, end-of-life reviews, and the role of religion over the life course. Prerequisite: SOC 105, 230, or GT 225 OR permission of instructor or Director of the Gerontology Center.
GT 405 Institutional Care and Geriatric Assessment (3) This course covers the various institutional settings serving the needs of elders, as well as issues related to geriatric assessment. Topics include: assisted living, residential and home-based care, community based long-term care, designing physical environment for elders, comprehensive geriatric assessment, specific functional assessments, and geriatric assessment instruments. Prerequisite: SOC 105, 230, or GT 225 OR permission of instructor or Director of the Gerontology Center.
GT 407 Economics of Aging and Social Policies (3) With the impending retirement of the millions of Baby Boomers, understanding the economic, political, and social issues related to the elder population becomes ever more important to individuals in society. This course is a comprehensive and balanced assessment of economic issues, social policies, and their impact on everyone, old and young. Prerequisite: SOC 105, 230, or GT 225 OR permission of instructor or Director of the Gerontology Center.
GT 410 Special Topics in Gerontology (3) Examines specific topics in aging and the life course chosen on the basis of programmatic need or faculty interest. May be repeated up to 6 hours given different course content. SOC 105, 230, or GT 225 ; OR permission of instructor or Director of the Gerontology Center
GT 411 Aging and Elders in Film 93) This course will explore the ways that films reflect and create social constructs for later life, and examine the bias, stereotypes, and other limitations employed by film as a medium. In addition, the course will analyze films depiction and construction of aging across the life course through an intersectional lens of gender, class, race and ethnicity, (dis)ability, and sexual orientation. Finally, the course will identify ways that films and directors both expose social constructs and challenge them in a way to expand human rights. SOC 105,230 , or GT 225; OR permission of instructor or Director of the Gerontology Center
GT 496 Internship (1-6) Students may elect to complete a commu-nity-based internship in a setting serving the elderly. Prerequisite: Completion of at least six modules in the Gerontology Certificate Program or permission of director of Gerontology Center.

## Greek (GRK)

Greek courses are taught by faculty members in the classical studies program.

GRK 111 Elementary Ancient Greek I (3) Presents the basic grammar, syntax and vocabulary of ancient Greek so that students can begin reading passages from ancient authors. Fall (111), spring (112) in alternate years.
GRK 112 Elementary Ancient Greek II (3) Presents the basic grammar, syntax and vocabulary of ancient Greek so that students can begin reading passages from ancient authors. Fall (111), spring (112) in alternate years.
GRK 211 Intermediate Ancient Greek (3) Continues to develop skills in the grammar, syntax and vocabulary of ancient Greek begun in

Greek 111 and 112. Reading of extended passages from Herodotus, Plato, Thucydides, and the Gospel of John.
GRK 212 Introduction to Greek Prose (3) Reading of prose texts in both Attic and Hellenistic Greek. Emphasis on reading a variety of literary genres and prose styles. Students also review and enhance their knowledge of Greek grammar. Texts include the Tabula of Cebes, Lysias' On the Murder of Eratosthenes, Paul's letters, and the book of Acts.
GRK351 Attic Prose(3) Anadvanced ancient Greekcoursededicated to the reading, analysis, and discussion of Attic prose texts of the 4th century B.C. Authors read depend on student interest and may include Aristotle, Plato, Lysias, and Isocrates.
GRK 371 New Testament Greek Exegesis (3) An advanced Greek course devoted to the reading and exegesis of the New Testament in the original language. Emphasis on gaining competence in koine Greek, skill in exegesis and literary analysis, and facility in the use of scholarly tools for New Testament study.
GRK 411 Ancient Greek Drama (3) Advanced ancient Greek course dedicated to the reading and analysis of Greek plays. Authors read dependonstudentinterest;mayinclude:Aeschylus,Sophocles,Euripides, and Aristophanes. Prerequisite: GRK-212.
GRK 421 Greek Poetry (3) An advanced ancient Greek course dedicated to reading Greek poetry. Students read a variety of Greek poets and poems, gain exposure to several different Greek dialects, andlearnabout poeticmeterandscansion. Authors readdependon studentinterestandmayincludeHomer,Hesiod,Sappho,andSolon.
GRK 430 Individual Readings in Greek Literature (1) Topics and credithours mustbe prearranged with the instructor.Repeatableas texts and topics change.

## Health Education (HE)

Health education courses are taught by the faculty of the School of Public Health.
HE 100 Concepts of Health and Wellness (1) Examines the role of physical activity and personal fitness for healthy daily living in our society.Lecture, discussionandself-evaluationlaboratorysessionsare used to assess personal fitness. This course satisfies the health and wellness graduation requirement.
HE 111 Medical Terminology (1) Utilizes guided independent studentlearningactivitiestoteachthebasic prefixes, suffixes, androots of medical terms. Assists student in utilizing medical terminology appropriately in both written and verbal forms. Fall, spring.
HE 160 First Aid With CPR (2) Provides basic American Red Cross first aid and cardiopulmonary resuscitation certification for adult, child, and infant.
HE 360 The School Health Program (3) Examines issues related to school healthservices, theenvironment, education, andtheteacher's potential role in each of these areas.

## Health Sciences (HS)

HealthsciencescoursesaretaughtbythefacultyoftheDuniganFamily School of Nursing. Courses are open to all University students.
HS 101 Adult Health and Wellness (1) Focuses on a holistic approach toahealthylifestyle.Emphasizesassessment, management, andindividualresponsibilityinpromotingpersonalhealth.Meetsthegeneral education Health and Wellness requirement. Fall, spring.
HS 200 Humanity-Sanity and Insanity: Media Impact (3) This course willexamineandevaluatemassmediaportrayal ofmentalhealthand mental illness. Class activities are coordinated to stimulate thought
and discussion on a variety of viewpoints. Students will examine the historicalimpactmassmediahasonpublicopinionsrelatedtomental illnessandinfluencesonthetreatmentofmentalillness.Variationsin massmediaportrayalacrosscultureswillbeexaminedthroughgroup discussions.Studentswillevaluatepersonopinions relatedtomental healthandillnessandchangesinperceptionsasthecourseprogresses.
HS 205 Pharmacology (3) Survey course provides a foundation inthe basic principles of pharmacology with emphasis on knowledge and interventionsneededtomaximizetherapeuticeffectsand preventor minimize adverse effects ofdrugs. Builds on the knowledge of physiology, chemistry, and psychologyto understand theaction ofdrugs in the human body. Prototype drugs used to teach basic principles of select drug classifications and drug action on biologic systems. Placement:Sophomorelevel.Prerequisites:CHEM 108orequivalent; EXSS 112, 113.

## Health Services Administration (HSA)

Healthservicesadministrationcoursesaretaughtbythefaculty ofthe School of Public Health.

HSA 405 Health Care Systems: Issues and Trends (3) Overview of the health care system. Reviews the history and current status of various segments of health care. Includes ananalysis oftheimpact of socioeconomic, political, and current health care issues and trends.
HSA 406 Jurisprudence and Ethics in Health Care (3) Emphasizes thelegalandethical processesandtheirapplicationtothehealthcare organization,administrator,staff,employees, and patients.Includes ethicaldimensionsofthedecision-makingprocessandcurrentethical issues in health care.
HSA 414 Health Care Management Theory and Human Resources (3)Managementtheoryand practiceasappliedbymanagersofhealth services.Emphasizesanalysisofthemanager'sroles, interactionswith people,theorganization, andtheenvironment.Specialemphasison human resource issues.
HSA 420 Health Care Planning and Marketing (3) Integrates longrange goal planning with dimensions of marketing for health care services.Concepts,techniques,andtheoriesusedintheplanningand management of marketing in the health care industry.
HSA 467 Statistics Appraisal and Evaluation (3) Focuses on the analysis ofdatacommontohealthcare.Includesdatadescription,elementsofprobability, distribution ofrandomvariables, estimationand confidenceintervals, binomial andnormaldistributions, hypothesis testing, contingency tables, regression analysis, and ANOVA.
HSA 490 Decision Making in Health Care (3) Examines decision making in health services administration by extensive use of case studies. Integrates material from otherHSA courses into the study of decisions facing all types of health care organizations.
HSA 495 Independent Study (1) Independent research in health care managementconductedunderfacultysupervision.Prerequisite:Permission of the instructor.

HSA 498 Internship in Health Services Administration (1) A structuredassignmentwhichallowsstudenttogainpracticalexperiencein ahealthcaremanagement position relatingto anarea ofcareerinterest.Studentis directed bytheinternshipdirectorandsupervised bya memberofthecooperatingorganization. Prerequisite:Permission of health services administration program director.
HSA 499 Special Topics in Health Services Administration (1) Lecturesanddiscussion oftopicsnotcoveredinregularcourseofferings. Provides greaterdepthtotopicsofspecialinterestorexploresrapidly changing areas in health services administration.
History (HIST)

History courses are taught by the faculty of the Department of History.
HIST 111 World History to 1500 (3) Examines major political, religious, and cultural developments in Asia, Africa, the Mediterranean basin, Europe, and the Americas from ca. 3000 BCE to 1500 CE. Throughacombination oflectures,classdiscussion, andclosereading of primary sources, coursefocusesonhowgeography, climate,social structures, and cultural values combine to shape political systems, religion, and gender relations in diverse societies.
HIST 112 World History Since 1500 (3) Guides students through the key forces shaping the modern world, and adopts a broad global approach tothe period, paying appropriate attention to Asia,Africa, and the Middle East as well as to Europe and the Americas. Includes thestrugglefordemocracy,theemergenceofcapitalismandsocialism, theexperienceofimperialismandracism, andrelateddevelopmentsin science, culture, and gender relations.
HIST 141 American History to 1865 (3) Surveys political, economic, social, and military developments in the United States from the time of exploration and the founding of the colonies to the end of the Civil War. Pays particular attention to slavery, the frontier, the rise of democracy, the roots of secession, and issues of class, ethnicity, and gender.
HIST 142 American History Since 1865 (3) Surveys political, social, economic, and cultural developments in the United States from the end of the Civil War to the present day. Special attention to the impact of industrialization, the crisis of the Great Depression, race relations, gender, and foreign policy.
HIST 290 Approaches to History (3) Examines the evolution of the field ofhistory.Exploresquestionsconcerningthenature ofthedisciplineandstudiestheprinciplesofhistoricalmethodology.Focuseson questionsofhowhistoriansgatherandevaluateevidenceandconsiders directions the discipline is currently taking. Intended for history freshmen and other beginning history majors.

HIST 311 The Greeks and the East (3) Examines the historical relationshipbetweentheAncientGreeksandtheircontemporariesinthe Near East. Prerequisite: Sophomore standing or HIST 111 or 312 or permission of instructor.
HIST 312 The Evolution of Rome (3) Examines the history of Rome from the early republic to the end of the imperial era. Focuses on internal sources of stability and Rome's success in integrating the empire. Prerequisite: Sophomore standing or HIST 111 or 311 or permission of instructor.
HIST 313 Medieval Europe 410-1350 (3) Introduces students to the history and culture of Western Europe and the Mediterranean between 410 and ca. 1350. Traces the collapse of the western Roman Empire in the mid 5th century, the evolution of civilizations of Byzantium, Islam and western Christendom, and the fusion of Roman, Christian, and Germanic elements that create medieval Europe. Prerequisite: Sophomore standing or HIST 111 or 312 or permission of instructor.
HIST 314 Renaissance and Reformations: Europe 1350-1648 (3) Examinesunderlying causes ofnewmodes ofartisticandintellectual expression,expansionintotheNewWorld, andtheaggressivepursuit of scientific knowledge in Europe during this period. Also explores whythe promiseofthe Renaissanceand "liberty" ofthe Reformation co-existed with a Europe racked by vicious religious wars, peasant revolts, and "other" (e.g., witches, heretics, homosexuals, Jews). Prerequisite: Sophomore standing or HIST 111 or 313 or permission of instructor.
HIST 316 Europe in the 18th Century 1774-1850 (3) Examines
the economic, social, political and cultural history of Europe in the eighteenthcentury, with particularemphasisoneconomicandsocial changes in both town and country. Considers the role such changes playedintheorigins, courseandcontinent-wideimpactoftheFrench Revolution. Prerequisite: HIST 112, HIST 314 or permission of instructor.

HIST 317 Napolean to Bismarck: Europe 1800-1890 (3) Explores the impact of the industrial revolution on urban and rural life in Europe, paying particular attention to changes in the distribution of wealth thatoccurredduringthis periodand the political and cultural responses to those changes. Prerequisite: HIST 112 or permission of instructor.
HIST 318 The First World War (3) Examines the causes, course, and consequences of the First World War. Traces the roots of the war to the European power politics of the 1870 s, and follows the consequences up to the rise of fascism. In studying the war itself, focuses ontheexperienceofindividualsinvolved,womenandmen, combat-antsandnon-combatants.Includesextensivediscussion of painting, poetry, sculpture, photography, and the novel. Prerequisite:Sophomore standing or HIST 112 or 317 or 381 or permission of instructor.

HIST 319 The Second World War (3) Examines the origins, courses, and results of the Second World War, with focus on the experience of the individual caughtupinoneof the mosthorrific experiences of the 20th century. Studies the rise of Nazism and fascism throughout Europe as the key to understanding the origins of the war. Includes discussion of painting, poetry,sculpture, photography, andthenovel. Prerequisite: Sophomore standing or HIST 112 or 318 or permission of instructor.

HIST 320 Women's Lives in the Pre-Modern World (3) Studies the histories ofwomenindiversesocieties priorto 1800including parts of western Europe, Asia, the Americas, and the Middle East. Pays close attention to gender relations, the role of religion in determining the status and treatment ofwomen, howtheeconomicspace (oritslack) forwomenshapestheirexperiencesandhowwomenareabletowield influence, power, or authority in public and private spheres. Prerequisite: Sophomore standing, GWS 101 or permission of instructor. This course counts toward the Gender and Women's Studies Minor.

HIST 321 Islam and the West in the Middle Ages (3) Examines relationships between Islamic and Christian civilizations from the 7th through the 14th centuries from the perspectives of the Islamic Empires.Explorestheevolution of Islamic religion, political, cultural, and scientific exchanges and their long-term impacton both societies. Pays special attention to the rise and collapse of various Muslim empiresandhowtheCrusadescreatednotonlyconflict,butopportu-nitiesfortradeandintellectualexchangesaswell.Prerequisite:Sophomore standing or HIST 111 or 313 or permission of the instructor.
HIST 322 The French Revolution: Origins, Course, and Impact (3) Examines the economic, social, political, and cultural history of Europe in the 18th century, with particular emphasis on economic andsocialchangesinbothtownandcountry.Considerstherolesuch changes played in the origins, course, and continent-wide impact of the French Revolution. Prerequisite: HIST 112 or 314 or permission of instructor.

HIST 323 The United States and the Middle East, 1919-Present (3) Examines the legacy of Wilson's policy for the Middle East and how itshapedUnitedStates decolonization policyfollowing World WarlI. Considerstheemergenceofindependentstates,includinglsrael, and theconflictsbetweennationsandnon-stateactorssince 1945.Studies the United States' role in the Middle East and considers how this has helped shape the current state of affairs in the area. Prerequisite: Sophomore standing.

HIST 324 The Emergence of Modern China and Japan Since 1600 (3) Examinesthedistincthistoricaldevelopmentsandmodernization of both China and Japan as well as the intersection of their cultures, economies, and politicalinstitutions. Outlinesthedevelopmentand eventualdeclineoftheQingdynastyandtheTokugawashogunatein the face of western imperialism. Traces the divergent paths taken by the two countries in their efforts to challenge Western domination, assertnationalindependence,andestablishregionalstrength.Prerequisite: Sophomore standing.
HIST 340 Crime, Punishment, and the Law in Early America 16071861 (3) Introduces students to the legal history of early America from the colonial period until 1861. Analyzes crime and punishment, the unwritten law, intersections of the law and economics, and laws affecting marginalized peoples. Pays particular attention to court cases as indicators of larger legal trends. Prerequisite: Sophomore standing or HIST 141 or 342 or permission of instructor.

HIST 343 The Civil War and Reconstruction (3) Studies the events leading to the Civil War. Examines the economic, political, social, and military aspects of the war and considers the post-war period of Reconstruction. Prerequisite: Sophomore standing or HIST 141 or 142 or 341 or permission of instructor.
HIST 344 The American Revolution (3) Examines the social, cultural, political, andmilitarydevelopmentsinAmerica's revolutionary period from 1754 through the ratification of the Constitution in the late 1780 s. Particular emphasis will be placed upon the causes and consequencesoftheAmericanRevolution, includingtheideological origins of the conflict. Prerequisite: Sophomore standing or HIST 141 or 340 or permission of instructor.
HIST 345 United States Foreign Policy Since 1776 (3) Broad understanding ofthe main developments in American diplomatichistory. StudentsengageseveralmajorthemesinUnitedStatesforeignpolicy andlearnhowtheseinteractbystudying specificeventsthroughout the history of America's involvement in the world. Discusses United Statesinteractionwithnationsoneverycontinentandthroughoutthe centuries, looking for inconsistencies in these interactions and their impactoncurrentglobalissues.Prerequisite:Sophomorestandingor HIST 141 or 142.

HIST 348 The Great Crash and Great Depression: U.S., 1919-1941 (3) ExaminesthecausesoftheGreatDepression, comparesitto previouseconomiccrises, comparestheresponses ofHooverandRoosevelt tothedepression, anddiscussestheorigins, development,andimpact of the New Deal. Prerequisite: Sophomore standing or HIST 142 or 319 or permission of instructor.
HIST 349 Cold War America: 1945-1990 (3) The Cold War shaped American society, politics, foreign policy, economics, and culture in profound ways that must reviewed in the context of the American struggle with the Soviet Union. Important international conflicts such as the Korean War and the Vietnam War will be examined. Significanteventssuchasthecivilrightsandwomen'srightsmovements will beinvestigatedalong with cultural and political transformations that shaped the period. Prerequisite: Sophomore standing or HIST 142 or 348 or permission of instructor.
HIST 351 Atlantic World Since 1492 (3) Examines how the peoples of Europe, Africa, North America, and South America forged a unique Atlantic community between 1492 and 1800. Pays special attention to the exploration and colonization of the Americas, including the developmentofslavesystems andimperialgovernance.Prerequisite: Sophomore standing or HIST 112 or 354 or permission of instructor.
HIST 354 History of the Caribbean to 1900 (3) Explores the development of Caribbean societies from the late eighteenth century to
the late nineteenth century. Analyzes the gradual disintegration of the plantation system as a result of internal and external forces. Uses a comparative approach to study internal migrations, creolization, plantation economies, natural disasters, crime, and emancipation. Prerequisite: Sophomore standing or HIST 112 or 351 or permission of instructor.
HIST 380 Topics in History (3) Explores specialized topics in history in a lecture-discussionformat. Repeatable course. Content changes each time course is offered. Prerequisite: Sophomore standing or permission of instructor.
HIST 381 Modern Britain: Challenge, Continuity, and Change, 1815 to Present (3) Studies British politics and society during a period of remarkablechange, as Britainacquiredthebiggestempireinhuman history and then lost it, while progressing from being a country that fought wars with its European neighbors to one that was close to the heart of the European Union. Covers religion, gender, politics, race, sport, art, and literature. Prerequisites:Sophomorestanding or HIST 112 or 317 or permission of instructor.
HIST 383 Modern Scotland: Politics, Culture, and Identity, 1707 Present (3) Studies the development ofScotland over 300 years from thepoliticalunionwith England, throughthe Enlightenmentandthe Industrial Revolution, to the two world wars and modern political devolution. Includesstudy ofculture, religion, society, andliterature. Prerequisite: Sophomore standing or HIST 112 or 381 or permission of instructor.
HIST 385 Ireland and the Irish Diaspora (3) Studies the history of Ireland and Irish emigrant communities from the Middle Ages to the present day. Focus primarily on the years since 1700 and pays particularattentiontopolitical andsocial history, includingthestrugglefor independence,emigrationanditscauses, andthechangingfortunes oflrishcommunitiesoverseas, especially inNorthAmerica. Prerequisite: HIST 112 or permission of instructor.
HIST 418 War, Politics, and Gender (3) Examines various aspects of warfare in the Middle Ages, including weapons and tactics, the circumstances precipitatingorpreventingwar,theroles ofthechurch in shaping the intellectual and ethical framework of warfare, and the involvement of women in war as both armed and unarmed participants. Prerequisite: HIST 313 or 321 or permission of instructor. This course also counts toward the Gender and Women's Studies Minor.
HIST 429 Voices from the Land: Rural Life Europe, and North America, 1780-1900 (3) Comparative study of select rural communitiesduringtheageofindustrialization.Specialattentiontothethemes of social class, folk culture, gender relations and rural politicization, especiallyinthecontextofstrugglesforlandreformstimulated bythe radical politics oftheage.Incorporatesoriginalaccountsoflifeonthe land from European and American sources. Prerequisite:HIST 111 or 112 or 141 or 142 or 317 or 342 ; consent of instructor.

HIST 438 War, Death, and Memory 1914-1939 (3) Investigates the impact of the First World War's enormous death toll on European society, and in particular its impact on Christianity. Examines how societies responded to death both formally and informally. Studies the evolution, meaning, and impact of war memorials, as national, civic, and individual loci for grieving. Prerequisite: HIST 112 or 142 or 317 or 318.
HIST 450 The Decolonization of Africa, 1919-Present (3) Examines the various paths that African peoples havetakento attain independence from European colonial powers. Takes an in-depth look at the writings, political activities, and violent struggles of several African societies astheychallengedtheircolonialmasters.Assessestherelativesuccessorfailureoftheseindependencemovements.Prerequisite: Junior standing or HIST 112 or permission of instructor.

HIST 480 Topics in History (3) Explores specialized topics in history, usingtheseminarformat.Repeatablecourse.Contentchangeseach time course is offered. Prerequisite: Junior standing, completion of three history courses, and permission of department chair.
HIST 490 Senior Seminar in History (3) Enables history majors to applytheprinciplesofhistoricalmethodologylearnedinHistory290, in the preparation of a major research paper. Required for history majors. Prerequisite: Senior standing or permission of instructor.
HIST 491 Independent Study in History (1) Research and/or focused reading for history majors and minors on topics not sufficiently coveredinthe regularcourseofferings. Mayberepeatedforamaximum ofsixhours. Prerequisites:Junior standing; permission of instructor.
HIST 492 History Internship (1) Supervised field experience in agencies such as archives, historic preservation agencies, historical museums, or similar locations of direct relevance to a history major. Prerequisites:Sophomorestanding;permissionofdepartmentinternship coordinator.
HIST H378 Britain and the Middle East to 1922 (3) Explores the role played by Britain in shaping the modern Middle East by focusing on British attempts to solve the "Eastern Question" - namely, deciding the fate of the Ottoman Empire. Examines the extent to which this effort provoked the rise of Arab nationalism and Islamic fundamentalism. Prerequisite: HIST 112 or permission of instructor.
HIST H379 Africa and British Imperialism, 1815-1919 (3) Explores the role Britain played in shaping modern Africa and the reactions of Africans to this foreign intervention. Prerequisite: HIST 112 or permission of instructor.

## Honors (HON)

Honors courses are taught by faculty members from all the University's colleges and schools.
HON 110 Special Topics in Honors (1) Varied topics of special interest.Mayberepeated.Prerequisite:MustbeenrolledintheUniversity Honors Program. Junior or senior standing required for enrollment in HON 310, 410.
HON 210 Special Topics in Honors (1) Varied topics of special interest.Mayberepeated.Prerequisite:MustbeenrolledintheUniversity Honors Program. Junior or senior standing required for enrollment in HON 310, 410.
HON 211 Interdisciplinary Perspectives in Honors (1) Honors students will examine a single topic from various interdisciplinary perspectives. Instructors from various fields will deliver lectures on the central topic of the course, but within the framework of their specificfield, thereby integrating interdisciplinaryperspectivesona singular topic. Honors students enrolled in Honors 211 are required to simultaneously be enrolled in one of the various Honors Interdisciplinary Perspectives courses (HON 212-218). Honors students are encouraged to take this course during their sophomore year.
HON 212 Honors Interdisciplinary Perspectives in Imaginative Expressions(3) Honors students will engage with literary and imaginative expressions of the human condition within historical and cultural contexts.Studentswillbeencouraged to critically evaluateand appreciatethevalue, meaning, andsignificanceofliteraryworks. This course will emphasize responding to works in writing that reflects clear and critical thinking. Although the central topic of the course might vary, the broad approach and goals of this course described herein will remain constant. Honors students enrolled in HON 212 are required to simultaneously be enrolled in HON 211. Honors studentsareencouragedtotakethiscourseduringtheirsophomoreyear.
HON 214 Honors Interdisciplinary Perspectives in Fundamental

Beliefs (3) Honors students will engage with material related to critically considering fundamental beliefs about human identity, core values, and humankind's place in the world. Although the central topic of the course might vary, the broad approach and goals of this course described herein will remain constant. Honors students enrolled in HON 214 are required to simultaneously be enrolled in HON211.Honors students areencouraged totakethis courseduring their sophomore year.
HON 218Honors Interdisciplinary Perspectives in Scientific Literacy (3) Honors students will learn of the fundamental facts, laws, and theories ofascientificdisciplineand developanabilitytoreasonand solve problems using scientific concepts. Students will learn about various interdisciplinary connections of the scientific discipline to society (past, present, and future). Although the central topic of the course might vary, the broad approach and goals of this course described herein will remain constant. Honors students enrolled in HON 218 are required to simultaneously be enrolled in HON 211. Honors students are encouraged to take this course during their sophomore year.
HON 310 Special Topics in Honors (1) Varied topics of special interest.Mayberepeated.Prerequisite:MustbeenrolledintheUniversity Honors Program. Junior or senior standing required for enrollment in HON 310, 410.
HON 410 Special Topics in Honors (0) Varied topics of special interest. May be repeated. Prerequisite: Must be enrolled in the University Honors Program. Junior or senior standing required for enrollment in HON 310, 410.

## Integrated Business and Engineering (IBE)

IBE 350 Project Management (3) This course examines project management concepts, processes, planning, and implementation. Students will learn project management steps and apply them to real and hypothetical work projects. Concepts related to leadership of teams, problem solving, and change management within organizations will be utilized to ensure project plans are successfully developed and implemented. Prerequisite: BUS 100 or ENGR/CE/EE/ME 101 with a minimum grade of C.
IBE 360 Sustainability in Business \& Engineering (3) Course focuses on current problems of sustainability from both the business and engineering perspective. These complex issues include social, economic, and environmental sustainability, such as the use of renewable resources, green energy, trustworthy suppliers, triplebottomline reporting, and more. Students will learn how to develop strategies to provide responsible, transparent, and accountable solutions to these issues. Prerequisite: BUS 100 and ENGR/CE/EE/ME 101 with a minimum grade of C.
IBE 400 New Product Design \& Development(3) This course focuses on the intersection of marketing, design, and manufacturing in creating a new product. Students will learn to understand the market demands for new products and the processes undertaken to research, design, create, and deliver new products to the market. The course emphasizes the roles of multiple functions (e.g. marketing, finance, industrial design, engineering, production) and the need to coordinate interdisciplinary tasks to develop and launch a successful new product. Prerequisite: MKT 325 and MGT 369 with a minimum grade of C.

## Interdisciplinary (ID)

Interdisciplinary courses provide instruction in topics requiring understanding from the perspectives of several disciplines.
ID 105 Science and Math in the Environment (2) This hands-on, interdisciplinary course is designed to introduce students to skills in
biology, chemistry, physics, and math and their applications in the environment. Students will explore conservation issues, pollution problems, and how alternative energy works. Students will plan a project to make a real difference in the local environment and write afinalpaperbasedonin-depthresearchonanenvironmentalscience topic. In addition, therewillbelaboratoryactivities, discussions, and problem-solving exercises. Thecourseoffersagoodintroductionto study in any science or math-related major.
ID 106 Excelling in Science and Mathematics (1) ID 106 is designed tohelpstudentslearnthestudyandtesttakingskills neededtoexcel in a college math or science major. Topics for this course will include: effectivecommunication, activereading, notetaking,learningstyles, career services and research opportunities in math and science.
ID 111 Structures and Materials of World Cultures (3) An overview of structural behavior and material science as related to structural types and building materials of historical interest. Three hours lecture. Prerequisite: MATH 105 or higher. Spring.

ID 120 Computers in Science and Mathetmatics (1) This hands-on, interdisciplinary course is designed to introduce students to important data visualization, analysis, and presentation skills in biology, chemistry, physics and mathematics. The course will emphasize real-life scientific problems and applications pertaining to environmental issues. The course will be arranged into several modules, each focused on a different topic. These modules will emphasize active learning through laboratories, discussions, critical thinking, and data visualization, analysis, and oral presentation. Students will develop the important data visualization and communication skills that are emphasized throughout the curriculum in their majors and their expected careers.
ID 121 Introduction to Scientific Computing (1) This interdisciplinary course is designed to introduce students to basic computing concepts, data analysis using high-level programming languages, and data visualization presentation in biology, chemistry, environmental science, physics and mathematics. The course will use programming languages that see widespread use in the sciences and are also simple to learn for beginners. The course will introduce computing to students by examining important scientific data sets from the past or present day. Students will develop important data and visualization skills that are emphasized throughout the curriculum in their majors and their expected careers. Students will complete one mini-project per week in class.
ID 122 This course is a continuation of ID 121: Introduction to Scientific Computing. In this course students will advance their coding skills necessary to perform open ended analyses. Students will be expected to operate more independently of their instructors than in ID 121. The course culminates in a data analysis project on a topic picked by the student.
ID 200 International Cinema (3) Overview of international (non-American) cinema from the 1890s to the present. Focuses on the masterpieces of the art form. Studies the major filmmakers and movements including German Expressionism, Soviet Realism, Parisian Avantgarde, Renoir, Italian Neo-realism, Bunuel, Kurosawa Bergman, Fellini, French New Wave and others.
ID 201 Interdisciplinary MCAT Prep (0) ID 201 includes student direction and involvement in preparation for MCAT exam. Involves participationinstudent-leddiscussion/learningsessions.Sophomore or junior standing. Repeatable course: a max of 5 credit hours may beearnedforrevieworpreparatorycoursesinanydiscipline.Content changes each time course is offered. Students receive a pass or fail grade based on their attendance and participation in at least $75 \%$ of the course. Fall and Spring.

ID 205 American Cinema (3) Overview of American cinema from the 1890stothepresent.Focusesonthemasterpieces oftheartform. Studies the major filmmakers including Edison, Porter, Griffith, Seastrom, von Sternberg, Flaherty, Ford, Hitchcock, Welles, Curtiz, Lean, Kazan, Ritt, Coppola, Scorsese, Spielberg, Beresford and others.

ID 220The Holocaust Revisited (3) Explores various responses to the Holocaust.Examineshistorical insights and contemporary perspectives. Focus of discussion on works by Elie Wiesel, Phillip Haillie, Primo Levi, Ethy Hillesum, Richard Rubenstein and John Roth along with selected films.
ID 235 Sacred Architecture and Its Liturgy (3) Introduction to the major art forms which have developed in British Cathedrals: architecture, choralandorganliterature,hymnody, liturgy, sculpture, and stained glass. Includes a two-week research trip to UE's Harlaxton College in England with visits to numerous cathedrals.
ID 250 Myths of the Greeks (3) Centers on the stories of the Greeks that have survived through the art, architecture, and literature of ancient times.

ID 255 Women Mystery Writers and the Rise of Feminism (3) Concerning women's mystery and detective fiction and the rise of feminism in the western world since 1920. Focuses on the writing of seven authors: Agatha Christie, Dorothy L. Sayers, Ngaio Marsh, P.D. James, Sue Grafton, Sara Paretsky, Patricia Cornwell. At east one mysterynovelfromeachauthorincludedinthereadings.Alsofollows theriseofthewomen's movementintheWestduringthepasteighty yearsandspecificallyexaminesthechangingimageofwesternwomen as portrayed in popular media.
ID 325 Alexander the Great and the Hellenistic World (3) Interdisciplinary study of the rise of the Macedonian state in the fourth century BCE, focuses first on the careers of Philip II and Alexander the Great, then examines the Hellenistic kingdoms created by their successors in Greece, the Near East and Egypt. Besides historical eventsandmaterialculture, surveysHellenisticliterature,philosophy and science. Prerequisite: HIST 111 or 311 or 312 or permission of instructor. Alternate years
ID 356 Functional Anatomy and Biomechanics (3) The study of humanmovementutilizingprinciplesofanatomy, physiology, physics andotherrelatedsciences.Emphasizesbasicbiomechanicsandmusculoskeletalstructureandfunction.Studentslearntoanalyzehuman motion anatomically, kinematically and kinetically. Spring.
ID 380 Applied Product and Process Development (3) Provides an immersion intoanactual productor process developmentcompetition in the context of a two week intensive course. Students from at least two disciplines will participate in two or more interdisciplinary teams that will pursue the development of a new product or process for a regional client. Theteams will compete to develop the product or process that best meets the client's needs. The selected winning team of the competition may be eligible for a prize provided by the client.
ID433 Human Growth and Development(3) Presentstypical human developmentfromconceptiontodeathincludingfunctionalchanges inpostureandmovement.Presentsprocesses ofgrowth, maturation, adaptation, motorcontrolandmotorlearning.Discussesconcepts of critical period, health risk, physiologic reserve and senescence. The relationshipofphysical,cognitiveandsocialtheoriesofhumandevel-opmentandage-relatedsystemchangesgiven.Viewsmotorbehavior acrosslifespanwithinasocialand psychological context.Prerequisite: Sophomore standing. Fall.
ID 480 Origins and Effects of Modern Technology (3) Studies the development, the current place in society and the observed and
potential benefits and threats of several 20th century technological innovations. Involves individual presentations and seminar discussions. Open to all majors in the University. Satisfies senior seminar requirement.Prerequisites:Completionofatleastonesciencecourse; senior standing.
ID 350H Honors Seminar/Special Topics (3) A thoughtful explorationofaninterdisciplinarytopic withreadingsandstudentparticipation and presentations. May be repeated.
ID H290 Britain and Europe: Special Topics (1) A research-based exploration of a topic in the development of British culture:e.g.,The Age of Chivalry, Causes of World War I, From Byrd to the Beatles. Close working relationship with a British faculty mentor in a small class environment.
ID H365 Issues in Contemporary Britain (3) This course, taught at Harlaxton College, explores issues in contemporary Britain.

## Latin (LATN)

Latin courses aretaught by the faculty of the Department of Archaeology and Art History.
LATN 111 Elementary Latin I (3) Introduction to the basic elements of Latin grammar and syntax. Emphasis on reading and simple composition.
LATN 112 Elementary Latin II (3) Introduction to the basic elements of Latin grammar and syntax. Emphasis on reading and simple composition.
LATN 211 Intermediate Latin I (3) Develops the understanding of advanceLatinsyntaxandemphasizes reading ofextendedpassages from selected Latin prose authors. Poetry is introduced in 212.
LATN 212 Intermediate Latin II (3) Develops understanding of advancedLatinsyntaxandemphasizes readingofextendedpassages from selected Latin prose authors. Poetry is introduced in 212.

LATN 315 Latin Prose Historians: Caesar and Sallust (3) Reading of selections from Caesar's Gallic War and Civil War and Sallust's War with Catiline or Jugurthine War. Develops students' command of Latin vocabulary and understanding of advanced Latin syntax and grammar.Students willconsidercommonhistoricalthemesand approaches employed by the authors. Prerequisite: LATN 212 or permission of the instructor.
LATN 316 Cicero (3) Reading of unedited Latin selections from Cicero's Philippics and De Natura Deorum. Beyond continuing development of vocabulary skills, introduces the formal study of rhetoricusingCicero'sorationsandphilosophicalworks.Prerequisite: LATN 212 or permission of the instructor.
LATN 321 Vergil (3) Reading of selections from Books 1, 2, 4, and 6 of Vergil's Aeneid. Develops understanding of Latin poetic form, teachesprinciples ofscansionandreinforcesknowledgeofimportant literary devices in Latin. Prerequisite: LATN 212 or permission of the instructor.
LATN 329 Medieval Latin (3) Reading of selected medieval Latin texts from the fourth century CE up to the Renaissance. Introduces studentstothechanges in Latin grammarandvocabulary occurring in Late Antiquity and the Middle Ages. Prerequisite: LATN 212 or permission of the instructor.
LATN 330 Individual Readings in Latin Literature (1) Topics and credithoursmustbeprearrangedwithinstructor.Repeatableastexts and authors change.
Law (LAW)
Law courses aretaught bythefaculty oftheDepartment of Account-
ing and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family SchoolofBusinessAdministration.Seethe"SchroederFamilySchool of Business Administration" section of this catalog for the complete leveling policy.
LAW 201 Legal Environment of Business (3) Introduces principles of lawandmechanicsofthelegal system. Providesabroadintroduction tolegal conceptsandstatutes thataffectbusinesses andmanagerial decision making.
LAW 302 Business Law (3) In-depth coverage of the concepts of partnership, agency, corporations, commercial paper, sales and secured transactions. Prerequisite: Grade of C- or better in LAW 201.

LAW 304 Legalized Workplace Issues (3) This course will cover a breadth of legal issues/topics related directly or indirectly to the workplace, including but not limited to labor; employee rights, benefits and liabilities; contracts; intellectual property; and the Constitution, with the goal of giving students some new tools and practical knowledge. Prerequisite: Satisfaction of leveling policy.
LAW 308 Negotiations (3) This course focuses on developing both the knowledge needed and the skills necessary for successful business negotiations. We will place emphasis on preparing for, participating in, and debriefing simulated one-on-one negotiation problems of increasing complexity and nuance. Topics include negotiation psychology, tactics and skills using a five-part self-analysis and preparation structure. Methods of instruction include lecture, case analysis, in-class negotiation exercises, student presentations and exams. Prerequisite: Satisfaction of leveling policy.
LAW 380 Special Topics in Law (3) Covers topics not included in other courses, gives greater depth in certain areas and explores current law topics. Repeatable course. Content changes each time course is offered. Offered periodically. Prerequisite: Satisfaction of leveling policy.

## Leadership (LDR)

LDR 405 Leadership Theory (3) This course examines leadership theory, concepts, and practice. Students will identify leaders and leadership styles and apply the knowledge to better understand and positively affect their organization, business, or institution. Self-reflection will be a focus of the class as students evaluate their leadership styles and practices to identify areas of growth and personal development.
LDR 412 Organizational Behavior (3) Uses various organizational, managerial, and behavioral theories, concepts, and principles in analyzing, diagnosing, predicting, and guiding human behavior within organizations committed to public service. Emphasizes motivation, leadership, change, communication, personality, group dynamics, and organization development.
LDR 425 Design Thinking for Organization Change (3) This course will explore the concepts of systems thinking and design thinking and apply them to complex problems facing organizations of all types. Knowledge and skills are developed in holistic systems analysis, empathy, problem-definition, ideation, rapid-prototyping, and experimentation to foster innovation. Students will utilize collaborative, cross-disciplinary approaches to tackle multi-faceted problems and develop innovative solutions.
LDR 428 Financial Decision Making (3) Focuses on the acquisition, allocation, and management control of financial resources within organizations. Includes cost analysis, financial position analysis and strategies, reimbursement, pricing policies, budgeting, cap-
ital expenditure, analysis of financial reports, and informal and external controls. Emphasizes financial terminology and organization of financial statements. Requires analytical approach to ratio analysis and organization diagnostics.

LDR 490 Decision Making (3) Examines decision making in leadership roles by extensive use of case studies. Material from other LDR courses is integrated into the study of decisions facing all types of organizations committed to leading and serving.

## Legal Studies (LS)

Legal studies courses are taught by the faculty of the Department of Law, Politics, and Society.
LS 125 Law in Society (3) Overview of major principles and functioningofourlegalsystem.Introducesstudentstojurisprudentialanalysis andtotheroleofprofessionals withinthejusticesystem. Legalaspects ofcurrenttopicsdiscussedtoassiststudentsinacquiringanappreciation for the dynamic role law plays in our changing society.
LS 300 Legal Research (3) Examines the law library, surveys the variousreferencesources availabletolawyersindeterminingapplicable law, and studies the processes of legal research and writing of memoranda presenting results of that legal research. Includes numerous practiceproblems requiringlegal researchandmemorandawriting, utilizingstatues,casereports,encyclopedias,treatises,computerized legalresearchsystems,andotherlegal researchcourses.Prerequisite: LS 125.
LS 301 Legal Drafting (3) Uses basic skills learned in Legal Studies 300, in which accent was on learning the law library and how to use the various finding tools in uncovering the law. Advanced legal research and writing deals primarily with what to do once one finds the law,the techniques of reading and analyzing case law, and the fundamentalsoflegalwriting includingtheuseofforms,memoranda and briefs. Prerequisite: LS 300.
LS 310 Real Estate (3) Covers basic laws relating to real property and commontypes of real estate transactions and conveyances. Studies variousinstrumentssuchasdeeds, contracts,leasesanddeedsoftrust withemphasisonhowtheseinstrumentsaredrafted.Studyactivities includeresearch projectsrelatingtothesubjectmatterand practicein retrieving and recording information. Prerequisite: LS 125.
LS 320 Evidence, Litigation and Trial Practice (3) Includes analysis and discussion of common types of litigation,promises of litigation, sources of law, the court systems, attorneys, types of lawsuits, usual defenses. Examines Indiana civil procedures, discovery procedures,courtprocedures,trial, post-trialmotionprocedures,appeal, enforcement of judgment and various types of litigation. Particular attentiongiventotheroleoftheparalegalinassisting theattorneyin these matters. Prerequisite: LS 125.
LS 340 Federal Taxation (3) Studies current federal income tax law concepts of income and deductions for all entities. Prerequisite: LS 125. Same as ACCT 329.

LS 343 Criminal Law (3) Studies both substantive and procedural criminal law including specific topics in each. Prerequisite: LS 125. Same as CJ 342.
LS 345 Constitutional Law: the American Constitution (3) Reviews judicial decisions and interpretations which have contributed to the growth and development of the United States Constitution in such areasasthefederal system, intergovernmental relations, presidential powers, government functions and civil rights. Prerequisite: LS 125. Same as PSCI 345.
LS 350 Business Organization (3) Studies the legal organization of business entities. Emphasis on the role of the lawyer and the legal
assistantintheformation ofvariousbusinessorganizations.Includes a survey ofthefundamental principles oflawapplicabletoeachtype ofbusiness organization and preparation of the related documents. Prerequisite: LS 125.

LS 370 Family Law (3) Acquaints the legal studies student with the legal problems involved inthearea ofdomestic relations. Covers the legal problems involved in separation, divorce, child custody, adoptionandnonsupport.Studentsdraft pleadingsindomesticrelations cases as well as study the law regarding the particular area in which they are working. Prerequisite: LS 125.
LS 380 Administrative Law (3) Overview of the functions and procedures offederaladministrativeagencies,including analysis oftheir underlying statutory authority as embodied in the Administrative Procedure Act and the subsequent case law development of this authority. Topics include the rule-making function, administrative adjudicationanddueprocess,judicialreviewofadministrativeaction, useandcontrol ofdiscretionintheadministrative processanddisclosure of information by administrative agencies. Prerequisite:LS 125.
LS 420 Women and Law (3) Introduces students to legal issues that have had a profound impact on the legal standing and rights of women. Examines the historical context that created the present legal status of women in the United States. Prerequisite: LS 125 or permission of instructor.
LS 480 Special Topics in Law (3) Covers selected topics in more depthandexplorescurrentlaw-relatedissues.Prerequisite:LS 125or permission of instructor.
LS 491 Internship I (3) The internship requirement for the legal studiesprogram combinesthestudent'sacademictraining withpractical experiences within a law firm, corporation, bank or governmental agency. Prerequisite: Senior standing.
LS 492 Internship II (3) The internship requirement for the legal studiesprogramcombinesthestudent'sacademictraining with practical experiences withinalawfirm, corporation, bankorgovernmental agency. Prerequisite: Senior standing.
LS497 Contemporary Legal Issues (3) Considers contemporary legal issues and their impact on our culture. Research and writing about those issues required. Prerequisite: Senior standing, completion of legalstudiescorerequirementsorpermissionoftheinstructor.Senior seminar course for legal studies majors.

## Logistics and Supply Chain Management (LSCM)

Logistics and supply chain management courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirementsoftheSchroederFamilySchoolofBusinessAdministration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.
LSCM 315 Logistics/Supply Chain/Operations Management (3) An introduction to the analysis and design of manufacturing processes, logistics systems, and supply chain management. Topics include roles of supply chain management, logistics, and operations management, lean systems and strategies, inventory control, sourcing, and supply chain and demand management analysis. Emphasis is placed on concepts and practices that provide firms with a supply chain competitive advantage. Prerequisite: MATH 222 or QM 227, or equivalent statistics course.
LSCM 320 Advanced Logistics Management (3) Provides in-depth knowledge on the application of logistics services from original sourcing through delivery of finished products in the supply chain. Focuses on fundamental logistics functions such as purchasing, procurement, forecasting, inventory control, scheduling
and distribution channels. Prerequisite: Grade of C - or better in LSCM 315.
LSCM 330 Supply Chain Management Solutions with SAP (3) Provide knowledge and experiences working with the SAP ERP system. Specialattentionisaffordedtointerdependenciesbetweenlogistical and back office software functions such as finance, controlling, and human resources. Students will learn the SAP ERP system, work through key tasks in all major modules, and most importantly, understandtheunderlyingbusinessprocessesimpactingsupplychain management. Prerequisite: Grade of C- or better in LSCM 315.
LSCM 340 Intro to Six Sigma (3) Addresses logistics and supply chain management through the specialty of six sigma. The course will focus on the fundamentals of six sigma and lean production through the topics of DMAIC, Kano Model, SIPOC, Measurement System, Process Capability, Pareto Analysis, Design of Experiments, Code of Ethics, 5S, Waste, Flow, and Just in Time. Prerequisite: LSCM 315 with a minimum grade of C-.
LSCM 350 Humanitarian Logistics (3) This course provides an understanding of the key elements of humanitarian logistics. Students will learn key information on humanitarian aid, current implications of logistics and supply chain management, and how to employ future applications and innovation to humanitarian aid programs. Prerequisite: Grade of C- or better in LSCM 315.
LSCM 360 Global Logistics and Supply Chain Management (3) Addresseslogisticsandsupplychainmanagementintheglobalenvironmentwhichinclude:global procurementandsourcing, methods of entry, international contracts, terms of trade, terms of payout, internationalmodes, internationalinsurance,managingglobaltransactionrisks,anddevelopingstrategicadvantages intheglobalsupply chain. The course will also address environmental, sustainable, and cultural decisions that affect logistics and supply chain processes. Prerequisite: Grade of C- or better in LSCM 315.
LSCM 370 E-Logistics (3) Describes the role of electronics, informationtechnologies, andinformationsystemsincollaborativesupply chain relationships. Emphasis is given on the tools and skills for understandinghowtomanagetheelectronicenvironmentoflogistics and supply chain management.Prerequisite:Grade ofC-orbetter in LSCM 315.
LSCM 380 Special Topics in Supply Chain Management (3) Covers topics not included in other courses, gives greater depth in certain areasandexplorescurrentsupplychainmanagementtopics.Repeatablecourse.Contentchangeseachtimecourse isoffered.Prerequisite: Grade of C- or better in LSCM 315.
LSCM 390 Contemporary Supply Chain Issues (3) Provides students with experiential learning opportunities insolving relevantlogistics andsupplychainmanagementissues.Topicsfocusonrecentlogistics andsupplychainmanagementstudieswithinvariousindustrysectors. Thecourseaimstodevelopskillsandknowledgetomanagecontemporary issues in the supply chain management field. Prerequisite: Grade of C- or better in LSCM 315.

## Management (MGT)

Managementcoursesaretaughtbythefaculty oftheDepartment of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.
MGT 280 Special Topics in Management (3) Covers topics not included in other courses, gives greater depth in certain areas and explores current management topics. Repeatable course. Content
changes each time course is offered.
MGT 306 Human Resources (3) Covers the basic components of the human resource management (HRM) function in organizations, including hiring employees, assessing performance, and administering pay and benefits. All these activities must be performed in compliance with the law, so course also addresses Equal Employment Opportunity laws and other federal legislation and agencies that impact HRM. Prerequisite: Satisfaction of leveling policy. Fall.
MGT 310 Production/Operations Management (3) Survey of the managementproblemsfoundinthemanufacturingofgoodsandthe deliveryofservices.Variousissuesconsideredwithemphasisonquantitativemodels availableforsolving selected problems.Total quality managementandothermanagementconceptsdiscussed.Prerequisite: MATH 222, QM 227 or equivalent statistics course.
MGT 311 Management Information Systems (3) A study of various typesofcomputer-basedinformationsystemsincludingtheirdesign, acquisitionandoperationfromtheperspective ofthemanager/enduser. Prerequisite: Satisfaction of leveling policy.
MGT 331 International Business Strategy (3) Examination of the challenges of conducting business outside the firm's country of origin. Explores the unique aspects of international business, the international environment, and foreign environmental forces from a strategic perspective. Prerequisite: ECON 101 or 102.
MGT-369 Entrepreneurship (3) Introduces students to the fundamental knowledge and skills that are required in order to conceive, develop, start, and grow a new business enterprise with focus on opportunity recognition and capture, start-up, operations, and identifying and addressing risk. Prerequisites: BUS 100 and satisfaction of leveling policy. Cross-listed with MGT 569. Pre-requisites: BUS 100 and satisfaction of leveling policy. Spring
MGT 377 Organizational Behavior (3) Focuses on developing an understanding of the individual and group level factors that influence employee attitudes and behavior at work. Emphasis placed on learningorganizational behaviortheories, theirempiricalvalidityand theirpracticalimplications.Topicsincludepersonalityandemotions, motivation, workteams and leadership. Prerequisite:Satisfaction of the School of Business Administration course level policy.

MGT 380 Special Topics in Management (3) Covers topics not included in other courses, gives greater depth in certain areas and explores current management topics. Repeatable course. Content changeseachtimecourseisoffered.Prerequisite:Satisfactionofleveling policy and permission of instructor. Offered periodically.
MGT 392 Managing Global Relationships (3) Focuses on the impact ofcultureonbusiness relationships.Emphasisisplacedonthewaysin whichcultureimpactsmanagerial relationshipswithemployees, with otherbusinesses, andnegotiations.Applicationstotheinternational managementcontext, interculturalnegotiations, andrecommendations for improving expatriate success are highlighted. Prerequisite: Grade of C- or better in MGT 377.
MGT395IndependentStudy (1-3) Independentresearch in managementconductedunderfacultysupervision.Prerequisites:Satisfaction of leveling policy and permission of instructor.
MGT402CompensationandBenefits(3)Examines human resources managementpracticesthatcompensateemployeesand providebenefits. Covers job evaluation, pay structures, federal laws affecting compensation practices, incentive pay plans, and benefitplans. Prerequisite: Grade of C- or better in MGT 306. Spring.
MGT 412 Leadership (3) Surveys historical and contemporary perspectives on leadership. Includes spotlights on specific
tasks or contexts for leaders, for example, decision making in groups, empowering and delegating, correcting performance deficiencies, and leading meetings. Provides a comprehensive understanding of the leadership subject from the management literature, as well as opportunities for personal reflection on leadership topics. Methods of instruction include lectures, case analyses and other written assignments, videos, and discussions. Prerequisite: Satisfaction of leveling policy.
MGT 430 Decision Making (3) Develops a theoretical and practical understanding of individual and multiparty decision-making processes.Emphasisplacedonlearningaboutthesystematicwaysin which people'sjudgmentsdeviatefromwhatarationalmodelwould predict. Coverage of multiparty decision making includes an exten-sivetreatmentofnegotiationstrategies.Applicationstothemanagementcontextandrecommendationsforimprovingdecisionmaking are highlighted. Prerequisite: Satisfaction of leveling policy.
MGT 455 Introduction to Logistics and Supply Chain Management (3) An introduction to the analysis and design of domestic and international logistics systems and supply chain management. Topics include transportation, warehousing, inventory control, materials handling and packaging, plant and warehouse location decisions, sourcing, and supply chain performance and financial analysis. Additional emphasis is placed on concepts and practices that provide firms with a global competitive advantage. Prerequisite: satisfaction of leveling policy. Same course as LSCM 315.
MGT 475 Competitive Dynamics (3) Examines the interplay between functional areas of the firm as well as the importance of competitive analysis. Through the use of a simulation, the integration of principles and techniques learned in accounting, finance, marketing, and management are highlighted. Prerequisites: Grade of C- or better in ACCT 211, FIN 361, MGT 377 and MKT 325.

MGT497 Global Strategic Management (3) Uses a strategic planning modelto integrate principles andtechniques learnedinaccounting, economics,finance,marketing,managementandquantitativemethods. Examines strategies used to attain and maintain a global competitive advantage. Prerequisites: Grade of C- or better in MGT 377, MKT 325, FIN 361 and senior standing. Senior seminar course. Must earn a grade of C- or better in this course to apply to Outcome 11.
MGT H250 Seminar in Contemporary Leadership (3) Explores various theories of leadership and ethical behavior through the use of cases based on classic and modern firms. Covers topics including conflictresolution,situationalleadership, diversity, authority, power, and organizational culture. Harlaxton summer course only. Offered periodically.

## Marketing (MKT)

Marketing courses are taught by the faculty of the Department of Accounting and Business Administration. All courses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "Schroeder Family School of Business Administration" section of this catalog for the complete leveling policy.
MKT 325 Principles of Marketing (3) Introduction to basic marketing principles from the perspective of a marketing manager. Topics coveredincludethemarketing concept, productanalysis, consumer behavior, channels ofdistribution, pricing, promotion, international marketing and marketing's role in society. Prerequisite: Satisfaction of leveling policy.
MKT 330 Consumer Behavior (3) Consumer behavior studied from socio-economic, psychologicalandcultural perspectivesasitrelates
to marketing management. Prerequisite: Grade of C- or better in MKT 325.
MKT 373 Personal Selling (3) Studies the responsibilities, activities and psychology of a sales representative with a focus on long-term relationship building. Successful selling practices are introduced including prospecting, establishing rapport, generating curiosity, being persuasive, creating desire, handling objections and closing. Prerequisite: Grade of C- or better in MKT 325.
MKT 374 Integrated Marketing Communication (3) Provides an examination of all elements of the marketing promotion mix advertising, sales promotions, point-of-purchase communication, direct marketing communication, public relations and sponsorship marketing, and personal selling.Overview of market segmentation, appeals,budgets,evaluationandmanagementofthepromotionmix. Prerequisite: Grade of C- or better in MKT 325.
MKT 380 Special Topics in Marketing (3) Covers topics not included in other courses. Gives greater depth in certain areas and explores currentmarketingtopics.Repeatablecourse. Contentchangeseach time course is offered. Prerequisite: Grade of C- or better in MKT 325. Offered periodically.

MKT 385 Digital Marketing (3) This course examines timely concernsattheintersectionofmarketingandtechnology.Topicsinclude internettechnologyformarketers,onlineprivacyandsecurityissues, buyerbehavioronline, and digitalmarketingtechniquessuchasbanneradvertising, advertising and participating in socialmedia, search engineoptimization, and mobile and email marketing.Prerequisite: Grade of C- or better in MKT 325.
MKT 395 Independent Study (1-3) Independent research in marketing conducted under faculty supervision. Prerequisite: Grade of C- or better in MKT 325; permission of the instructor.
MKT-460 Marketing Analytics(3) This course focuses on using quantitative tools to uncover customer insights to monitor and maximize the effectiveness of marketing initiatives. Topics include identifying and collecting relevant data, selecting key metrics, developing models that connect these metrics, and analyzing data to make decisions. Prerequisite: C- or better in both MKT 325 and one of QM 227 or STAT 266.
MKT 477 International Marketing (3) Examines the impact of culture, economics and legal and regulatory influences on marketing strategy in more than one nation. Prerequisite: Grade of C - or better in MKT 325.
MKT 490 Marketing Research (3) Introduces applications, methods, techniques and functions of market research and information systems. Prerequisite: Grade of C- or better in MKT 325 and QM 227 or an equivalent statistics course.
MKT 492 Strategic Marketing Management (3) Provides an examination of marketing strategy selection and implementation with a focusondecisionmakingandproblemsolving.Prerequisite:Gradeof C- or better in MKT 325; senior standing.

## Mathematics (MATH)

Mathematics courses are taught by the faculty of the Department of Mathematics.
MATH 101 Mathematical Ideas (3) Explores a variety of topics, includingnumerationsystems,logic, geometry, probability, andstatistics.Includeshistoricalandcultural perspectiveand contemporary applications.Backgroundshouldincludetwosemestersofhighschool algebra. Fall, spring.
MATH 105 College Algebra (3) Treats properties of linear, quadratic, polynomial, exponentialandlogarithmicfunctions,inequalities, and
systems of equations. Develops critical thinking and emphasizes real-worldapplicationsinthesciencesandtopical issues.Background should include three semesters of high school algebra. Fall, spring, summer.

MATH 106 Precalculus Trigonometry (1) Provides trigonometric tools necessary for success in Math 221. Develops trigonometric functions using both right triangles and the unit circle approach. Coversgraphing,verification ofidentities, andinversetrigonometric functions.Requiresnopriorknowledgeoftrigonometry. Prerequisite: Grade of C or better in MATH 105 or an acceptable score on a placement exam. Fall, spring.
MATH 134 Survey of Calculus (3) Treats polynomial, exponential, and logarithmic functions, their derivatives and integrals. An introductiontothecalculus ofseveral variablesandapplicationstothenaturalandsocialsciences.Recommendedforstudentswhoplantotake only one semester of calculus not requiring trigonometry. Not open to mathematics majors or minors. Background should include four semestersofhighschoolalgebraandtwosemestersofgeometry.Prerequisite: Grade of C or better in MATH 105 or an acceptable score on a placement exam. Does not satisfy the prerequisite for MATH 222. Credit not given for both MATH 134 and 221. Fall, spring.

MATH 191 Special Topics in Finite Math (1) Study of topics of special interest in finite (non-calculus based) mathematics. Treats material not covered in other courses. Topics will be announced. May be repeated. Background should include two semesters of high school algebra.
MATH 202 Mathematics for Elementary Teachers (3) Treats problem solving, therealnumbersystem,elementarynumbertheory, geometry, andothertopics.Forelementaryeducationmajorsonly.Prerequisite: MATH 101. Spring.
MATH 221 Calculus I (4) Covers parametric and polar equations; limits and continuity; differentiation and integration of algebraic, trigonometric,logarithmic, and exponentialfunctions;andapplications of differentiation. Background should include eight semesters ofhighschoolmathematics, includingfoursemestersofalgebra,two semestersofgeometry, andatleast 12 weeksoftrigonometry.Prerequisite: Grade of C or better in Mathematics 105 and permission of Department of Mathematics, or an acceptable score on a placement exam. Credit not given for both MATH 134 and 221. Fall, Spring, Summer.
MATH 222 Calculus II (4) Covers integration techniques and applications of integration. Introduces vectors and matrices, functions of several variables and their derivatives, differential equations, and multiple integrals. Prerequisite: Grade of C- or better in MATH 221. Fall, spring, summer.
MATH 291 Special Topics in Calculus (1) Study of aspects or applicationsofcalculus notcoveredinthestandardcalculussequences.Topics will be announced. May be repeated. Prerequisite: MATH 221.
MATH 310 History of Mathematics (3) Surveys the development of mathematics from the Ishango Bone to Newton, and Leibniz. Emphasizes major mathematical concepts, the cultural contexts in which theywerediscovered, andthesolving ofrelatedmathematical problems. Prerequisite: Grade of C- or better in MATH 222.
MATH 323 Calculus III (4) Covers infinite series, vector-valued functions, multipleintegration, lineandsurfaceintegrals, andanalysis of vector fields. Prerequisite: Grade of C- or better in MATH 222. Fall, spring, summer.
MATH 324 Differential Equations (3) Includes standard first- and second-ordermethods, systems, differenceequations, powerseries, Laplace transforms, and numerical and nonlinear methods, with
applications for all of these. Prerequisite: Grade of C- or better in MATH 222. Fall, spring, summer.
MATH 330 Financial Mathematics (3) Covers compound interest formulas, annuities, perpetuities,amortizationschedules,bonds, and other securities. Provides preparation for the Society of Actuaries Exam FM. Prerequisite: Grade of C- or better in MATH 222. Fall 2019 (every other fall).
MATH 341 Linear Algebra (3) Covers systems of linear equations, matrices, determinants, vector spaces, linear transformations, and eigenvalues and eigenvectors. Prerequisite: Grade of C - or better in MATH 222. Spring.
MATH 355 Foundations of Geometry (3) Develops from axioms various notions, including point, line, incidence, betweenness, congruence, parallelism, perpendicularity, distance, similarity, and perspective. Geometries include finite, Euclidean and hyperbolic, with emphasis on Euclidean constructions, proofs, transformations, and dynamic geometry using computer software.Prerequisite:Grade of C- or better in MATH 222 or consent of instructor. Fall 2019 (every other fall).
MATH 365 Probability (3) Develops standard topics in calcu-lus-based axiomatic probability theory and applications, including permutations,combinations,samplespaces,events,randomvariable, independence, conditional probability, distributions, density functions,expectedvalue,andmomentgeneratingfunctions. Prerequisite: Grade of C - or better in MATH 222. Fall.

MATH 370 Discrete and Combinatorial Math (3) Covers such topics as enumeration, principles of logic, set theory, mathematical induction, generating functions, recurrence relations, and graph theory. Prerequisite: Grade of C - or better in MATH 222. Fall.
MATH 373 Numerical Methods (3) Covers numerical comput-er-based methods for solving transcendental equations, systems of linearequations, interpolation, approximation, numericalintegration and differentiation, and numerical solutions of ordinary differential equations. Prerequisite:ComputerScience 205 or 210 or equivalent; Grade of C- or better in Mathematics 222. MATH 341 is suggested but not required. Spring 2019 (every other spring).
MATH 391 Special Topics in Intermediate Math (1) Covers topics not included in other courses to give greater depth in certain areas and to explorecurrentmathematicstopics. Topics vary;may include foundationsandsettheory, graphtheory, andnumbertheory.Maybe repeated. Prerequisite: MATH 222; any additional prerequisites will be announced when scheduled.
MATH 420 Advanced Calculus (3) Provides more formal treatment of topics in elementary calculus, including limits, continuity, differentiability, integrability, andinfiniteseries, withemphasison precise definitions and proofs of theorems. Prerequisite: MATH 323. Fall.

MATH 425 Complex Variables (3) Introduction to complex numbers andthecalculus offunctions ofacomplexvariable.Topics includethe algebraand geometry ofcomplexnumbers,limits andderivatives of functions ofacomplexvariable,contourintegrals, TaylorandLaurent series, and residues. Prerequisite: MATH 323.
MATH 431 Long-Term Actuarial Models I (3) Covers the theory and application of contingency mathematics in the areas of life and health insurance, annuities and pensions, using both stochastic and deterministicapproaches.IncludesmaterialcoveredontheSocietyof Actuaries Exam LTAM. Prerequisite: MATH 330, 365. Spring 2020 (every other spring).
MATH 432 Long-Term Actuarial Models II (3) Continues coverage (begun in MATH 431) of the theory and application of contingency
mathematics in the areas of life and health insurance, annuities, and pensions, using both probabilistic and multiple state models. Together, MATH 431 and MATH 432 cover most of the material on the Society of Actuaries Exam LTAM. Prerequisite: MATH 431. Offered occasionally.
MATH 445 Abstract Algebra (3) Introduces algebraic structures and their applications. Covers set theory, number theory, modular arithmetic, groups, rings and fields. Prerequisite: MATH 341. Spring 2019 (every other spring).MATH 466 Mathematical Statistics (3) Develops standard topics in mathematical statistics, including sampling distributions, estimation, hypothesis testing, analysis of variance, regression, and correlation. Prerequisite: Grade of C- or better in MATH 365. Spring.
MATH 490 Seminar, Workshop or Independent Study in Math (1) Seminar/workshoptopicsannouncedwhenscheduled.Independent studytopicsselectedbystudentsinconsultationwiththemathematics professor who supervises the work. Prerequisite: Permission of instructor.
MATH 491 Special Topics in Advanced Math (1) In-depth explorationofatopicnotcoveredinothercoursesas preparationforgraduate level mathematics. Topics vary, but may include algebraic topology, analytical numbertheory, codingtheory, differential geometry,functionalanalysis,Lietheory, partialdifferentialequations,realanalysis, ring theory, and topology. May be repeated. Prerequisites: MATH 323;anyadditional prerequisites willbeannounced whenscheduled.

MATH 495 Senior Seminar: Mathematical Modeling (3) Focuses on theformulation, analysis, andinterpretation ofmathematicalmodels related to contemporary problems drawn fromthe natural sciences, socialsciences, andmanagementscience.Involvesteamprojectsand aseminarformat.Prerequisites:Seniorstanding;atleasttwocourses chosen from MATH 323, 324, 365, 341, or 373; at least one computer programming class. Fall.

MATH 499 Internship in Mathematics (1) A structured assignment whichallowsthestudenttogain practicalexperienceinamathemat-ics-relatedfieldrelatingtoacareerinterest.Thestudentisdirected by afacultymemberoftheDepartmentofMathematicsandsupervised by a member of the cooperating organization. Prerequisite:Permission of Department of Mathematics.

## Mechanical Engineering (ME)

Mechanical engineering courses are taught by the faculty of the Department of Mechanical and Civil Engineering. Pre-engineering students and students not admitted to the College of Engineering andComputerSciencemaynotenrollinanymechanicalengineering (ME) course numbered 200 or above without specific permission of the instructor, chair, or dean.

ME 101 Introduction to Mechanical Engineering (3) A hands-on introduction to mechanical engineering. Topics include the use of thecomputerinengineering,3Dmodeling,applied physics,proposal preparation,teaming, andanintroductiontomechanicalengineering design process of design, build, \& test. Student teams complete a design project. Prerequisite: Admission to Mechanical Engineering Lower Division. Credit not given for both ME 101 and ME 102. Fall.
ME 102 Introduction to Mechanical Engineering for International Students (3) A hands-on introduction to mechanical engineering. Topicsincludetheuseofthecomputerinengineering,3Dmodeling, applied physics, proposal preparation,teaming,andanintroduction to mechanical engineering design process of design, build, \& test. Studentteams complete a design project. Specific attention is given to properuseoftheEnglishlanguageinengineeringeducationandpractice.

Enrollment limited to students for whom English is a second language. Offeredasneeded.Prerequisite:AdmissiontoMechanical Engineering Lower Division. Credit not given for both ME 101 and ME 102.
ME 197 Integrated Design I (2) Introduces engineering design as adisciplined, creative, problem-solving processusingrequirements analysis, functional decomposition, system architecture, and test plans. Students work on team-based project. Students learn basic sketchingandmachineshoptechniquesinateamenvironment.Prerequisite: ME 101 or 102 with a grade of $C$ - or better or permission of the instructor. May be repeated. Spring.
ME 297 Integrated Design II (2) Introduces computer aided manufacturing. Students are provided the opportunity to work on a large scale project in a team environment. Prerequisite: ME 197 with a grade of C- or better or permission of instructor. May be repeated. Spring.
ME 318 Manufacturing Methods (3) Considers manufacturing processesformetals and non-metals. Includedarecasting,forming, machining, welding, and techniques for manufactured plastics. Includes tours of manufacturing facilities. Corequisites: ENGR 230, 232. Spring.

ME 330 Materials Lab (2) An integrated series of experiments on the physical and mechanical behavior of materials including the effects ofvarioustypes ofloads,time,temperatureandenvironment.Materials studiedincludeferrous, plasticsandothernonferrous materials. Prerequisites: ENGR 232 with a grade of C- or better. Corequisites: ENGR 230 or permission of instructor. Fall.
ME 342 Machine Anaylsis (3) Graphical, analytical and comput-er-aidedmethodsofanalyzingdisplacement,velocity,accelerationand dynamicforcesandcouplesfoundinmechanisms.Synthesis/design of simple mechanisms. Prerequisite: ENGR 213 with a grade of C- or better. Fall.
ME 344 Design of Machine Elements (3) Theories of failure. Design using factor of safety and reliability. Steady and variable loading, straight and curved sections. Design of gears, shafts and bearings. Prerequisite: ENGR 232 with a grade of C- or better. Spring.
ME 345 Computer Aided Mechanical Design (3) Design offasteners, springs, brakes, clutches, chains and belts. Computer optimization. Principlesofconcurrentengineering.Parametricmodelingsoftware for analysis and design. Prerequisite: ME 344.
ME 360 Thermo/Fluid Dynamics Lab (2) Fundamental principles and experiments in thermal and fluid systems. Flow measurement, calorimetry,psychrometricsandengineperformance.Experimental projects in thermo/fluids engineering. Prerequisite: ME 362. Corequisite: ENGR 366. Spring.
ME 362 Thermodynamics (4) An introduction to thermodynamic principlesandthefundamentalsofenergyanalysis.Propertiesofpure substances. First and second laws of thermodynamics. Availability and irreversibility. Gas mixtures and psychometrics. Simple gas and vapor cycles. Prerequisite: CHEM 118. Fall.
ME 368 Heat Transfer (3) One- and two-dimensional steady and transient conduction in isotropic solids. Numerical methods in conduction. Forced and free convection in single phase fluids. Thermal radiation and radiation heat transfer. Prerequisite: ME 362 . Corequisite: ENGR 366. Fall.
ME 397 Integrated Design III (3) Includes the statistical analysis of experimental data, error analysis and uncertainty analysis. Basic electrical and mechanical sensing devices will be covered as part of the complete data acquisition and processing system. Included is measurement of displacement, velocity, acceleration, pressure, flow, temperature, force, torque, strain vibration and
other physical phenomena. Prerequisites: ME 297 with a grade of C- or better. Corequisites: EE 215 and ENGR 366 or permission of instructor. Spring.
ME 414 Vehicle Dynamics (3) Introduction to different aspects of vehicle design and performance. Topics analyzed include tires, steering, vehicle performance based on power-limited assumptions and traction-limited assumptions, braking, and steady-state cornering. Includes discussion of design considerations for vehicle development. Prerequisites: ENGR-213 with a grade of C- or better, ENGR-352 or Permission of Instructor.
ME 424 Engineering Biomechanics (3) This course is designed to give students the abilities to quantitatively analyze kinematics and kinetics of human movement and to evaluate data collection instru-mentationoptions.Studentswilldevelopthree-dimensionalmodels of humanbody segmentsfor purposes of evaluating human motion withrespecttospecificapplications.Studentswilldevelopprograms of their own to compute human kinetic and kinematic parameters from biomechanical data sets. Prerequisites: ENGR-213, BIOL-112, and MATH-323.
ME 428 Special Topics in Biomedical Engineering (3) An advanced course in biomedical engineering topics. Example topics include mechanics of biomaterials, dynamics of blood flow, cardiovascular physiology,orthopaedics, andvariablecurrenttopicsbasedonstudent interest. Prerequisites: ENGR-366 and ENGR-232.
ME 432 Advanced Mechanics of Materials (3) Relations between loads, deformations, stresses and strains;curved beams; beams on elastic supports; thick-walled cylinders; unsymmetrical bending; failuretheories;energymethodsforstaticallyindeterminatemembers. Prerequisite: ENGR 232.
ME 434 Fracture Mechanics (3) Elements of linear elastic fracture mechanics theory and solutions, principal modes of fracture in plates, plane strain/plane stress fracture toughness, different types of fracture criteria: stress intensity factor, crack driving force (Griffith criterion), J integral, crack tip opening displacement. Subcritical crack growth phenomena: fatigue crack growth and modeling/environmentally assisted crack propation. Prerequisite: ENGR-232.
ME444Computer Aided Mechanical Design (3) Design offasteners, springs, brakes, clutches, chains and belts. Computer optimization. Principles ofconcurrentengineering.Parametricmodelingsoftware for analysis and design. Prerequisite: ME 344.
ME446 Finite Elements (3) Introduces the finite element method for the solution of problemsencounteredinstressanalysis, heattransfer and fluid mechanics. Theoretical concepts are covered as well as the applicationofpopularcomputersoftwarepackages.Prerequisites:ME 344; ENGR 366.

ME 448 Mechanical Vibrations (3) Kinematics of vibratory motion, study ofsingleandmulti-degreeoffreedomsystems.Dynamicforces in vibrating systems. Computer applications in vibration analysis. Prerequisite: MATH 324; ENGR 213.
ME 452 System Modeling and Control (3) Mathematical and computermodelingofdynamiclumped parametermechanical,electrical, hydraulicandpneumaticsystems.Responseoffirstandsecondorder systems.Introductiontofeedbackcontrol oflinear systems.Prerequisites: ENGR 213; MATH 324.
ME 453 Mechatronics (3) Hands-on use of actuators and sensors in thedesignofelectro-mechanical systems.Systems mayincludeelectricmotors,shapememoryalloys,pneumaticandhydraulicactuators, solenoids, position and proximity sensors. Students learn a synergistic designapproach incorporating mechanics,electronics,computerpro-
grammingandcontrols.Prerequisites:MechanicalEngineering397,452.
ME 462 Advanced Thermodynamics (3) Real gases and gas mixtures, thermodynamicsofstaterelationships.Combustionandthermochemistry. Concepts of statistical thermodynamics. Prerequisite: ME 362.
ME 463 Principles of Turbomachinery (3) Turbomachine classification. Performance characteristics of centrifugal pumps and compressors and radial and axial flow turbines. Basic fluid and thermodynamicanalysisofturbomachineflowprocesses.Rudiments of design. Prerequisites: ME 362, ENGR 366 or permission of instructor.

ME 465 Internal Combustion Engines (3) Theoretical and actual cycles, production oftorqueandcombustionmodeling.Mechanical designofengines,fuelinjectionandemissionsystems. Prerequisites: ME 342, 362
ME 466 Introduction to Computational Fluid Dynamics (3) Development of the Navier-Stokes equations for laminar and turbulent flow. Methods for discretizing and solving the equations. Turbulent flow and turbulence modeling. Applications using commercial CFD software. Prerequisites: ENGR-366; MATH-324.

ME 468 Advanced Heat Transfer (3) Multidimensional heat conduction.Boiling and condensationheattransfer.Computer-assisted analysisofconduction, convectionandradiation.Analysisanddesign ofheatexchangersandotherheattransfersystems.Prerequisites:ME 368; MATH 324.
ME 470 Combustion (3) Covers fundamental concepts of non-reactive ideal gas mixtures, thermochemistry, chemical equilibrium, chemicalkineticsandreactivegasdynamics (deflagrationsanddetonations). Prerequisite: ME 362.

ME 472 Energy Systems (3) Energy sources and energy conversion. Principles of heat pump systems, solar energy, wind power,fuel cells andintroduction to nuclearengineering. Prerequisites:ME362,368.
ME 473 Heating, Ventilation and Air Conditioning (3) Methods of controlling temperature and humidity in buildings. Calculation of heating andcoolingloads.Mechanical systemsforheatingandairconditioning. Prerequisites: ENGR 366, ME 362. Corequisite: ME 368.
ME 474 Environmental Engineering I (3) Introduction to environmentalengineeringtopics, including waterquality, watertreatment processes, air quality, solid and hazardous waste management, and environmentalsustainability.Includesastudyofenvironmentallaws. Prerequisite: CHEM 118 with lab. Spring.
ME 476 Power Plant Engineering (3) Modern central station power generating systems. Turbine cycles and performance. Fuels and combustionequipment. Steamgeneratordesignand performance. Rudiments of heat transferequipment and turbomachinery design. Prerequisites: ENGR 366; ME 362.
ME 495 Professional Practice I(3) Students develop a proposal for an engineeringproject,completetheengineeringdesign,andbeginfabrication.Studentsareintroducedto professionalskills,suchasproject and time management, teaming, and ethics. Prerequisites: ENGR366; ME-344; or permission of instructor. Corequisite: ME-368 or permission of instructor. Fall.
ME497 Professional Practice II (3) Complete the semester-long project proposedinMechanical Engineering 495. Alldesign aspects and testingdocumentedinaformalwrittenreportanddefendedthrough anoral presentation oftheresultstopeers,facultyandindustrialcustomers. Prerequisite: ME 495.
ME 498 Independent Study: Mechanical Engineering (1) Independentstudy ofatopic ofinteresttothestudent.Requiresfacultysponsor and approved detailed study plan.

ME 499 Special Topics: Mechanical Engineering (1) Formal lecture/ laboratory study of topics of special interest. Topics announced. Repeatablecourse.Contentchangeseachtimecourseisoffered.Prerequisites announced when scheduled.

## Military Science Leadership (MSL)

MSL 101 Fundamental Military Concepts (1) The course introduces students to the basic officer competencies, establishes a firm foundation for continued study in higher ROTC courses, and instructs basic life skills pertaining to personal fitness and interpersonal communication skills. Students will be introduced to the U.S. Army values, national values, and expected ethical behavior. Students will be exposed to the unique duties and responsibilities of officers and theexpectationsofselflessservice, dedication, anddutytothenation. Designed to introduce basic soldier skills and squad level tactical operations.Attentionisdevotedtodevelopmentofleadershippotential through practical exercises both in and out of the classroom. Fall.

MSL 102 Basic Leadership (1) Examines the leadership process as affected by individual differences and styles, group dynamics, and personality behavior of leaders. Will introduce a generic model of problem solving. Teaches the basic skills that underlie effective problem solving in different work environments. Instructs how to relate the problem-solving model and basic problem solving skills to the resolution of military problems. Students will experience an introductionoffundamentalleadershipconceptsandexaminefactors thatinfluenceleaderandgroupeffectiveness.Designedtoteachbasic soldierskillsandsquadleveltacticaloperations.Studentinvolvement in briefings and hands on practical exercises. Attention is devoted to developmentofleadershippotentialthroughpracticalexercisesboth in and out of the classroom. Spring.
MSL 201 Advanced Leadership and Management (2) Develops basic leadership abilities and management skills through instruction and handson practical exercises. Introduces principlesandtechniques of effective written and oral communication. Teaches practical leader skillsandexaminesthe principleofsubordinatemotivationandorganizationalchange.Studentswillapplyleadershipand problemsolving toacomplexcasestudy/simulation. Classisdesignedtodevelopindividual team skills, decision-making abilities, and test basic tactical proficiencyskillsaswellasimproveplanningandorganizationalskills bothinandoutoftheclassroomenvironment.Teacheshands-onsoldierskillsandsquadleveltactical operations. Attention is devoted to developmentofleadershippotentialthroughpracticalexercisesboth in and out of the classroom. Fall.

MSL 202 Leadership, Tactics and Officership (2) Developsleadership skills by focusing on conventional basic squad and small unit tactics andintroduces studentsto the basictactical principles of maneuver. Examines the roots of national and Army values and better citizenship. Allows students to apply principles of ethical decision-making and resolve ethical issues in case studies. Examines the legal and historical foundations and duties and function of the Army officer. Students will analyze the roles officers played in the transition of the Army from the Vietnam Conflict to the 21st Century. Teaches basic soldier skills and squad-level tactical operations. Special attention isdevotedtodevelopmentofleadershippotentialthrough practical exercises both in and out of the classroom. Spring.
MSL 204 Leader's Training (Basic Camp) (4) Conducted at Fort Knox, Kentucky, home of the United States Armor Branch, during the summer months, covering a training period of approximately 30 days of paid training and excitement. The Department of Military Science ROTC battalion provides travel to and from Fort Knox. While at camp you will meet students from all over the nation while earning approximately $\$ 800$ in pay and receive free room and board while at camp. While at camp, you may have opportunities to earn a
two-year ROTC scholarships. The Basic Camp is a way to catch up on missed Military Science courses in order to qualify the student to contract into the Advanced ROTC Course at USI. Prerequisite: Departmental approval. Summer.

MSL 241 US Military History I (1740-1900) (3) The course will focus on U.S. military activity from the French and Indian War through the Spanish American War. Emphasis is on issues in command, impacts of technology,andtheevolutionofstrategyandtacticsinmodernwarfare. Studentswillconductabattleanalysisusingavariety oftechniques.Fall.
MSL 242 US Military History II (1900-Present) (3) The course will focus on U.S. military activity from before WWI through the Persian Gulf War as well as highlighted concepts in contemporary peacekeepingoperations.Emphasisisonissuesincommand,impacts of technology, and the evolution of strategy and tactics in modern warfare. Students will conduct a battle analysis using a variety of techniques. Spring.
MSL 301 Small Unit Leadership (3) Course is designed for those students who contract with Army ROTC to continue their military studies in pursuit of a commission as on officer into the Army followinggraduationfromcollege.Coursefocusistobuildcadetleadership competencies in preparation for attendance and successful completion of ROTC Advanced Course, Ft. Knox, Kentucky. Provides an in-depth review of the features and execution of the Leadership DevelopmentProgram, providingthecadetwith periodicassessment of performance in leadership positions. Students will study squad andplatoon-leveltactics,troop-leading procedures,missionanalysis, land navigation skills training, military operations plans and orders development,executionofsquad battledrills,andbasicbriefingtechniques. Prerequisite: Department approval. Fall.

MSL 302 Small Unit Operations (3) Course is a follow-on module to the MS 301 class, preparing cadets for attendance and successful completion of ROTC Leader Development and Assessment Course, Ft. Lewis, Washington. Focus will center on advanced self-development through the Leadership Development Program and an advanced-learningenvironmentofdoctrinalleadershipandtactical operations at the small unit level. Cadets will plan and conduct individualandcollective skilltrainingforoffensiveoperationsandaField Training Exerciseduringthespring semester.Cadets will beexposed to the developmental counseling program throughout the course period. Prerequisite: MSL 301 and departmental approval. Spring.

MSL401 Leadership,Management, andEthics (3) Course is designed to develop, train, and transition the advanced course graduate from cadet to lieutenant for service as an officer. Cadet will study Army stafforganizations, howtheyfunction, andtheprocessesofthearmy's hierarchyorganizationalstructure.Studentswilllearnin-depthcoun-selingresponsibilities/methods,officerandnon-commissionedofficer evaluationreportdevelopment,officerevaluationreportsupportform development, and training plan development. Course analyzes the legalaspectsofdecision-makingandleadershipinaction.Coursewill exposecadetstothefoundationsofleadership,operationallaw,and the key aspects of the Uniformed Code of Military Justice. Cadets will receive training on basic leader responsibilities to foster an ethical command climate and how to meet moral obligations, as well as leaderresponsibilitiestoaccommodate subordinatespiritualneeds. Prerequisite: Departmental approval. Fall.

MSL 402 Transition to Lieutenant (3) Continued advanced developmentandtransition oftheadvancedcampgraduatefrom cadetto lieutenant for service as an officer. Course is a follow-on module to the MS 401 class. Course will expose cadets to the in-depth study ofleadership, operational law, andthe key aspects of the Uniformed Code of Military Justice with a hands-on approach with interactive scenarios being utilized in class. Students will undergo hands-on
training and instruction in Joint Ethics regulations, joint strategic level operations, study of army administrative and logistics management, in depth counseling techniques, and duty at first military assignment. Course will cover the Army's training philosophy, METL development,equipmentreadiness, andrulesofengagementduring deploymentoperations.Studentsalsowillreceivetraininginpersonal awareness financial planning. Prerequisite: MSL 401. Spring

## Music (MUS)

Music courses are taught by the faculty of the Department of Music.
APM 101, 201, 301, 401 Baritone/Euphonium (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30 -minute private lessonperweek. Studentsregisteringfortwocredithourswillreceive one60-minuteprivatelessonperweek.Repeatablecourses.Content changes each time course is offered. Prerequisite: Music major or minor or permission of the instructor.
APM 102, 202, 302, 402 Bassoon (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credithour of applied music will receiveone 30 -minute private lesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Contentchanges each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 103, 203, 303, 403 Cello (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credithour of applied music will receiveone 30 -minute private lesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.
APM 104, 204, 304, 404 Clarinet (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credithour of applied music will receiveone 30 -minute private lesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.

APM 106, 206, 306, 406 Flute (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receiveone 30-minute privatelesson perweek. Students registering for two credithours will receive one60-minute private lesson perweek. Repeatable courses. Contentchanges each time course is offered. Prerequisite:Music major or minoror permission of the instructor.

APM 107, 207, 307, 407 French Horn (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30-minute private lesson per week. Students registering for two credit hours will receive one60-minuteprivatelessonperweek.Repeatablecourses.Content changes each time course is offered. Prerequisite: Music major or minor or permission of the instructor.
APM 108, 208, 308, 408 Guitar (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30-minute privatelesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 109, 209, 309, 409 Harp (1-3) Applied music lesson offered inthe indicated instrument. Students registering for one credithour
of applied music will receive one 30-minute private lesson perweek. Students registering fortwo credit hours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 110, 210, 310, 410 Harpsichord (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30-minute private lesson per week. Students registering for two credit hours will receive one60-minuteprivatelessonperweek.Repeatablecourses.Content changes each time course is offered. Prerequisite: Music major or minor or permission of the instructor.

APM 111, 211, 311, 411 Lute (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30 -minute private lesson perweek. Students registering for two credit hours will receive one60-minute privatelesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 112, 212, 312, 412 Oboe (1-3) Applied music lesson offered inthe indicated instrument. Students registering for one credithour of applied music will receive one 30-minute private lesson perweek. Students registering for two credit hours will receive one60-minute privatelesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 113, 213, 313, 413 Organ (1-3) Applied music lesson offered in the indicated instrument. Students registering for onecredithour of applied music will receiveone30-minute private lesson perweek. Students registering for two credit hours will receive one60-minute private lesson perweek. Repeatable courses. Contentchanges each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 114, 214,314,414 Percussion (1-3) Applied music lesson offered inthe indicated instrument.Students registering foronecredithour of applied music will receive one 30-minute private lesson perweek. Students registering for two credit hours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 115, 215, 315, 415 Piano (1-3) Applied music lesson offered in the indicated instrument.Students registering foronecredithour of applied music will receive one 30-minute private lesson per week. Students registering fortwo credit hours will receive one60-minute privatelesson per week. Repeatable courses.Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 116,216,316,416Saxophone (1-3) Applied music lesson offered inthe indicated instrument. Students registering for one credithour of applied music will receiveone 30 -minute private lesson perweek. Students registering for two credit hours will receive one60-minute privatelesson perweek. Repeatablecourses.Content changes each time course is offered. Prerequisite:Music major or minororpermission of the instructor.
APM 117, 217, 317, 417 String Bass (1-3) Applied music lesson offered inthe indicated instrument. Students registering for one credithour of applied music will receiveone30-minute privatelesson perweek. Students registering for two credit hours will receive one60-minute privatelesson per week. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 118, 218, 318,418 Trombone (1-3) Applied music lesson offered in the indicatedinstrument. Students registering for one credithour of applied music will receiveone 30-minute privatelesson perweek. Students registering for two credit hours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.

APM 119, 219, 319, 419 Trumpet (1-3) Applied music lesson offered inthe indicatedinstrument. Students registering for one credithour of applied music will receiveone 30 -minute private lesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.
APM 120, 220, 320, 420 Tuba (1-3) Applied music lesson offered in the indicatedinstrument. Students registering for one credithour of applied music will receiveone 30-minute private lesson perweek. Students registering for two credithours will receive one60-minute private lesson per week. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minor or permission of the instructor.
APM 121, 221, 321, 421 Viola (1-3) Applied music lesson offered in the indicated instrument. Students registeringforonecredithour of applied music will receive one 30-minute private lesson per week. Students registering for two credithours will receive one60-minute private lesson perweek. Repeatable courses. Contentchanges each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 122, 222, 322, 422 Violin (1-3) Applied music lesson offered in the indicatedinstrument. Students registering for onecredithour of appliedmusic will receiveone 30-minute private lesson perweek. Students registering for two credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.
APM 123, 223, 323, 423 Voice (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credithour of applied music will receiveone 30-minute privatelesson perweek. Students registering fortwo credithours will receive one60-minute private lesson perweek. Repeatable courses. Content changes each time course is offered. Prerequisite:Music major or minoror permission of the instructor.

APM 124, 224, 324, 424 Voice (Musical Theatre) (1-2) Applied musiclessonofferedintheindicatedinstrument.Studentsregistering foronecredithourofappliedmusicwillreceiveone30-minuteprivate lesson perweek.Students registeringfortwocredithourswillreceive one60-minuteprivatelessonperweek. Repeatablecourses.Content changes each time course is offered. Prerequisite: Music major or minor or permission of the instructor.
APM 125, 225, 325, 425 Jazz Guitar (1-3) Applied music lesson offered in the indicated instrument. Students registering for one credit hour of applied music will receive one 30-minute private lesson per week. Students registering for two credit hours will receive one60-minuteprivatelessonperweek.Repeatablecourses.Content changes each time course is offered. Prerequisite: Music major or minor or permission of the instructor.

MUS 100 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin theMusic Student Handbookand completeattendance verification
for each. No prerequisite. Pass/fail.
MUS 101 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin the Music Student Handbookand completeattendance verification for each. No prerequisite. Pass/fail.
MUS 102 Diction I (1) Presents the International Phonetic Alphabet and the diction rules for correct singing pronunciation of English, Italian, Latin, German, and French. Combines lecture, oral readings, and practice skills in use of IPA. Prerequisite: Music major or permission of instructor.
MUS 103 Diction II (1) Presents the International Phonetic Alphabet and the diction rules for correct singing pronunciation of English, Italian, Latin, German, and French. Combines lecture, oral readings, and practice skills in use of IPA. Prerequisite: Music major or permission of instructor.
MUS 104 Basic Piano I (1) Group instruction in piano with simple literatureandthedevelopmentofskillsintechniques,sight-reading, harmonization, transposition, andimprovisation.Designedtoprepare for the Piano Proficiency I exam. Prerequisite: Music major or minor or permission of instructor.
MUS 105 Basic Piano II (1) Group instruction in piano with simple literatureandthedevelopmentofskillsintechniques,sight-reading, harmonization, transposition,andimprovisation.Designedtoprepare for the Piano Proficiency l exam. Prerequisite: Music major or minor or permission of instructor.
MUS 110 University Bands (1) (Section 1) Includes the finest wind andpercussionstudentswithinandoutsidetheDepartmentofMusic. Presentsseveralconcertseachsemesterfeaturingadvancedlevelmusic andservesasoneofthetouringensembles.Studentsalsoparticipate in University Band and Aces Brass as part of this course. Audition requiredeachsemesterforentranceandseating placement. (Section 2) Presents a concerteach semester. Smallergroups from within University BandmakeupAces Brass, which performs athomebasketball games and MVC and NCAA tournaments. Open to music majors and non-majors. No audition required; seating at discretion of director.
MUS 113 Jazz Ensemble (0.5) (Section 1: Jazz Band) Full size band, performs on campus each semester. Other activities include performances with guest artists, jazz festivals, and regional tours. Audition required. (Section 2: Chamber Jazz) Chamber jazz ranges in size from 5 to 8 players in a setting which includes rhythm (drums, bass, keyboard, and or guitar) and winds (trumpet, saxophone, trombone). The primary focus will be on improvisation. Open to all university students. Prerequisite: permission of the instructor.
MUS 114 Saxophone Ensemble (1)
MUS 115 Clarinet Ensemble (1)
MUS 116 Woodwind Chamber Ensemble (1)
MUS 117 Flute Ensemble (1)
MUS 118 Small Jazz Ensemble (1)
MUS 119 Guitar Ensemble (1)
MUS 120 University Symphony Orchestra (1) Select 60 member ensemblethatpresentsseveralconcertseachsemesterfeaturingstandard orchestral repertoire. Open to both music majors and non-majors from across the University community. Audition required.
MUS 122 String Chamber Ensemble (1)
MUS 125 Brass Ensemble (1)

## MUS 127 Percussion Ensemble (1)

MUS 129 Commercial/Popular Music Ensemble (.5) Instrumental, vocal, or mixed musical ensemble. Varies in size each semester. Group presents a live performance and produces a recording each semester and explores repertoire related to rock, popular, or other commercial music genres. Repeatable course. Content changes each time the course is offered. Does not replace major ensemble requirement for music majors.
MUS 130 University Choir, Women Chorus, and Mixed Choir (1) (Section 1: University Choir) Composed of the finest vocal talent on campus, this choir has built a reputation for performances of major choral-orchestralmasterworks,a cappellamusic, partsongs,andspirituals.Ithastouredextensively.Auditionrequired.Sectionplacement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 2: Women's Chorus) Presents a choral concert each semester and participates in the annual Holiday Pops concert. Some musical/choralbackgroundandabriefauditiontoassess pitch-matching ability is required. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 3: Mixed Choir) A large choir for men and women from across campus, this choirfocuses on a variety of choral music and choral styles in the traditional SATB format. Typically, Mixed Choir performs on programs alongside Women's Chorus, but also joins with University Choir for large works for soprano, alto, tenor, and bass voices. Brief audition required. Repeatable course. Content changes each time course is offered. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities.
MUS 132 Kantorei (1) Explores vocal chamber repertoire with specificemphasisonsixteenthandearlyseventeenth centurymadrigals and motets. Audition and concurrent enrollment in MUS-130-430 sec. 01 (University Choir) required.
MUS 138 Opera Main Stage (1) Emphasis on broadening knowledgeandskillsthroughstudiesand performances ofextendedopera scenes, full-lengthopera productions, orotherpublicperformances of repertoire.
MUS 139 Keyboard Accompanying (1) Instruction in the technique andartofmusical collaborationonthepiano,organandharpsichord.
MUS 140 Diatonic Harmony (5) Intensive instruction in basic musical notational and aural materials, followed by study and analysis of diatonicharmony (intervals, triadandseventhchords, harmonicprogressionandvoiceleading).Integratedapproachincludesauralskills and sight singing training. Credit not given for both MUS 140 and 141.Prerequisite:TheoryAssessment Testorpermission ofinstructor.

MUS 141 Diatonic Harmony (3) Study and analysis of diatonic harmony including intervals, triad and seventh chord structure, harmonic progression and voice leading. Integrated approach that includes aural skills and sightsinging training. Prerequisite:Successful completion of theory assessment or permission of the instructor.
MUS 142 Chromatic Harmony (3) Continued study and analysis to include chromatic harmony (secondary dominants, Neapolitan chords, augmented sixth chords, mode mixture, and modulation) withintegration ofauralskillsandsightsingingtraining.Prerequisite: MUS 140 or 141.
MUS 143 Music Fundamentals (2) This course is intended for students with little or no background in music who would like to develop a practical understanding of the fundamentals of music. The course helps students grasp elements such as pitch, melody, rhythm, meter, and basic harmony. The course will help students develop practical fluency in music notation in both treble and bass clef, layout of piano keyboard, and practical application of that fluency through simple vocal, rhythm (percussion), and
piano keyboard exercises. Assignments will include written exercises in music notation, basic theory concepts (e.g. scales and key signatures), simple chord identification, and listening assignments (e.g. identifying major and minor mode, meter, etc. based on listening examples.)
MUS 154 Introduction to Music (3) Non-technical approach to the history of music as an art in Western society from its beginnings to the present day, with a focus on the music and composers of the last 300 years. Not open to music majors.
MUS 155 Music and Film (3) Survey of the union of music and film fromitsearliestinceptiontothepresentwithafocusontheAmerican motion picture industry and its musical traditions.
MUS 156 Music in America (3) Survey of music in the United States from colonialtimestothepresentwithafocusonthedevelopmentof an American musical style and language in the art, folk, and popular realms.

MUS 158 Jazz History (3) Survey of the history of jazz, the development of major stylistic trends and principal contributors to the medium. Includes aural stylistic analysis.
MUS 159 History of Musical Theatre (3) The History of Musical Theatre is an intense study of musical theatre genres, composers, lyricists, performers, directors, andchoreographers andtheircontributions to this musical form in America from 1750 to the present. Includes consideration of how music theatre developed from, and reflected the cultural, social, and political landscape of its time. Studentswilldemonstratetheacquisitionofthisknowledgethrough written assignments, quizzes, exams, and presentations.
MUS 171 Foundations of Music Education (3) This course is a survey of the music education profession inthe United States. It includes an overviewofprofessionalqualificationsandresponsibilities, historyof music education in the United States and its influences, philosophical and theoretical positions in music education, an introduction to developmentalandpsychological conceptsoflearningandcognition in the context of the music classroom, the importance of music in schools. Includes fundamentals of music education curriculum, state and national standards, standards-based lesson planning, and assessment.Includesdevelopmentofessential professionalskillssuch aswriting, communication, andusing appropriatetechnology.Some field experiences included.
MUS 184 Orientation to Music Therapy (3) Examines music therapytreatmentprinciplesandstrategies withvarious populations, the history of the use of music in therapy, the role of the music therapist ontheinterdisciplinaryteam, musictherapyliterature.Studentsmust earn a grade of C - or better.
MUS 188 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All training conducted under the supervision of a qualified musical therapist. A grade of B- or better must be earned. This course is one of the six practica that must be completed before student is eligible to begin a full-time internship. Open to music therapy majors only and not open to first-semester freshman. This course can be repeated only once
MUS 193 Introduction to Music Technology (3) Survey of a variety of facets of music technology. Provides foundations, vocabulary, and concepts related to audio theory, digital audio workstations, and music notation. Introduction to use of equipment in university facilities
MUS 200 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15
performanceseachsemesteraccordingtotheguidelinesestablishedin theMusicStudentHandbookand completeattendance verification for each. No prerequisite. Pass/fail.
MUS 201 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin theMusic Student Handbook and completeattendance verification for each. No prerequisite. Pass/fail.

MUS 204 Basic Piano III (1) Advanced group instruction with moreadvancedsoloandensembleworkandemphasisontechnique, sight-reading, harmonization,improvisation,transposition,memorization, and accompanying. Designed to prepare for the Piano Proficiency II. Prerequisites: MUS 105; completion of Piano Proficiency I; permission of instructor.
MUS 205 Basic Piano IV (1) Advanced group instruction with more advanced solo and ensemble work and emphasis work and emphasisontechnique,sight-reading,harmonization,improvisation, transpositionandaccompanying.Designedto prepareforthePiano Proficiency II. Prerequisites: MUS 105; completion of the Piano Proficiency l; permission of instructor.
MUS 210 Univ Bands (1) (Section 1) Includes the finest wind and percussion students within and outside the Department of Music. Presentsseveralconcertseachsemesterfeaturingadvancedlevelmusic andservesasoneofthetouringensembles.Studentsalso participate in University Band and Aces Brass as part of this course. Audition requiredeachsemesterforentranceandseating placement. (Section 2) Presents a concerteach semester.Smaller groupsfrom withinUniversity BandmakeupAcesBrass, which performsathomebasketball games and MVC and NCAA tournaments. Open to music majors and non-majors. No audition required; seating at discretion of director.
MUS 213 Jazz Ensemble (0.5) (Section 1: Jazz Band) Full size band, performs on campus each semester. Other activities include performances with guest artists, jazz festivals, and regional tours. Audition required. (Section 2: Chamber Jazz) Chamber jazz ranges in size from 5 to 8 players in a setting which includes rhythm (drums, bass, keyboard, and or guitar) and winds (trumpet, saxophone, trombone). The primary focus will be on improvisation. Open to all university students.

## MUS 214 Saxophone Ensemble (1)

MUS 215 Clarinet Ensemble (1)
MUS 216 Woodwind Chamber Ensemble (1)
MUS 217 Flute Ensemble (1)
MUS 218 Small Jazz Ensemble (1)
MUS 219 Guitar Ensemble (1)
MUS 220 University Symphony Orchestra (1) Select 60 member ensemblethatpresentsseveralconcertseachsemesterfeaturingstandard orchestral repertoire. Open to both music majors and non-majors from across the University community. Audition required.
MUS 222 String Chamber Ensemble (1)
MUS 225 Brass Ensemble (1)
MUS 227 Percussion Ensemble (1)
MUS 229 Commercial/Popular Music Ensemble (.5) Instrumental, vocal, or mixed musical ensemble. Varies in size each semester. Group presents a live performance and produces a recording each semester and explores repertoire related to rock, popular, or other commercial music genres. Repeatable course. Content
changes each time the course is offered. Does not replace major ensemble requirement for music majors.
MUS 230 University Choir, Women Chorus, and Mixed Choir (1) (Section 1: University Choir) Composed of the finest vocal talent on campus, this choir has built a reputation for performances of major choral-orchestralmasterworks,acappellamusic, partsongs,andspirituals.Ithastouredextensively.Audition required.Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 2: Women's Chorus) Presents a choral concert each semesterand participates inthe annual Holiday Pops concert. Some musical/choralbackgroundandabriefauditiontoassess pitch-matching ability is required. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 3: Mixed Choir) A large choir for men and women from across campus, this choir focuses on a variety of choral music and choral styles in the traditional SATB format. Typically, Mixed Choir performs on programs alongside Women's Chorus, but also joins with University Choir for large works for soprano, alto, tenor, and bass voices. Brief audition required. Repeatable course. Content changes each time course is offered. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities.

MUS 232 Kantorei (1) Explores vocal chamber repertoire with specificemphasisonsixteenthandearlyseventeenth centurymadrigals and motets. Audition and concurrent enrollment in MUS-130-430 sec. 01 (University Choir) required.
MUS 236 Guitar and Voice Techniques I (1) Develops proficiency for playing a variety of songs on guitar and explores techniques for teachingguitar.Thecoursealsodevelopsvocaltechniques and proficiencyin properlyusingthespeakingandsingingvoice.Studentswill learntosingandaccompanyabasicrepertoireoftraditional,folk,and popular songs. Prerequisite: Music major or minor or permission of instructor. Students must earn a grade of C - or better.

MUS 237 Guitar and Voice Techniques II (1) Develops proficiency for playing on guitar and singing a variety of songs. Students will develop their singing voices and learn to sing and accompany a repertoireoffolkand popularsongs representingvariouserasandstyles. Prerequisite: MUS-236 or permission of instructor. Students must earn a grade of C - or better.
MUS 238 Opera Main Stage (1) Emphasis on broadening knowledgeandskillsthroughstudiesand performancesofextendedopera scenes, full-lengthopera productions,orotherpublicperformances of repertoire.

MUS 239 Keyboard Accompanying (1) Instruction in the technique andartofmusicalcollaborationonthepiano,organandharpsichord.
MUS 241 Introduction to Form (3) Introduces fundamental designs, processes, andstructures ofmusic oftheeighteenth and nineteenth centuries. Continues aural skills and sightsinging training. Prerequisite: MUS 142.
MUS 242 Post-Tonal Theory (3) Covers a wide range of analytical approaches to post-tonal music, with an emphasis on major works from the 20th and 21st centuries. Topics include scalar music, free atonality, serialism, neo-classicism, minimalism, and some recent compositional trends. Prerequisite: MUS 142.
MUS 243 Jazz Theory (2) Introduces specialized terminology of jazz theory and relates it to traditional harmony through the study and analysis of jazz music. Topics include chord construction and the II-V-I progression through scale theory, the blues, chord changes, slash chords, the bebop and pentatonic scales, how to read a lead sheet,basictunememorization, andre-harmonization.Prerequisites: MUS 142 and MUS 105 or permission of instructor.

MUS 245 Jazz Improvisation (2) Introduction to jazz improvisation
with concepts and usage of jazz harmony. Experience with use of scale-chord relationships, jazz notation, ear training, rhythmic concepts, jazzstyle, and articulation. Students required to improvise on theirdeclaredmajorinstrument.Developmentofinstructionalstrategiesforuseinteachingimprovisationalsoaddressed. Prerequsites: MUS 105, 142, and 243, or permission of instructor.
MUS 260 Suzuki Pedagogy I (2) In-depth study of the philosophy andpedagogyoftheSuzukiTalentEducationviolinmethodfounded by Shinichi Suzuki. Includes the repertoire contained in the foundationunitsoutlinedintheSuzukiAssociationoftheAmericas'Teacher Development Document. Emphasis on both pedagogical understanding and performance skills of the repertoire. Must be taken in order unless special permission obtained from the instructor. Open to violinists and violists only. Prerequisite: Ability to meet Suzuki Association requirementsforbeginningleveltrainingandPermission of the instructor.
MUS 261 Suzuki Pedagogy II (2) In-depth study of the philosophy and pedagogyoftheSuzukiTalentEducationviolinmethodfounded by Shinichi Suzuki. Includes the repertoire contained in the foundationunitsoutlinedintheSuzukiAssociationoftheAmericas'Teacher Development Document. Emphasis on both pedagogical understanding and performance skills of the repertoire. Must be taken in order unless special permission obtained from the instructor. Open to violinists and violists only. Prerequisite: Ability to meet Suzuki AssociationrequirementsforbeginningleveltrainingandPermission of the instructor.

MUS 262 Woodwind Techniques and Pedagogy I (1) Develops practicaland pedagogicalknowledgeofflute,singlereed,anddoublereed instrumentswithemphasisonperformingskills.Coversunderstandingandapplication ofvariousfacets ofwoodwind playing.Prerequisite: Music major or minor or permission of instructor.
MUS 263 Brass Techniques and Pedagogy I (1) Develops practical knowledgeofthefourmajorbrassinstrumentswithemphasisonperformingskills.Coversunderstanding andapplication ofvariousfacets ofbrass playing. Prerequisite:Music majoror minor or permission of instructor.

MUS 264 Percussion Techniques (1) Develops practical and pedagogical concepts ofthemajororchestralandworld percussioninstruments through performance and listening activities. Prerequisite: Music major or minor or permission of instructor.
MUS 265 String Techniques and Pedagogyl(1) Develops proficiency inonestringinstrumenteachsemester.Emphasisonheterogeneous classroomteachingtechniquesforbeginningstringstudents.Prerequisite: Music major or minor or permission of instructor.

MUS 270 Teaching Music in the Elementary School (3) Presents non-musiceducatorswithinformationandskillsforintegratingmusic fundamentals into the regular elementary classroom. Emphasizes pedagogicalandmusical performancewithinthestudyand practice of music education as well as the importance of music for developmentalimprovementinotheracademicareas.Prerequisite:Education 100.

MUS 271 Practicum in School Music Experiences (2) The course will provide the opportunity to observe professional music educators interating with students in a real time setting and initiate discussion regarding trends and practices in music education.
MUS 272 Woodwind Techniques \& Pedagogy II (1)
MUS 273 Brass Techniques and Pedagogy II (1)
MUS 275 String Techniques and Pedagogy II (1) Develops proficiency in one string instrument. Emphasis on heterogeneous classroomteachingtechniquesforbeginningstringstudents.Prerequisite:

Music majors of minors or permission of instructor.
MUS 286 Approaches and Materials in Music Therapy Practice (3) Examines the American Music Therapy Association Standards of Practice and the implementation of various treatment strategies in musictherapy.Developsabilityto write treatment plans,implement structuredmusictherapysessions, anddocumentprogress. Prerequisite:MUS 184orpermission of instructor.Students mustearna grade of C - or better.

MUS 287 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All training conductedunderthesupervision ofaqualifiedmusical therapist. A grade of B - or better must be earned. This course is one of the six practicathatmustbe completed beforestudent is eligible to begina full-timeinternship.Opentomusictherapymajorsonlyandnotopen to first-semester freshman. This course can be repeated only once.
MUS 288 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All trainingconductedunderthesupervision ofaqualifiedmusicaltherapist. A grade of B - or better must be earned. This course is one of the six practicathat mustbe completed beforestudentiseligibleto begina full-timeinternship.Opentomusictherapymajorsonlyandnotopen to first-semester freshman. This course can be repeated only once.

MUS 293 Electronic Music Media (3) Overview of MIDI based computer workstations, including system integration and components. Also covers MIDI protocols and sequencing techniques.
MUS 300 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performances each semester according to the guidelines established in the Music Student Handbook and complete attendance verification for each. No prerequisite. Pass/fail.
MUS 301 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin theMusicStudentHandbookand completeattendanceverification for each. No prerequisite. Pass/fail.
MUS 310 University Bands (1) (Section 1) Includes the finest wind andpercussionstudentswithinandoutsidetheDepartmentofMusic. Presentsseveralconcertseachsemesterfeaturingadvancedlevelmusic andservesasoneofthetouringensembles.Studentsalsoparticipate in University Band and Aces Brass as part of this course. Audition requiredeach semesterforentranceandseating placement. (Section 2) Presents a concerteach semester. Smallergroups from within UniversityBandmakeupAcesBrass, which performsathomebasketball games and MVC and NCAA tournaments. Open to music majors and non-majors. No audition required; seating at discretion of director.
MUS 313 Jazz Ensemble (0.5) (Section 1: Jazz Band) Full size band, performs on campus each semester. Other activities include performances with guest artists, jazz festivals, and regional tours. Audition required. (Section 2: Chamber Jazz) Chamber jazz ranges in size from 5 to 8 players in a setting which includes rhythm (drums, bass, keyboard, and or guitar) and winds (trumpet, saxophone, trombone). The primary focus will be on improvisation. Open to all university students.
MUS 314 Saxophone Ensemble (1)
MUS 315 Clarinet Ensemble (1)
MUS 316 Woodwind Chamber Ensemble (1)
MUS 317 Flute Ensemble (1)

## MUS 318 Small Jazz Ensemble (1)

MUS 319 Guitar Ensemble (1)
MUS 320 University Symphony Orchestra (1) Select 60 member ensemblethatpresentsseveralconcertseachsemesterfeaturingstandard orchestral repertoire. Open to both music majors and non-majors from across the University community. Audition required.
MUS 322 String Chamber Ensemble (1)
MUS 325 Brass Ensemble (1)
MUS 327 Percussion Ensemble (1)
MUS 329 Commercial/Popular Music Ensemble (.5) Instrumental, vocal, or mixed musical ensemble. Varies in size each semester. Group presents a live performance and produces a recording each semester and explores repertoire related to rock, popular, or other commercial music genres. Repeatable course. Content changes each time the course is offered. Does not replace major ensemble requirement for music majors.
MUS 330 University Choir, Women Chorus, and Mixed Choir (1) (Section 1:University Choir) Composed of the finest vocal talent on campus, this choir has built a reputation for performances of major choral-orchestralmasterworks,a cappellamusic, partsongs, andspirituals.Ithastouredextensively.Auditionrequired.Sectionplacement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 2: Women's Chorus) Presents a choral concert each semester and participates in the annual Holiday Pops concert. Some musical/choralbackgroundandabriefauditiontoassesspitch-matching ability is required. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 3: Mixed Choir) A large choir for men and women from across campus, this choirfocuses on a variety of choral music and choral styles in the traditional SATB format. Typically, Mixed Choir performs on programs alongside Women's Chorus, but also joins with University Choir for large works for soprano, alto, tenor, and bass voices. Brief audition required. Repeatable course. Content changes each time course is offered. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities.
MUS 332 Kantorei (1) Explores vocal chamber repertoire with specificemphasisonsixteenthandearlyseventeenthcenturymadrigals and motets. Audition and concurrent enrollment in MUS 130-430 section 01 (University Choir) required.
MUS 336 Introduction to Improvisational Methods (2) Introduces studentstoproperplayingtechniqueonselectedorchestralpercussion instruments, hand-held percussion, and ethnicinstruments.During the courseofthesemesterstudents willdevelop properplayingskills and techniques. Facilitation abilities used in clinical music therapy improvisation willbeexploredanddevelopedusing percussion, keyboard, or other media improvisation exercises. Prerequisite: Music Therapy major, completion of MUS 286 and MUS 288, or permission of instructor. Students must earn a grade of C- or better.
MUS 338 Opera Main Stage (1) Emphasis on broadening knowledgeandskillsthroughstudies and performancesofextendedopera scenes,full-lengthoperaproductions,orotherpublicperformances of repertoire.
MUS 339 Keyboard Accompanying (1) Instruction in the technique andartofmusical collaborationonthepiano,organandharpsichord.
MUS 340 Counterpoint (3) Study of Baroque counterpoint, with an emphasis on model composition. Topics includefiguration prelude, continuousvariation, chorale prelude, invention, andfugue. Prerequisite: MUS 241 or permission of instructor.
MUS 341 Jazz Arranging (2) Covers rudimentary techniques asso-
ciated with the art of arranging jazz music. Introduces two- and three-part writing techniques for the traditional jazz combo and fundamentals ofrange,transposition,lowintervallimits, and performance variants. Prerequisites: MUS 105, 142, and 243 or by permission of instructor.
MUS 343 Form and Analysis (3) A detailed analytical study of a wide variety of musical compositions and forms, ranging from Gregorian Chant to 21st century music. Prerequisite: MUS 242 or permission of instructor.
MUS 346 Orchestration (2) Covers the instruments of the symphony orchestra, theirranges andtranspositions, andtechnical capabilities. Includestranscriptionfromothermediatoorchestral combinations. Prerequisite: MUS 242 or permission of instructor.
MUS 350 Conducting I (3) fundamentals of conducting techniques, score reading, and score study. Students will conduct excerpts from traditional wind, choral, andorchestral repertoire.Prerequisite:MUS 241or permission of the instructor.
MUS 351 Conducting II (2) fundamentals of conducting techniques, score reading, and score study. Students will conduct excerpts from traditional wind, choral, andorchestral repertoire.Prerequisite:MUS 241 or permission of the instructor.
MUS 355 History of Music I (3) A detailed study of the history of music in Western civilization. Focuses on development of musical style and language, resources and technology used by musicians, changing role that music and musicians played in Western culture, and ways in which music and musical life reflected social and politicaldevelopmentsduringdifferenthistoricaleras.Prerequisite:Music major or permission of instructor.
MUS 356 History of Music II (3) A detailed study of the history of music in Western civilization. Focuses on development of musical style and language, resources and technology used by musicians, changing role that music and musicians played in Western culture, and ways in which music and musical life reflected social and politicaldevelopmentsduringdifferenthistoricaleras.Prerequisite:Music major or permission of instructor.
MUS 357 Topics Music History \& Culture (3) These courses will explore various topics within music history. Whether the topic is the music of a certain composer, specific region, time period, or cultural practice,theclasswilltakeaninterdisciplinaryapproachtothestudy ofmusichistory.Thecoursewilloftenincludeahands-oncomponent that will involve a project engaging with the public, working with organizations such as local museums, libraries, or concert venues. This will be a discussion-based course with daily reading and listening,alongwithseveralwritingassignmentsand potentialmulti-media projects (presentations, websites, videos) throughout the semester. Content changes each time course is offered. Repeatable.
MUS 360 Suzuki Pedagogy III (2) Continuation of the study of the p Suzuki Talent Education violin method units begun in MUS 260 and 261. Violinists only after volume four. Prerequisites: MUS 261, or permission of the instructor.
MUS 361 Suzuki Pedagogy IV (2) Continuation of the study of the Suzuki Talent Education violin method units begun in MUS 260 and 261. Violinists only after volume four. Prerequisite: MUS 261, or permission of the instructor.
MUS 366 Introduction to Music Therapy Improvisation (1) Introduces techniques and develops facilitation skills used in improvisation with emphasis on percussion, guitar, keyboard, or mixed media improvisation exercises. Prerequisites: MUS 184, or permission of instructor.
MUS 370 Elementary Methods and Materials in General Music (3)

Focuses on procedures and instructional materials used in teaching generalmusicintheelementaryschool.Developspedagogicalskills in singing, playing, movement and creative exploration. Applies the teaching methods of Dalcroze, Kodaly, Orff and other approaches. Prerequisite: MUS 142 or permission of instructor.
MUS 371 Secondary Methods and Materials in General Music (3) Examinestheoretical, performance,pedagogical,technologicaland integrative skills applied in secondary music education. Introduces strategiesforteachinganddesigningboth performing andnon-performingmusic courses. Investigatesapproachestocurriculumdevelopment, computer-assistedinstruction, assessmentofstandardsand lesson planning. Prerequisite: MUS 142 or permission of instructor.
MUS 372 Methods and Materials in Instrumental Music (3) Focuses on directing, organizing and maintaining a quality choral program at the secondary level. Addresses necessary principles, skills and issues conducivetosuccessfulteachingandadministrating.Provides opportunitiestodevelopteachinganddirectingskills,toreviewand synthesizerelevantliteratureandtofurtherpersonalgrowthand professional preparation. Prerequisites:MUS 142,350;PianoProficiency II exam; or permission of instructor.
MUS 373 Methods and Materials in Instrumental Music (3) Focuses on directing, organizing, and maintaining a quality band and string programatthesecondarylevel.Addressesnecessaryprinciples,skills, andissuesconductivetosuccessfulteachingandadministrating.Providesopportunitiestodevelopteachinganddirectingskills,toreview andsynthesizerelevantliterature, andtofurtherpersonalgrowthand professional preparation. Prerequisites:MUS 142,350;orpermission of instructor.
MUS 374 Piano Pedagogy (1) The study of teaching methods and survey of current materials.
MUS 375 Piano Pedagogy (1) The study of teaching methods and survey of current materials.
MUS 384 Receptive/Compositional Methods in Music Therapy (3) Introduces receptive and compositional methods used in music therapy clinical practice, including song discussion, song writing, movement to music, and music and imagery. Verbal facilitation skills and guidelines for ethical clinical practice will be included. Prerequisite: MUS 286, junior or senior standing, or permission from the instructor. Students must earn a grade of C- or better.
MUS 386 Psychology of Music (3) Examines the psychoacoustical parameters of music; the perception of melody, harmony, rhythm and form; the effect of music on physical, emotional, and spiritual dimensionsofhealth;musicpreferenceandability;neurophysiology and musical behavior; and measurement and evaluation of musical behavior. Prerequisite: MUS 286, junior or senior standing, or permission of the instructor. Students must earn a grade of C - or better.
MUS 387 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All training conductedunderthesupervision ofaqualifiedmusicaltherapist. $A$ grade of $B$ - or better must be earned. This course is one of the six practicathat mustbecompleted beforestudent is eligibleto begina full-timeinternship.Opentomusictherapymajorsonlyandnotopen to first-semester freshman. This course can be repeated only once.
MUS 388 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All training conductedunderthesupervision ofaqualifiedmusicaltherapist. $A$ grade of $B$ - or better must be earned. This course is one of the six practicathatmustbecompleted beforestudent is eligibleto begina full-timeinternship.Opentomusictherapymajorsonlyandnotopen to first-semester freshman. This course can be repeated only once.

MUS 390 Music Management Internship (1) Practical experience in musicmanagementinternshipposition.Prerequisite:Juniorstanding, music management major or permission of the instructor.
MUS 391 Music Business Opportunities (2) Overview of professions inthemusicmanagementbusiness.Includesguestlecturesfromprofessionals in different fields of music management. Projects include research paper or presentation in an area of interest and mock job application.Prerequsites:Sophomorestanding;musicmanagement major; ECON 101, 102; MUS 142; or permission of instructor.

MUS 392 Introduction to Music Business and Technology (3) Overview of current trends relating to music business and music technology. Requires hands-on training of computer software application programs including, but not limited to, sequencing, music notation, interactive applications and office applications. Prerequisites: MUS 142; QM 160; or permission of instructor.
MUS 393 Audio II - Advanced Recording, Mixing and Digital Composition (3) Continuation of study of components of the recording chain, focusing on principles of multi-track recording and mixing techniques and use of outboard signal processing equipment. Curriculum is divided between classroom instruction and hands-on (lab) experiences.Pre-requisite THTR 221 or consent of instructor

MUS 398 Independent Study (1) Individual research and study in special areas. Project and amount of credit to be earned must have approval of Department of Music
MUS 400 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin theMusicStudent Handbookand completeattendance verification for each. No prerequisite. Pass/fail.
MUS 401 Recital Attendance (0) This course exposes students to a variety of musical styles and artistic interpretations through attendance at concerts and recitals. Students will attend a minimum of 15 performanceseachsemesteraccordingtotheguidelinesestablishedin theMusicStudentHandbookand completeattendance verification for each. No prerequisite. Pass/fail.

MUS 410 University Bands (1) (Section 1) Includes the finest wind andpercussionstudentswithinandoutsidetheDepartmentofMusic. Presentsseveralconcertseachsemesterfeaturingadvancedlevelmusic andservesasoneofthetouringensembles.Studentsalsoparticipate in University Band and Aces Brass as part of this course. Audition requiredeachsemesterforentranceandseating placement. (Section 2) Presents a concerteach semester. Smallergroups from withinUniversity BandmakeupAcesBrass, which performsathomebasketball games and MVC and NCAA tournaments. Open to music majors and non-majors. No audition required; seating at discretion of director.

MUS 413 Jazz Ensemble (0.5) (Section 1: Jazz Band) Full size band, performs on campus each semester. Other activities include performances with guest artists, jazz festivals, and regional tours. Audition required. (Section 2: Chamber Jazz) Chamber jazz ranges in size from 5 to 8 players in a setting which includes rhythm (drums, bass, keyboard, and or guitar) and winds (trumpet, saxophone, trombone). The primary focus will be on improvisation. Open to all university students.
MUS 414 Saxophone Ensemble (1)
MUS 415 Clarinet Ensemble (1)
MUS 416 Woodwind Chamber Ensemble (1)

## MUS 417 Flute Ensemble (1)

MUS 418 Small Jazz Ensemble (1)
MUS 419 Guitar Ensemble (1)
MUS 420 Symphony Orchestra (1) Select 60 member ensemble that presentsseveral concertseachsemesterfeaturingstandardorchestral repertoire. Open to both music majors and non-majors from across the University community. Audition required.

MUS 422 String Chamber Ensemble (1)
MUS 425 Brass Ensemble (1)

## MUS 427 Percussion Ensemble (1)

MUS 429 Commercial/Popular Music Ensemble (.5) Instrumental, vocal, or mixed musical ensemble. Varies in size each semester. Group presents a live performance and produces a recording each semester and explores repertoire related to rock, popular, or other commercial music genres. Repeatable course. Content changes each time the course is offered. Does not replace major ensemble requirement for music majors.
MUS 430 University Choir, Women Chorus, and Mixed Choir (1) (Section 1:University Choir) Composed of the finest vocal talent on campus, this choir has built a reputation for performances of major choral-orchestralmasterworks, a cappellamusic, partsongs, and spirituals.Ithastouredextensively.Auditionrequired.Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 2: Women's Chorus) Presents a choral concert each semester and participates in the annual Holiday Pops concert.Some musical/choralbackgroundandabriefauditiontoassesspitch-matching ability is required. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities. (Section 3: Mixed Choir) A large choir for men and women from across campus, this choirfocuses on a variety of choral music and choral styles in the traditional SATB format. Typically, Mixed Choir performs on programs alongside Women's Chorus, but also joins with University Choir for large works for soprano, alto, tenor, and bass voices. Brief audition required. Repeatable course. Content changes each time course is offered. Section placement for MUS 130-430 is at the discretion of the Director of Choral Activities.

MUS 432 Kantorei (1) Explores vocal chamber repertoire with specificemphasisonsixteenthandearlyseventeenthcenturymadrigals and motets. Audition and concurrent enrollment in MUS 130-430 section 01 (University Choir) required.
MUS 438 Opera Main Stage (1) Emphasis on broadening knowledgeandskillsthroughstudiesand performancesofextendedopera scenes,full-lengthoperaproductions, orotherpublicperformances of repertoire.
MUS 439 Keyboard Accompanying (1) Instruction in the technique andartofmusical collaborationonthepiano,organandharpsichord.

MUS 451 Literature of the Applied Major (2) Survey of instrumental orvocalliterature.Offeredforpiano,organ, harpsichord, harp, guitar, voice and all orchestral instruments. Prerequisite: Permission of the instructor.
MUS 460 Suzuki Pedagogy V (2) Study of advanced techniques and literature of Suzuki violin method and supervised teaching in the University of Evansville Suzuki Talent Education Violin Program. Prerequisites: MUS 361.
MUS 461 Suzuki Pedagogy VI (2) Study of advanced techniques and literature of Suzuki violin method and supervised teaching in the University of Evansville Suzuki Talent Education Violin Program.

Prerequisites: MUS 361.
MUS 474 Pedagogy of the Applied Major (2) Survey of pedagogical literature and techniques. Offered forvoice and all orchestral instruments. Prerequisite: permission of the instructor.
MUS 476 Marching Band Techniques (2) Examines characteristics, techniques and fundamentals of marching band. Emphasizes drill designviacomputer-assistedcharting.Observationand participation activities required with local high school marching bands. Prerequisite: MUS 373 or permission of instructor.
MUS 478 Student Teaching in Music (5) Observing and teaching dailyundersupervisionofthecriticteacherandUniversitysupervisor for a period of eightweeks. This studentteaching experience is to be in conjunction with MUS 479. It may be in a different area of music education

MUS 479 Student Teaching in Music (6) Observing and teaching dailyundersupervisionofthecriticteacherandtheUniversitysupervisor for the length of semester.
MUS 486 Music Therapy Research (4) Presents an overview of quantitativeandqualitativeresearchmethodsusedinmusictherapy. Includes methods to critically review music therapy research and incorporate research findings into clinical practice. Culminates with the creation of an individual research project proposal. Prerequisite: MUS 286 or permission of instructor. Students must earn a grade of C- or better.
MUS 487 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All trainingconductedunderthesupervision ofaqualifiedmusicaltherapist. A grade of B- or better must be earned. This course is one of the six practica that must be completed beforestudent is eligibleto begina full-timeinternship.Opentomusictherapymajorsonlyandnotopen to first-semester freshman. This course can be repeated only once.
MUS 488 Music Therapy Practicum (1) This course provides clinical training at various treatment facilities throughout the city. All training conducted under the supervision of a qualified music therapist. A grade of B - or better must be earned. This course offers additional training or a unique learning opportunity beyond the required six courses. It must be completed before student is eligible to begin a full-time internship. Open to upper level music therapy majors only. This course cannot be repeated.
MUS 493 Concepts of Organ Design I (1) Survey of pipe organ designandhistoryspecificallyastheyrelatetostylisticallyappropriate performance. Prerequisite: Permission of the instructor.
MUS 494 Concepts of Organ Design II (1) Survey of pipe organ designandhistoryspecificallyastheyrelatetostylisticallyappropriate performance. Prerequisite: Permission of the instructor.
MUS 495 Servc Playing/Improvisation I (1) Practical skills for the church organist: hymn playing, chant accompaniment, anthem accompaniment,score reading, conducting from the console and improvisation. Prerequisite: Permission of the instructor.
MUS 496 Servc Playing/Improvisation II (1) Practical skills for the church organist:hymn playing, chant accompaniment, anthem accompaniment, score reading, conducting from the console and improvisation. Prerequisite: Permission of the instructor.
MUS 498 Seminar in World Music (3) Senior capstone course. Concentrates on music beyond that of the Western art music tradition. Discussion centers on music and musical cultures of diverse regions oftheworldandeachstudentfocusesononespecificregionforclass presentation and a seminar paper. Prerequisite: FYS 112.
MUS 499 Music Workshop (1) Presents special topics workshops in
various specific areas ofmusic. Instruction by University faculty may be augmented by outstanding authorities in the field. Prerequisite: Permission of the instructor.

## Neuroscience (NEUR)

Neuroscience courses are taught by faculty in the Departments of Biology, Chemistry, or Psychology that have advanced training and study in neuroscience.
NEUR 125 Introduction to Neuroscience (3) Surveys development, organization, andfunction ofthe human brain and nervous systemhowwesense, move,feel, andthink. Introducesneuralbasesofmood, emotion,sleep,learning,memory, language, andattention. Assumes minimal prior knowledge of biology, physics, and chemistry.
NEUR 126 Neuroscience Techniques (2) The aim of this course is to providestudentswithexperiencewithlaboratorytechniques,experimental paradigmsandreal-lifeexposuretotheconceptsandresearch findings in Neuroscience. Prerequisite/Corequisite: NEUR 125. Fall.
NEUR 280 Social, Cooperative and Affective Neuroscience (3) This course will examine interactions between organisms under a variety of circumstances. This will be done by considering studies of play, aggression, mating, parental care, altruism, and vicarious learning. We will explore the psychological factors that govern these interactions, as well as what is known about the neurobiological mechanisms on which they depend.
NEUR 355 Sensation and Perception (3) Examines perceptual processing of sensory information in vision, hearing, touch, taste, and smell. Examines psychophysics and the influence of personality and environmental factors in human perception. Examines neuropsychology and perceptual abnormalities resulting from brain damage. Prerequisites: NEUR 125 and PSYC 121. Spring.
NEUR 357 Neuropsychology (3) Examines the function and organization of the nervous system and the role of the nervous system in controlling behavior. Topics include nervous system structure and functions as it relates to sensory processing, movement, sleep, reproductive behavior, emotional behavior, learning and memory, stress and health, neurological disorders, and select psychiatric disorders. Current research methodology and experimental findings emphasized. Prerequisites: BIOL 100 or higher; PSYC 121. Fall.
NEUR 360 Neuropharmacology (3) Topics include how drugs affect the human nervous system at molecular, cellular, system and behavioral levels. This includes interactions of neurotransmitters, neuropeptides, neurohormones, neuromodulators, enzymes, second messengers, co-transporters, ion channels, and receptor proteins in the central and peripheral nervous systems. Pharmacological treat of neurological disorders including pain, neurodegenerative diseases, psychological disorders, and addiction are examined. Prerequisite: NEUR 125.
NEUR 411 Molecular Neuroscience (3) Lectures cover the molecular and cellular basis of nervous system function. Topics include: electrophysiology, passive and active properties of the membrane, synaptic transmission, common intracellular signaling pathways, neural induction, axon guidance, synaptic development sensation, motor function, and memory. The lab section involves gene expression analysis, from primer design to realtime polymerase chain reaction. Prerequisites: NEUR 125 and BIOL 107 or BIOL 119 are required. Recommended: PHYS 122 or PHYS 211. Fall.
NEUR 479 Research in Neuroscience (0-3) Involves participation in the planning, designing, running, analyzing and presenting of a research project under the direct supervision of a faculty member.

A written and oral report of the literature search and laboratory work is required. The project must be approved by the proper Ethics Committee (IRB for human studies, IACUC for animal studies) to receive credit. Content changes each time the course is offered. Course may be repeated up to 6 credit hours. Prerequisite: NEUR 125. Fall, spring.

NEUR 489 Internship in Neuroscience (0-3) Involves participation in an internship while under the direct supervision of professional personnel.Weeklyclassdiscussionsfocusonexperiencesand professional developmentissues.Awrittenreportincludingasummaryofthefield ofNeuroscienceinwhichtheinternshipoccurred,workaccomplished during the semester and learning experiences gained during the semester is required. The internship must be approved by the Director of the Neuroscience Program to be able to enroll. Course may be repeated up to 6 credit hours. Prerequisite: NEUR 125. Fall, spring.

NEUR 499 Special Topics in Neuroscience (1-3) Lectures, seminars or discussions of topics not covered in regular course offerings. Provides an opportunity to engage in topics of special interests within the broad field of neuroscience. Course is repeatable up to 6 credit hours.Contentchangeseachtimethecourseisoffered.Prerequisite: NEUR 125.

## Nursing (NURS)

Nursing courses are taught by the faculty of the Dunigan Family School of Nursing.
NURS 165 Survey of Professional Nursing (3) Introduction to the role of the nurse within the framework of the Dungan nursing model of Dynamic Integration. Explores historical, social, legal, ethical, cultural, and research components of professional nursing practice (3 clock hours).
NURS 170 Therapeutic Relationships (3) Provides beginning knowledge of nursing modalities used to facilitate health. Specific modalities include supportive counseling, teaching, social support, and alternativecare.Opportunitiestousenursingmodalitiesmayinclude simulations and interviews with healthy people (3 clock hours).
NURS 261 Fundamentals of Professional Nursing I with Clinical Component (3) Focuses on the promotion of healthy physiological responses and the provision of a safe environment for healthy and vulnerable individuals. Includes clinical laboratory instruction and practice in modalities to provide a safe environment and promote healthy physiological responses for healthy and vulnerable adults. Didactic portion ( 3 clock hours) and the modality of direct care clinical component (9 clock hours) for this 8-week course. Prerequisites: EXSS 112, 113; CHEM 108. Corequisite: NURS 262. Fall.

NURS 262 Fundamentals of Professional Nursing II with Clinical Component (3) Focuses on the promotion of healthy physiological responses and the provision of a safe environment for healthy and vulnerable individuals. Includes clinical laboratory instruction and practice in modalities to provide a safe environment and promote healthy physiological responses for healthy and vulnerable adults. Didactic portion (3 clock hours) and the modality of direct care clinical component ( 9 clock hours) for this 8 -week course. Prerequisites: Nursing 261
NURS 264 Physical Assessment With Lab (3) Class component for NURS 264 Physical Assessment with lab. Introduces the assessment of health within the Dungan Model of Dynamic Integration (developmental, cultural, physiological cognitive, psychological, behavioral,spiritual, and social support). Focus is on assessment of individuals and families across the life span. Practice component provided(2 lab hours, 4 clock hours). Prerequisites: EXSS 112,

113; CHEM 108 or 118 or admission to the RN to BSN program.

NURS 271 Healthy Families Across the Lifespan (3) Focuses on the lifecycleofa healthyfamilybeginning atconception.Addressesfamilydevelopment, maternity care, transitions, and common problems of healthy families (3 clock hours). Prerequisites: NURS 160 or 165, 261, 262, 264; BIOL 110; NUTR 304. Corequisite: NURS 272. Spring.

NURS 272 Clinical Component of Healthy Families (3) Clinical laboratoryincludesinstructionand practiceinthemodalitiesofdirect care, teaching, counseling, alternative care, and social support in healthy families. Focus on clients and families of all ages, especially childbearing, child rearing, and aging family (9 clock hours). Prerequisites: NURS 160 or 165, 261, 262, 264; BIOL 110; NUTR 304. Corequisite: NURS 271. Spring.
NURS 351 RN to BSN Transitions to Professional Nursing (6) Providesoverviewofthephilosophyofbaccalaureatenursingeducation and role of the nurse within the framework of the Dungan Nursing Model of Dynamic Integration. Guides the RN student with unique life and work experiences to conceptualize changes in professional nursing roles. Topics include caring interaction in nursing, nursing process, health promotion and maintenance, health care delivery system, nursingtheory,learningtheories, andcontemporarynursing. Provides forum for discussion of changing perceptions and dimensions of professional nursing(6clockhours). Prerequisite:Admission to RN to BSN Program.
NURS 361 Medical Surgical Nursing I (3) Focuses on vulnerable individuals and families across the life span with an emphasis on pediatricclients, whoare intransition due totheir responses to com-monillness-relatedphenomenasuchaspain,inflammation,infection, neoplasia,alteredimmunity,surgicalintervention,orfluid/electrolyte imbalances,accidentsand poisoning, gastrointestinaldisorders,congenital and developmental disorders (3 clock hours). Prerequisites: All 100- and 200-level nursing courses; HS 205. Corequisite: NURS 362. Fall.

NURS 362 Clinical Component of Adult and Pediatric Medical Surgical Nursing I (2) Clinical laboratory includes instruction and practicewiththemodalities ofdirectcare,teaching, counseling, alternative care, social support in persons or families in transition related to their responses to common illness-related phenomena. Primary focus is on pediatric and surgical clients including their families (6 clock hours). Prerequisites: All 100-and 200-level nursing courses; HS 205. Corequisite: NURS 361. Fall.
NURS 363 Mental Health Nursing (3) Focuses on individuals and their families who are vulnerable or in transition due to acute or chronicmentalhealthproblemssuchasmoodandthoughtdisorders, anxietydisorders,substanceabuse,andmanipulativeorangrybehavior (3 clock hours). Placement: Junior. Prerequisites: All 100-and 200-level nursing courses; HS 205. Corequisite: NURS 364. Fall.
NURS 364 Clinical Component of Mental Health Nursing (2) Clinicallaboratory includesinstructionand practice withthemodalities of counseling,teaching, andsocialsupportwithindividualsandgroups. Focuses on the client and family with acute or chronic problems in mental health (6 clock hours). Placement: Junior. Prerequisites: All 100- and 200-level nursing courses; HS 205. Corequisite: NURS 363. Fall.

NURS 369 Strategies for Professional Nursing Practice I (1) This coursefocuses on the development oftesttaking skills and preparation for the NCLEX exam. Evaluations will be completed to allow fordevelopmentofindividualspecificinterventionsforimprovement. Prerequisite: Completion of 200-level nursing courses.

NURS 371 Medical Surgical Nursing II (3) Focuses on vulnerable individuals and families across the life span who are in transition related to common illnesses causing alterations in fluid and gas transport, metabolism, digestion, and elimination (3 clock hours). Prerequisites: NURS 361, 362, 363, 364. Corequisites: NURS 373, 374. Spring.

NURS 373 Medical Surgical Nursing III (3) Focuses on vulnerable individuals and families across the life span who are in transition related to commonillnesses causing alterationsin reproductionand sexuality, cognition, sensation and motion, and immunity (3 clock hours). Prerequisites: NURS 361, 362,363, 364. Corequisites: NURS 371, 374. Spring.
NURS 374 Clinical Component Medical Surgical Nursing II and III (4) Clinical laboratory includes instruction and practice with modalities ofdirectcare,teaching, counseling, alternativecare,social support in persons or families in transition related to disruptions of energy and protection (12 clock hours). Prerequisites: NURS 361, $362,363,364$. Corequisites: NURS 371,373. Spring.
NURS 385 Research and Evidence-Based Practice in Nursing (3) Extendsfocusonevidence-based practicebyexaminingthespecific roleofresearchinthedevelopmentofthebodyofnursingknowledge. Primary emphasis on the nurse as a consumer of research findings (3 clock hours). Prerequisite: Statistics.
NURS 395 Special Topics in Health Care and Nursing (1) Specific health care and nursing topics. Classroom and experiential learning experiences appropriate.
NURS 463 Leadership and Management in Professional Nursing (3) Focuses ontheprinciples ofleadershipandmanagementastheyare practicedinnursing.Concepts oforganizationalbehaviorandtransformationandtransactualleadershipareemphasizedalongwithclient advocacy,changeagency,power,and politics.Prerequisite:Completion of all junior level courses or admission to the RN to BSN option.
NURS 467 Global Health Nursing (3) Focuses on individuals,families, and groups within the community. Emphasis on vulnerable populations, theirhealth, and the provision of health care. Examines health ofthecommunity includingcommunicabledisease,environmental healthhazards,mortalityandmorbidity, andepidemiology (3 clock hours). Placement: Senior. Prerequisites: All 300-level nursing courses or admission to the RN to BSN program. Corequisite: NURS 468.

NURS 468 Clinical Component of Global Health Nursing (4) Clinicallaboratory includes instruction and practice with the modalities ofteaching, counseling, alternativecare, and social support.Focuses onvulnerablegroupswithinthecommunitywhorequirehealth promotion and/or suffer chronicity. Primary emphasis on teaching and social support ( 12 clock hours). Prerequisites: All 300-level nursing courses or admission to the RN to BSN program. Corequisite: NURS 467.

NURS 469 Strategies for Success in Professional Nursing (2) Prepares the student for the NCLEX Examination by reviewing test taking skills,testquestionformats,andessentialknowledgeforprofessional nursing practice. Corequisite: NURS 477, 478.
NURS 474 Clinical Component of US Public Health (2) This clinical laboratory course includes instruction and practice with modalities of teaching, counseling, alternative health, and social support. The focus is on vulnerable groups within the community who require health promotion and/or suffer chronicity. Primary emphasis is on teaching and social support in a community setting. Required of senior students who take NURS 476 and NURS 478 while in Harlaxton.

NURS 477 Complex Medical Surgical Nursing (3) Focuses on individuals and families who are in transition due to complex acute or chronicillnessproblemswhichincreasesusceptibilitytomulti-system failure (3 clock hours). Prerequisites: All 300-level nursing courses or admission to the RN to BSN program. Corequisite: NURS 478.
NURS 478 Clinical Management of Complex Clients (4) Clinical laboratory includes instruction and practice with modalities necessary to promote reintegration in individuals and families with complex acute or chronic illness problems. Clinical experiences include opportunitiesforpracticeindirectcareandleadershiproles(12clock hours). Prerequisites: All 300-level nursing courses or admission to the RN to BSN program. Corequisite: NURS 477.
NURS 484 Professional Nursing Senior Seminar (3) Societal and globalhealthissuescritically examined withemphasisontheimpact on individual consumers, health care providers, and society as a whole.Focuses onrefiningproblemsolvingskills, usingthestudent's liberalandprofessionaleducation.Scholarlypresentationrequired(3 clockhours).Prerequisites:All300-levelnursing coursesoradmission to the RN to BSN program.

## Nutrition (NUTR)

Nutrition is taught by the faculty of the Dunigan Family School of Nursing.
NUTR 304 Nutrition Concepts and Controversies (3) Focuses on basic nutrient requirements and how they are used by the human body throughout the life cycle. A holistic approach with emphasis on physiological factors influencingeating habits(social,economic, cultural,etc.).Currentcontroversiesinthefield ofnutritiondiscussed andclassactivitiesarecoordinatedtostimulatethoughtandjudgment on selected topics. Provides a basic understanding of nutrition for applicationtoone'sownlifestyle.Meetsthegeneraleducationhealth and wellness requirement. Fall and Spring.

## Organizational Leadership (OL)

Organizational leadership courses are taught by instructors in affiliation with the Center for Adult Education staff. Course credits apply only totheorganizationalleadershipdegreeprogram.Enrollmentis limitedtostudentsadmittedtotheOrganizationalLeadershipdegree program.
OL 300 Adult Learner (3) Introduction of characteristics, theories, and practices of adult development and learning. This courseexamines basic assumptions about producing competent, flexible adults who are able to apply knowledge in a changing environment.
OL 310 Applied Leadership (3) Introduction to fundamental conceptsofleadership.Emphasizessupervisor's roles,fosteringrelationships, and motivating and empowering others.
OL 311 Quantitative Skills for Leadership (3) Emphasizes critical thinkingaboutnumericaldata:percentages,ratios,solvingequations, computing and interpreting means, medians, modes, and standard deviations.
OL 312 Human Behavior in Organizations (3) Study of social and psychological factors that influence the supervision of groups and individuals in work settings.
OL 320 Persuasive Written and Oral Communication (3) Emphasis on developing and refining practical written and oral presentation skills. Writing intensive course.
OL 321 Principles and Issues of Human Resources (3) Study of theories, principles, and practices involvedinorganizing,supervising, and leadingothers.Emphasisoncommunication,motivation,leadership, evaluation, and compensation of human capital.

OL 322 Leadership Ethics (3) Survey of controversial issues, dilemmas, and quandariesencounteredincontemporarysociety. Emphasizesfundamentalnormsofconductinorganizationandethicalissues thataffectthem, includingemployee-employerrelations, consumer advertising, and the environment.
OL 330 Supervision (3) Development of essential supervisory skills by increasing the students' thinking and knowledge to application. Considers the unique challenges of the 21st century.
OL 350 Leadership Practicum (3) Emphasizes practical application of concepts, theories, and practices of leaders. Students design and implement a problem-solving research project through integration with priorand concurrentcoursework. Includesclass presentations, simulations that combine knowledge and skill.
OL 360 Leadership Practicum (3) Emphasizes practical application of concepts, theories, and practices of leaders. Students design and implement a problem-solving research project through integration with priorand concurrentcoursework. Includesclass presentations, simulations that combine knowledge and skill.
OL 370 Leadership Practicum (4) Emphasizes practical application of concepts, theories, and practices of leaders. Students design and implement a problem-solving research project through integration with priorand concurrentcoursework. Includesclass presentations, simulations that combine knowledge and skill.
OL 410 Leadership: Conflicts and Change (3) Examines impact of conflict,stress,andchangeinorganizations.Emphasizesability ofan organizationtomonitoritselftodetermineneedforchangeinappropriate areas. Participants examine effective change strategies.

OL 411 Leadership: Strategic Decision Making (3) Study of best practicesindecision-making.Approachestoleadershipsuchaspow-er-influence, situational factors, individual traits, and behaviors are exploredasmodels ofdecision-makingtheory.Students requiredto apply decision-making strategies throughout course.
OL 412 Customer Development and Leadership (3) Fundamentals of developing a strong customer base. Emphasis on methods, tools, skills, and techniques required to develop, manage, and market to customers. Considers both external and internal customers.

OL 420 Global Issues Seminar (3) Studies issues involved in living and working in a global environment. Explorestopics such asethics, social responsibility, law, and technology in the international arena.

OL 421 Organizations: a Strategic Approach (3) Principles of planning,organizing,directing, andcontrollingthemanagementprocess. Models,simulations, andcasestudiesusedtodevelopskillsinsetting goals.
OL 422 Leadership: Individual and Team Processes (3) Examines teamprocessandleadershipincludingteamdevelopment,theimportance and challenge of team member diversity, maximizing team creativity, problem-solving, handlingteamconflict, andrevitalizing a passiveorcomplacentteam.Alsoemphasisonleadingandmanaging virtual teams and the unique differences.

OL 450 Leadership Practicum (4) Emphasizes practical application of concepts, theories, and practices of leaders. Students design and implement a problem-solving research project through integration with priorand concurrentcoursework. Includes class presentations, simulations that combine knowledge and skill.
OL 460 Leadership Practicum (3) Emphasizes practical application of concepts, theories, and practices of leaders. Students design and implement a problem-solving research project through integration with priorand concurrentcoursework. Includesclass presentations, simulations that combine knowledge and skill.

## Philosophy (PHIL)

Philosophy courses are taught by the faculty of the Department of Philosophy and Religion.
PHIL 111 Introduction to Western Philosophy (3) Develops and enhances critical thinking skills through the analysis and discussion of perennial philosophical problems. Emphasis on developing critical reading and discussion skills, writing expository and evaluative analysisofextendedargumentprose,andconstructingargumentative essays. Prerequisite: Freshman or sophomore standing (closed to junior and senior students).
PHIL 121 Introductory Ethics (3) Presents a systematic and historical discussion of moral and social values through classical and contemporary readings. Emphasis on applying moral theories to concrete moral problems.
PHIL 211 Ancient Greek Philosophy (3) Develops and analyzes philosophicaltheoriesfromthePre-SocratesthroughtheHellenistic periods. Emphasis primarily on the thought of Plato and Aristotle.

PHIL 231 Symbolic Logic (3) Introduces fundamental principles and techniques of modern symbolic or mathematical logic including truth functional logic, quantification theory, and the logic of relations. Especially suited for students with interests in mathematics and computing science.

PHIL 316 Environmental Ethics (3) Presents a systematic discussion of environmental ethics and key issues therein. Emphasis on applying moral theories to concrete moral problems.
PHIL 317 Bioethics (3) Considers selected problems in bioethics. Topics may include abortion, euthanasia, and genetic engineering. Prerequisite: Junior or senior standing, or permission of instructor.
PHIL 321 Social and Political Philosophy (3) Explores various social and political philosophies regarding howtoideallyconstructsociety.
PHIL 445 History and Philosophy of Science (3) Studies methodological problems of the natural and social sciences from a historical point of view. Also examines the logic of explanation and theory construction. Prerequisite: One course in philosophy, or junior or senior standing in natural or social science.
PHIL 447 Mind, Brain and Action (3) Analyzes the relationship between mental and bodily phenomena and the nature of cognitive. Explores the question of whether consciousness, meaning and free will can be understood within a purely physical framework. Prerequisite: One course in philosophy or permission of instructor.Prerequisite: One course in philosophy or permission of instructor.

## Philosophy and Religion (PHRL)

PHRL 459 Text Seminar in Truth, Meaning, and Value (1-3) Studies philosophical, religious, and ethical texts from various times and traditions in a seminar setting. May be repeated for credit as the selection of texts changes. Prerequisite: Permission of instructor.

## Physical Therapy (PT)

PhysicaltherapycoursesaretaughtbythefacultyoftheDepartments of Physical Therapy and the School of Public Health.

PT 410 Foundations of PT (2) This course introduces the foundational proficiencies necessary for practice in the profession of physical therapy. Topics include body mechanics, elements of documentation (initial encounter, daily note, re-examination, discharge summary), effects of inactivity, foundations of therapeutic exercise, infection control, mobility training, patient/client equipment, patient/client stress, positioning and turning, posture
preparation for patient/client care, proprioceptive neuromuscular facilitation trunk and extremity patterns, range of motion exercise, stretching exercise, transfer training, vital signs, wheelchairs, and wound management. Principles from the Guide to Physical Therapist Practice are incorporated into the course and written documentation, as suggested by the guide, is utilized for specific lab activities. Students participate in initial field experiences in an acute care, inpatient rehabilitation, and pediatric facility. Prerequisite: PT 441.
PT 410L Foundations of Pt Lab (0) Lab that accompanies PT 410, Foundations of Physical Therapy.
PT 412 Physical Interventions (2) This lecture/lab course provides the student with an introduction to the therapeutic modality and otherphysicalinterventionskillscommonlyencounteredinphysical therapy practice.Thecoursecoversthehealing process, painmechanisms,indications/contraindication,and physiological effectsofeach intervention in a lab/lecture experience. The primary interventions coveredincludeelectricalstimulation, hydrotherapy, softtissuemassage, cryotherapy, thermal modalities, electromagnetic modalities, ultrasound, traction, and compression. Prerequisite: PT 441.
PT 412L Physical Interventions Lab (0) Lab that accompanies PT 412, Physical Interventions.
PT414 Foundations of Therapeutic Exercise (2) This course provides thestudentwithanintroductiontocommonlyprescribedtherapeutic exerciseinterventions.Anemphasis will beplacedonunderstanding therapeuticexercisefrom a motor control perspectiveandhow pain affects motor control and patterns of movement. Progression of fundamentalexercisesthroughtheneurodevelopmentalposturesas theyrelatetocommonimpairmentsfoundintheoutpatientphysical therapy setting will be covered. Students will learn the purpose of eachtherapeuticexercisetechniqueanddemonstrateapplicationand critical thinking skills through practical experiences in preparation for future patient management courses. Prerequisite: PT 441.
PT 414L Foundations of Therapeutic Exercise Lab (0) Lab that accompanies PT 414, Foundations of Therapeutic Exercise.
PT 417 Test and Measurements (2) Introduces the basic procedures for objective assessment of the musculoskeletal system through measurement of joint range of motion (ROM) and muscle strength. Laboratory sessions willallow practice in the techniques of goniometry and manual muscle testing (MMT). Inclinometers, hand held dynamometersandisokinetictestingareintroduced.Prerequisite:PT 441. Spring.

PT 417L Test and Measurements Lab (0) Introduces the basic proceduresforobjectiveassessmentofthemusculoskeletalsystemthrough measurement of joint range of motion (ROM) and muscle strength. Laboratory sessions will allow practice in thetechniques of goniometry and manual muscle testing (MMT). Inclinometers, hand held dynamometersandisokinetictestingareintroduced.Prerequisite:PT 441. Spring.

PT 421 Patient Management I Musculoskeletal (8) Initiates patient managementsequence.Expandsupontheanatomical,kinesiological, and therapeutic exercise principles presented in previous courses. Emphasis on examination and assessment of the musculoskeletal system.Commonconditionsandimpairmentsarepresentedandreinforced through use of case examples. Appropriate interventions are addressedconceptuallyand performedinthelaboratory.Addresses concepts and techniques related to proprioceptive neuromuscular facilitation.Medicaldocumentationintegratedintolaboratoryactivitiesandassignments.Experientialopportunities included. Prerequisite: PT 441. Corequisite: PT 417. Spring.
PT 421L Patient Management I Musculoskeletal Lab (0) Initiates
patient management sequence. Expands upon the anatomical, kinesiological, and therapeutic exercise principles presented in previous courses. Emphasis on examination and assessment of the musculoskeletal system. Common conditions and impairments are presented and reinforced through use of case examples. Appropriate interventions are addressed conceptually and performed in the laboratory. Addresses concepts and techniques related to proprioceptive neuromuscular facilitation. Medical documentation integrated into laboratory activities and assignments. Experiential opportunities included. Prerequisite: PT 441. Corequisite: PT 417. Spring.
PT 423 Wellness in Physical Therapy (2) This course address issues related to wellness and overall health and fitness promotion from a physicaltherapyperspective.Areas oflearning willincludeintroductiontocommonfitnessandwellnessprograms, nutrition,balanceand movementscreening, andapplication oftransitionfromrehabilitation to encouraging behavior change promoting lifelong wellness. This course, when completed in addition to PT 451/551 and PT 452/552, meetsthecriteriaforthegeneraleducationcapstoneoutcomeaswell as one writing-intensive course. Prerequisite: PT 441.
PT 431 Gross Anatomy (5) For students in the physical therapy program. Emphasis on gross anatomy of the human skeleton, muscular, vascular,andnervoussystems.Knowledgeofgrossanatomyprovides students with a sound foundation upon which other courses in the physical therapy curriculum can directly or indirectly be related. Content presented in a regional approach, and includes anatomical concepts such as proper terminology, surface anatomy, and joint function. Gross anatomy is best learned in the laboratory through dissection ofthe human body. Course is primarily alaboratory experience. Prerequisite: PT 441.
PT 432 Kinesiology (3) Introduces the elements and principles basic to the study of human movement. It combines the disciplines of biomechanics, physiology,andanatomytoanalyzefunctionalmovements, balance, and gait. Discusses concepts ofkinetics, kinematics, length-tension relationships, and the functional significance of the structure of biological tissues. Emphasizes clinical application of mechanical concepts. Provides an introduction to surface anatomy. Prerequisite: Acceptance into the DPT program. Summer.
PT433HumanGrowthandDevelopment(3)Exploresconsequences ofdisruption in normal physiologicalanddevelopmental processes. Common diseases and disorders involving all major body systems addressed,aswellasselectedsystemicdiseases.Topicsincludediseases ofinfectious,immunesystem, traumatic, degenerative, and congenitalorigin.Focuseson pathogenesis, clinical presentation, laboratory findings, prognosis, medicalinterventionincluding pharmacological agents,andimplications relatedto physicaltherapypractice.Prerequisite: Acceptance into the DPT program. Summer.
PT434 Medical Pathology I (2) Explores consequences of disruption in normal physiological and developmental processes. Common diseases and disorders involving all major body systems addressed, aswellasselectedsystemicdiseases. Topicsincludediseases ofinfectious, immunesystem,traumatic, degenerative, andcongenitalorigin. Focuses on pathogenesis, clinical presentation, laboratoryfindings, prognosis,medicalinterventionincluding pharmacologicalagents, and implications related to physical therapy practice. Prerequisite: PT 441. Fall.
PT 436 Medical Pathology II (2) This course explores the consequences of disruption in normal physiological and developmental processes.Commondiseases, disordersandsyndromesinvolvingthe neurologicalbodysystemsareaddressed, aswellasselected systemic diseases. Topics include diseases of an infectious nature, immune systemdeficiencyanddegenerativeorigin.Thecoursefocusesonthe
pathogenesis, clinical presentation, laboratory findings, prognosis, medical intervention including pharmacologic agents and implications relatedtophysicaltherapy practiceinregardstotheneurological body system. Prerequisite: PT 441. Spring.
PT 441 Clinical and Professional Issues I Introduction (2) First in series ofclinicalandprofessionalissuescourses. Providesintroduction toprofessional practiceexpectationsofphysicaltherapy.Providesorientationandstrategiesforsuccessintheprofessional program.IntroductiontoAmericanPhysicalTherapyAssociation.Studentsexplore the practice of physical therapy utilizing the Guide to Physical Therapist Practice and the core values of the profession. Introduction to professionalethicsandcommunication requiredinprofessional relationships. Prerequisite: Acceptance into the DPT program. Summer.
PT 442 Clinical and Professional Issues II Adult Learning Principles (1) Second in series of four clinical and professional issues courses. Focuses on physical therapist's role as an educator and developing one'sownculturalcompetence. Provides introductiontofederal programs, including Medicare and Medicaid. Prerequisite: PT 441. Fall.
PT 451 Scientific Inquiry I: Stats and Research (2) This is the first inaseries offivecoursesdesignedto preparethegraduateto practice in an evidence-based manner and to be an astute consumer and judge of scientific research. Topics include fundamentals of clinical rehabilitationresearchincludingevidence-based practice,searching the literature, and research ethics. Fundamentals of clinical research approachesincludevariablerecognition, researchvalidity,measurementtheory, reliability, responsiveness, and validity. Basicstatistical procedurestoassessmeandifferencesaswellasinferencetestingare covered. This course, when completedinadditionto PT452/552 and PT 423/523, meets the criteria for the general education capstone outcome as well as one writing-intensive course. Prerequisite: PT 441. Fall.

PT 452 Scientific Inquiry II (2) This is the second in a series of five courses designed to prepare the graduate to practice in an evi-dence-basedmannerandtobeanastuteconsumerandjudgeofscientific research. Topics include critical appraisal of research related the diagnostic process and intervention trials.Student completecritical appraisalsofpublishedresearchinawrittenformatand presenttheir appraisalsorally.Thiscourse, whencompletedinadditiontoPhysical Therapy 451/551 and 423/523, meets the criteria for the General Educationcapstoneoutcomeaswellasonewriting-intensivecourse. Prerequisites: PT 441. Spring.

## Physics (PHYS)

Physics courses are taught by the faculty of the Department ofPhysics. See also Astronomy (ASTR).
PHYS 100 Conceptual Physics (3) Presents basic principles of physics throughdescriptiveanddemonstrativetechniques.Fornon-science majors. (Creditmay notbe countedtoward graduationfor physics or engineering majors.) Prerequisite: One year of high school algebra.
PHYS 121 Algebra Physics I (4) Presents basic principles of mechanics, fluid statics, fluid dynamics, heat, and sound. Three hours lecture, two hours lab. Prerequisite: Mathematics 105 or two years high school algebra. Recommended: One year high school physics.
PHYS 122 Algebra Physics II (4) Continues Physics 121. Presents basic principles of electricity, magnetism, light, relativity, atomic, andnuclearphysics.Threehourslecture,twohourslab.Prerequisite: Physics 121.
PHYS 150 Intro to Physics at UE (2) An introduction to physics and faculty research areas in physics for first-year physics majors. Topics mayincludespecialrelativity,biophysics, particlephysics,optics,and/ or solid state physics, but are subject to change. Class is taught by
multiple members of the physics faculty.
PHYS 190 Physics Today (1) Presents the nature of the work of a physicist and opportunities in the field of physics. An individualized course where topics of interesttoeach studentare pursued through projectsorselectedreadings.Recommendedforallfreshmencontemplating a major in physics.
PHYS 195 Special Topics: Physics or Technology (1) Introduction to specialtopicsinphysicsortechnologythatarenotincludedinregular courseofferings.Offereddependingoninterestordemand.Prerequisite: One year high school algebra.
PHYS 201 Physics of Music (4) An examination of the physics of sound and music. It is in the Outcome 8: Scientific Literacy category of the General Education Program and is intended primarily for students of music. Physics 200 includes basic principles ofacoustics, response of the ear to sound, musical tuning scales, auditorium acoustics, andthe productionandanalysis ofinstrumentalandvocal sounds.
PHYS 210 Calculus Physics I (4) Calculus-based treatment of mechanics, waves, and thermodynamics. Three hours lecture, two hours lab. Prerequisite: Mathematics 221. Recommended: One year high school physics.

PHYS 211 Calculus Physics II (4) Calculus-based treatment of electricity, magnetism, and light. Three hours lecture, two hours lab. Prerequisites: Mathematics 222; Physics 210.
PHYS 213 Introduction to Modern Physics (3) Introduction to the quantumnatureofmatterandradiation.Examinesthedevelopments in physics since the late 19th century, primarily in the areas of relativity, atomic, nuclear, and particle physics. Three hours lecture. Prerequisites: Mathematics 323; Physics 211.
PHYS 214 Modern Physics Lab (1) Complements Physics 213 by providinglaboratoryexperiencein relativity,atomic, nuclear, and particle physics. Two hours lab. Corequisite: Physics 213.
PHYS 220 Simulations for PHYS 210 (1) A 2-hour weekly computer labdesignedtobetakenconcurrently with Physics 210.Students will useVPythontosimulatethephysicalsystemsandconceptslearnedin PHYS 210, making visual representations of the related phenomena.

PHYS 221 Simulations for PHYS 211 (1) A 2-hour weekly computer lab designed to be taken concurrently with Physics 211 . Students will useVPythontosimulatethephysical systemsandconceptslearnedin PHYS 211, making visual representations of the related phenomena.
PHYS 305 Mathematical Physics (3) Examines a variety of mathematicalmethodsandtheirapplicationinthesolution of physics problems. Topics include vector and function spaces, special functions such as Besselfunctionsand Legendrepolynomials, curvilinearcoordinates, Fouriertransforms,ordinaryand partial differential equations. Three hours lecture. Prerequisites: Mathematics 323; Physics 211.
PHYS 312 Classical Mechanics (4) Emphasizes Newton's Second Law in differential form. Covers driven damped harmonic motion, central fields, rigid bodies, Lagrange and Hamilton equations, and acceleratedreferenceframes.Fourhourslecture.Prerequisites:Physics 121 or 210, 305.

PHYS 320 Astrophysics (3) Detailed study of the physical processes that drive a variety of astrophysical phenomena. Topics includeradiation productionandinteraction with matter, accretingsystems,and observational techniques from radio to gamma-rays. Specific applicationsmayinclude(dependingonstudentinterest)stellarstructure andevolution, compactobjects, galacticcompositionanddynamics, andtheoriginandstructureoftheuniverse.Threehourslecture.Prerequisites:Mathematics323;Physics 213.Recommended:Astronomy 101. Same as Astronomy 320.

PHYS 322 Biological Physics (3) Introduces biophysical methods from a physics perspective and discusses the application of these methods toward research questions in biology. Topics include biomolecular structures, structure determination and simulation, and molecular motors. Three hours lecture. Prerequisites: Mathematics 221; Physics 210 or 121. Same as Biology 322.
PHYS 330 Nuclear Physics (2) Examines the following topics in nuclear physics: radioactivity, atomic masses, nuclear models, and nuclear fission and fusion. Two hours lecture. Prerequisites: Physics 213, 305.
PHYS 331 Condensed Matter (2) Examines the following topics in condensed matter physics: classical and quantum free electron models, crystal and reciprocal lattice vectors, lattice vibrations and phonons,energybandsinsolids,metals,semiconductorsandsuperconductors. Two hours lecture. Prerequisites: Physics 213, 305.
PHYS 340 Computational Physics (3) Provides physics majors with a functional understanding of how to apply modern programming languages to the solution of a wide variety of problems in physics. Topics include solutions to differential equations using a variety of techniques, cellular automata, Monte Carlo techniques, and high performancecomputing.Threehourslecture.Prerequisites:Mathematics 323; Physics 213.
PHYS 350 Electronics (4) Treats topics in both digital and analog electronics relevant to the study of physics. The study of analog electronics includes basic circuit analysis, filters, diodes, transistors, andoperationalamplifiers. Topicsindigitalelectronics includelogic systems andgates,analog todigital conversion, and digitaltoanalog conversion.Threehourslecture,twohourslab. Prerequisites:Mathematics 221; Physics 122 or 211.
PHYS 395 Physics Journal Seminar (1) A research article reading/ discussionseminarforphysics majors. Each week, students will read and discuss current published articles of physics research in various subfields of physics. Format will bediscussion, and students willtake turns leading the discussion with faculty. Repeatable course.
PHYS 401 Advanced Electronmagnetics (4) Examines Maxwell's equations, electricandmagneticfields,vectorandscalar potentials, gaugetransformations, boundaryvalueproblems, electromagnetic radiation, and relativistic electrodynamics. Four hours lecture. Prerequisite: Physics 305.
PHYS 405 Advanced Mathematical Physics (2) Examines a variety of advancedmathematicalmethodsandtheirapplicationinthesolution of physics problems. Topics include functions of complex variables, complexanalysis, Laplace transforms, introduction to group theory and Green's functions. Two hours lecture. Prerequisite: Physics 305.
PHYS 414 Advanced Laboratory (3) Introduces advanced measurementtechniquesemployedinexperimental physics research.Emphasis on the entire experimental process, including literature search, experiment construction, data acquisition, data and error analysis, and technical writing for publication. Six hours of laboratory per week. Prerequisite: Physics 214.
PHYS 416 Statistical Thermodynamics (3) Develops thermodynamicsfromamicroscopicpointofviewandthenrelatesthismicroscopic view to macroscopic parameters through statisticalmethods. Three hours lecture. Prerequisites: Physics 213, 305.
PHYS 421 Atomic Physics (2) Examines the Bohr model and wave mechanical approach to the hydrogen atom, magnetic dipole moments, spin-orbit interaction, energy states and transitions in multi-electron atoms, X-rays, and the Zeeman effect. Two hours lecture. Prerequisites: Physics 213, 305.

PHYS 422 Cosmology (2) Explores history and evolution of the universe withemphasis ontheoretical models that may betested by modernexperimentalandobservationaltechniques.Topics include the Big Bang, cosmicmicrowave background radiation, darkenergy, darkmatter,theorigins ofstructureintheuniverse, general relativity, and specific topics of interest to researchers in the field. Two hours lecture. Prerequisite: Physics 305. Recommended: Astronomy 101, 320. Same as Astronomy 422.

PHYS 423 Particle Physics (3) Introduction to the physics of elementaryparticles.Topics includerelativisticparticledynamics,scattering processes, and Feynman diagrams, with applications to quantum electrodynamics (QED). Two hours lecture. Prerequisites: Physics 213, 305.
PHYS 427 Optics (3) Investigation of the interaction of light with matter, physical optics, Fourier optics, and lasers. Two and one-half hours lecture, two hours lab every other week. Prerequisite: Physics 305.

PHYS 471 Quantum Mechanics (3) Systematic introduction of formal aspects of quantum mechanics. Includes Schrodinger (wave representation) andHeisenberg(matrixrepresentation) approaches. In-depth examination of the simple harmonic oscillator and hydrogen atom in terms of quantum mechanics, followed by additional applicationsandmethods.Threehourslecture.Prerequisites:Physics 213, 305.
PHYS 493 Physics GRE Preparation (1) Prepares students for the physics Graduate Record Examination through review of physics concepts, practice tests, and evaluation of test taking strategies.
PHYS 494 Physics Seminar (1) Seminar presentation and written paper on research projects by students. Senior physics majors are required to complete the Major Field Test in physics. Course may be repeated for additional credit.
PHYS 495 Special Topics: Physics or Technology (1) Advanced specialtopicsinphysicsand/ortechnologythatarenotofferedregularly.Offered depending on interestordemand. Prerequisite:Junior standing.
PHYS 498 Physics Internship (1) Provides off-campus research experienceforphysicsmajors.Prerequisites:Juniorstanding, permission of instructor and department chair.
PHYS 499 Research/Independent Study in Physics (0) Allows individualslaboratoryresearchorindependentstudyonaproblemortopic of special interest. Subject and credit to be arranged with instructor and department chair. Prerequisite: Permission of instructor.

## Political Science (PSCI)

Political science courses are taught by thefaculty ofthe Department of Law, Politics, andSociety.Unlessotherwisenoted, therearenoprerequisites for 100 - or 200 -level courses. All 300 - or 400 -level courses require a 100- or 200-level course or permission of the instructor. Political Science 493, 495, and 499 require permission of the department chair.
PSCI 100 World Politics (3) Introduction to theory and practice of comparative politics as well as political science. Focuses on political behavior, political system, political process, and world politics. Fall, spring.
PSCI 143 American National Government and Politics (3) Provides a broad overview of the institutional arrangement of the American politicalsystem,itsconstitutionalandtraditionalunderpinnings,and the ways in which various political actors operate within it. Encourages critical analysis of political information and active citizens participation in our democratic system. Fall, spring.

PSCI 160 Introduction to International Relations (3) Introduction to the theory and practice of sovereignty, conflict and cooperation, foreign policy, politicaleconomicrelations, development, andinternational environmental issues. Fall, spring.

PSCI 190 Topics in Politics (3) Subjects offered because of unique relevancetoeventsordevelopmentsinpoliticalscienceorintheworld ofpolitics.Specifictopicsannouncedintheannualschedule.Maybe repeated.
PSCI 290 Topics in Politics (3) Subjects offered because of unique relevancetoeventsordevelopmentsinpoliticalscienceorintheworld of politics.Specifictopicsannouncedintheannualschedule.Maybe repeated. Fall, spring.
PSCI 312 Political Parties and Elections (3) Study of institutional political parties, nominations, campaigns, elections, and their influence on policy making.
PSCI 313 Congress and Legislative Process (3) Examines the organizationandfunction oftheUnitedStatesCongress andthe legislative process.Specialattentionpaidtopresidentialandcongressionalinteraction and its effect on policy.
PSCI 318 Research Methods in Political Science (3) Introduction to research design and methods with some emphasis on statistical analysis.Junioror senior status required; or permission of instructor. Spring.
PSCI 320 Comparative Politics Seminar (3) Examines the historical developmentandtrends ofcomparative politicsand exploresmajor theories involving the political system, state and society, political culture, rational choice, Institutionalism, political economy, development, democracy, and democratic transitions.
PSCI 326 Women and American Politics (3) Examines the expanding involvementand the distinctive contributions of women in contemporary American politics as voters, candidates, and officeholders. Includes an overview of the first and second waves offeministactivism in American political history, as wellas an exploration ofselected public policy issues of particular concern to women.
PSCI 343 Politics and the Media (3) Analysis of the media's impact upon the political process, institutions, and the individual. Exploration of the role played by communication, principally through the mass media, in the conductofgovernmentand the making of public policy.
PSCI 344 Political Opinion and Political Behavior (3) Examines the formation and measure of public attitudes and opinions and their effect on contemporary American politics.
PSCI 345 Constitutional Law: the American Constitution (3) Reviewsjudicialdecisionsandinterpretationswhichhavecontributed to the growth and development of the United States Constitution in such areas as thefederal system, intergovernmental relations, presidential powers, government functions, and civil rights.
PSCI 349 State and Local Government (3) Study of the institutions, organization, and politics of state and local governments. Attention given to intergovernmental relations.
PSCI 360 Politics of the Middle East (3) Examines specific historical trendsandcontemporaryissuesfacingthepeopleandgovernmentsof the Middle East spanning from Libya to Iran and from Turkey to the Southern Arabian Peninsula.
PSCI 361 U.S. Foreign Policy (3) Introduction to the U.S. foreign policy making process that surveys areas of foreign affairs. Makes comparisons between United States and other developed as well as developing nations. Emphasis on economic, environmental, and security and defense policy. Institutional factors considered include
theinteractionbetweenthepresidency,congress,bureaucracy,and public opinion.
PSCI 362 International Security (3) What are the key international securitychallengesintheworldtoday, andhowcantheyberesolved? This course surveys the major actors in international security, why theythreatenoneanother,andthestrategiesthey usetoalleviatethose threats; and it goes on to examine issues including war and peace, nuclear weapons, civil war, terrorism, and cyber warfare.
PSCI 363 International Law and Organization (3) Examination of internationalorganizationsonquestionsofmilitarysecurity, theenvironment, the global economy, economic development, and human rights.TheUnitedNations, regionalorganizations,nongovernmental organizations, and multinational corporations will be addressed in the context of international law. Considers theoretical and political foundations ofinternationallawaswellas contemporaryapplication and enforcement.
PSCI 369 Terrorism and Counterterrorism (3) What is terrorism? Why do groups adopt terrorism? How can terrorism best be fought? This course examines in detail the causes and history of terrorism, counterterrorism strategies and challenges, and ethical questions involved in both terrorism and counterterrorism.
PSCI 376 Historical and Contemporary Political Thought (3) Examines historical and contemporary political thought in terms of thematiccontinuitiesanddiscontinuitiesfromclassical Greekthoughtto contemporarytheoreticalworks. Particularattentiongiventoearlier works in terms of their relevance to current political problems.
PSCI 380 Latin American Politics (3) Examines concepts and theoreticalargumentsconcerningcivilizations,history,cultures, religions, socialclasses,economicdevelopment,anddemocratizationinLatin America.

PSCI 390 Topics in Politics (3) Subjects offered because of relevance to events or developments in political science or in the world of politics. Specific topics announced in the annual schedule. May be repeated.
PSCI 435 Human Rights Seminar (3) This course serves as a survey ofthe complexities of international human rights in anera of increasingglobalization.Studentswillbeexposedtotheoreticalfoundations in various civilizations and cultures as well as the evolution of human rights, the legal instruments, and the global, regional, and national mechanisms that exist to promote and protect these rights.

PSCI 440 Environmental Law and Policy (3) Examines role of politics, economics, and culture in the formation of domestic and international environmental policies and laws. Focuses, in an era of increasing globalization, on ecosystems, population, energy, biodiversity, and the legal complexities of environmental regulatory and administrative systems.
PSCI 459 Asian Politics (3) Examines the impact of history, culture, governmentstructures,andeconomicchangeonpolitical processesin Asian countries. Primary attention paid to China, Japan, and Korea followed by other Asian countries.

PSCI 461 Politics of the Global Economy (3) Analysis of the political aspectsofglobaleconomicrelations.Areasoffocusincludeglobalizationandinterdependence, tradepolicy, internationalfinance, development assistance, multinational corporations, energy and natural resources, and the role of international organizations.

PSCI 489 European Politics (3) Examines the historical patterns of social, economic, and religious conflict; structures of citizen representation in interest groups and political parties; electoral systems; constitutional relationshipsbetweenexecutive,legislature, andjudiciary;economicandforeignpolicies;andcurrentproblemsofnational
identity in European countries.
PSCI 490 Topics in Politics (3) Subjects offered because of relevance to events or developments in political science or in the world of politics. Specific topics announced in the annual schedule. May be repeated. Fall, spring.
PSCI 493 Readings in Political Science (1) A planned program of reading and research underthe direction of a member of thefaculty. May be repeated for credit. Fall, spring.
PSCI 495 Senior Seminar in Political Science (3) Capstone educational experience in political science offers students an opportunity to use their substantive and methodological training in preparing a significant paper and sharing the intellectual experience with other members of the seminar. Fall.

PSCI 499 Public Policy Internship (1) Supervised field experience or internship in a political campaign, the state legislature, the United States Congress, the courts or an agency of the criminal justice system, or in an administrative setting. Candidates maintain a diary or logofexperiencesand prepareapapereitherreportingonsomeaspect oftheirexperientialeducationorreporting a particular research project. Fall, spring.
PSCI H385 Modern British Politics (3) Better understand the issues which matter to any society today. Course enhances ability to make balanced and informed views on apparently complex issues by considering the social, economic, ethical, and political aspects of many controversial issues in Britain, including education, health, Northern Ireland, Europe, housing, race relations, and prisons. Fall, spring.

## Psychology (PSYC)

Psychology courses are taught by the faculty of the Department of Psychology.
PSYC 121 Introduction to Psychology (3) Surveys major areas of psychology,includingmethodology,learning,memory,development, personality, psychopathology, and additional areas. Focuses on historicaldevelopment, research findings, and applications in contemporary life. Fall, spring, summer.
PSYC 201 Psychology: Fields of Application (1) This course provides psychologymajorswithanoverview of(a).thevarioussubdisciplines within psychology, (b). the different types of graduate school programs in psychology, and (c). the many careeropportunities opento students majoring in psychology. This course is taken pass/fail only. Fall.
PSYC 205 Special Topics in Psychology (3) Examines specific topics in psychology through a seminar or workshop format. Prerequisite: Psychology 121 or permission of instructor.
PSYC 225 Lifespan Development (3) This course will focus on the development of individuals across the lifespan. Beginning with prenatalandearlyinfancydevelopment, thecoursewillprogressthrough adolescence,adulthood, and topics indeath and dying.Material will include aspects of physical, cognitive, social, personality, and emotional development. This class will place an emphasis on theoretical models and experimental findings. The course adopts a discussion formatwithtextbook, primary readings, reaction papers, and aterm paper. Prerequisites: PSYC 121.
PSYC 226 Child and Adolescent Psychology (3) Examines developmentalstagesfrom conceptionthroughadolescence, givingspecial emphasistophysical,cognitive,social,andemotionalaspectsrelated tomaturationalaswellaslearning processes.Prerequisite:Psychology 121. Fall, spring.

PSYC 229 Social Psychology (3) Considers broad range effects of
a social context on individual and group behavior. Examines interpersonal relations and actions, attitude developments and change, group dynamics, how we justify individual actions, advertising and news, prejudiceandstereotyping,loveandsex,leadership, andwork environmentsastheyrelatetoandaffectbehavior.Prerequisite:Psychology 121. Fall, spring.
PSYC 245 Statistics for Psychologists (4) Introduces descriptive statistics, probability, decisiontheory, andtesting ofhypothesesbyboth parametricandnonparametrictests.Emphasizesbasicconcepts,SPSS computer analysis, and APA-format presentation of results. Three hourslecture,twohourslab.Prerequisites:Ninehoursofpsychology, including Psychology 121; general education mathematics requirement. Fall.
PSYC 246 Research Methods in Psychology (4) Emphasizes scientific basisofpsychology.Exploresresearchmethodsofmodernpsychology. Coversuseofstatisticsindesign ofbehavioralexperiments.Example experimentsareconductedtoaidcomprehension.Studentsgainskills necessary for management of simple research and interpretation of research reports. Three hours lecture, two hours lab. Prerequisites: Psychology 121, 245. Fall, spring.
PSYC 259 Abnormal Psychology (3) Examines abnormal behavior with emphasis on mood disorders, affective disorders, and schizophrenia. Examines the biological and psychological bases of psychopathology and those factors involved in diagnosis and treatment of mental disorder. Prerequisite: Psychology 121. Fall, spring.
PSYC 326 Language Development (3) Introduces the nature of language development in infancy and childhood. Examines cognitive, developmental, environmental, and physiological influences on language skills. Theories of language development and their influences on research and our understanding of children discussed. Topics include perception of sounds, acquisition of grammar, first and second language learning, and developmental language disorders. Relationship between language skills and overall development (social, cognitive, biological) also explored. Recommended Prerequisites: Psychology 121, 226. Spring, alternate years.
PSYC 333 Psychopathology in Children and Adolescents (3) Studies behavioral characteristics, causes, diagnosis, and treatment of the psychopathologicalproblemsofchildhoodandadolescenceincluding anxiety states, developmental disorders, attention deficit disorder, conduct disorder, and autistic disorder. Discusses assessment and treatmentfrombiologicaland psychological perspectives.Prerequisite: Psychology 121. Recommended: Psychology 226. Fall.
PSYC 355 Sensation and Perception (3) Examines perceptual processing of sensory information in vision, hearing, touch, taste, and smell. Examines psychophysics and the influence of personality and environmental factors in human perception. Examines neuropsychology and perceptual abnormalities resulting from brain damage. Prerequisites: NEUR 125 and PSYC 121. Spring.
PSYC 357 Neuropsychology (3) Examines the function and organization of the nervous system and the role of the nervous system in controlling behavior. Topics include nervous system structure and functions as it relates to sensory processing, movement, sleep, reproductive behavior, emotional behavior, learning and memory, stress and health, neurological disorders, and select psychiatric disorders. Current research methodology and experimental findings emphasized. Prerequisites: Biology 100 or higher; Psychology 121. Fall.
PSYC 365 Applied Creativity and Design Thinking (3) This course will explore the concepts of design thinking and apply them to
complex problems. Knowledge and skills are developed in empathy, problem-definition, ideation, rapid-prototyping, and experimentation to foster innovation. Students will utilize collaborative, cross-disciplinary approaches and creative problem-solving strategies to tackle multi-faceted problems and develop innovative solutions.

PSYC 366 Cognitive Psychology (3) The study of how we think. Examinesthecognitiveprocessesunderlyingattention, perception, memory,language, reasoning, and problem-solving.Emphasisontheoreticalmodelsandexperimentalfindings.Exploresareasofapplied cognitive psychology. Prerequisites: Psychology 121, 125. Fall
PSYC 367 Theories of Personality and Psychotherapy (3) Survey of majorcontemporarymodels ofpersonalityandindividualpsychotherapy. Includes biological, psychoanalytical, humanistic, behavioral, and cognitive models. Prerequisites: 12 hours of psychology, including Psychology 121, 259. Spring.
PSYC 370 Behavior Modification (3) Studies learning principles as a meansforchangingbehaviorinthehome,school, mentalhealth settings, andothersocialsituations. Operant, respondent, andcognitive techniquesreviewedintermsofdoingtherapy,increasingself-control, and improving productivity in industry. Focus on modifying both child and adult behavior. Prerequisites: Psychology 121, 259. Fall.
PSYC 379 Child and Family Psychotherapy (3) Survey of theories and techniques of the most popular approaches to psychotherapy with children, adolescents, and their families. Covers individual therapies such as play, cognitive, and behavior therapies, as well as group and family therapies. Particular attention given to interviewing skills. Prerequisites: Psychology 121 and either Psychology 225 or 226. Spring.
PSCY 388 Conspiracy, Occult \& Paranormal Psychology (3) Belief formation is a fundamental aspect of the human psyche that influences self-perception and interpersonal relations. This course will explore how and why humans come to believe in constructs that have little evidentiary support and what the ramifications of these instances of acceptance are at personal, social, and political levels. One example of this to understand the personality factors that predict acceptance of paranormal or conspiracy related beliefs. Another is to examine how perceptual processes contribute to pattern identification. Prerequisite: PSYC 121.

PSYC401 IndependentStudy-Psychology(1)Providesopportunities for study of subject areas in greater depth. The study is conducted withtheguidanceandsupervision of adepartmentfaculty member. Proposed independent studies should be presented to the departmentatleastsixweeksbeforethebeginning ofthetermandmustbe approved before registration for the course. May be repeated given substantiallydifferentcontent.StudentscannotenrollinPsychology 401 forresearch intoatopicthatis offeredas astandardcoursewithin the department. Prerequisites: 15 hours of psychology and sponsorship by the supervising faculty member. Fall, spring, summer.
PSYC 402 Ungraduate Research in Psychology (1) Provides opportunities for undergraduate research that involve data collectionand formal reporting concerning a specific problem. This research is conducted with the guidance and supervision of a department facultymember.Proposedindependentstudiesshouldbepresentedto the department chair at least six weeks before the beginning of the term, includeadetailedprospectusoftheproblemandmethodology, including documentation of IRB approval, and must be approved by thedepartmentbeforeregistrationforcoursecredit.Mayberepeated for a maximum of 9 hours. Prerequisite: Psychology 121, 245, 246, and sponsorship by the supervising faculty member. Fall, spring, summer.
PSYC 405 Special Topics in Psychology (3) Examines specific top-
ics in psychology through a seminar or workshop format. Prerequisite: Psychology 121 or permission of instructor.
PSYC 406 Gender, Psychology, and the Law (3) Introduces students to the major topics represented in the field of Gender, Psychology, and the Law. This course examines how psychological research can contribute to a better understanding of special issues that arise when considering gender in the legal system. Topics include intersectionality, abortion rights, father's rights, sexual harassment at school (Title IX) and work (Title VII), trans* discrimination, police interactions, child/human trafficking domestically and internationally, and adult and juvenile sex offenders.Pre-requisite: Psyc 121, and Psyc 229 OR GWS 101
PSYC 416 Human Sexuality (3) Covers topics related to human sexuality. Includes sexuality research, anatomy, sexual development, sexual identity and orientation, sexual activity, contraception, sexually transmitted infections, love and relationship, sex and the law, and cross-cultural differences. Exposes students to knowledge and attitudes about human sexuality and challenges them to make informed, ethical choices. Prerequisites: Psychology 121, 229 Summer, offered periodically.
PSYC 420 Children, Psychology and the Law (3) Introduces students to the major topics represented in the field of children, psychology, andlaw.Examineshowpsychologicalresearch (acrosssub-disciplines such as social, clinical, cognitive, and community psychology) can contributetoabetterunderstanding ofspecial issuesthatarisewhen childrenenter the legal system-a system designed for adults.Topics include the nature of and societal response to child maltreatment, thereliability ofchildren's eyewitnesstestimony,jurors'perceptions ofchildren'stestimony, andjuvenilejustice. Thiscoursereviewshow psychologicalresearchcancontributetoabetterunderstandingofthe issues,howthelegalsystemcanbeinformedbytheresultsofresearch, and how to design future research to address remaining questions. Prerequisite: PSYC 229, 246, or SOC 235.
PSYC 426 Seminar in Child and Adolescent Psychology (3) Examines developmental stages from conception through adolescence, giving special emphasis to physical, cognitive, social, and emotional aspects related to maturational as well as learning processes. As an advanced seminar, this course adopts a dis-cussion-based format to explore primary research into child and adolescent psychology to help each student gain a greater appreciation for and understanding of the concepts and processes involved in the development of children and adolescents. Prerequisites: Psychology 121 and 226
PSYC 431 Stereotyping, Racism, and Prejudice (3) Introduces the studenttothepsychologicaltheoryandresearch concerningstereotyping, prejudice, racism, and the effects of social stigma on self and society.Examineshowstereotypes, prejudice,andracismareformed, maintained, andreduced.Analyzes prejudicetowarddifferentsocial groups, includingthoseformedbyracialandethnicorigins, gaysand lesbians, women and men, and overweight and physically different individuals. Prerequisite: one of the following courses: PSYC 229, 245,246 , SOC 235 or 344.

PSYC 445 Psychological Tests and Measurements (3) Studies the theory, construction, administration, andinterpretation ofstandardized psychological tests used in educational, clinical, and industrial settings.Examinesachievement,intelligence,aptitude,interest,and personalitytests. Prerequisite:Psychology 121,245,or permission of instructor. Offered periodically.
PSYC 450 Learning (3) Examines neurological, environmental, and cognitive factors that influence acquisition and retention of new information or new behaviors. Emphasis on historical theories of classical and instrumental conditioning and how they relateto stim-
ulus control of behavior and animal cognition, including memory. Exploresareasofappliedlearning.Learning conceptsreinforcedwith interaction with a virtual reality program. Prerequisites: Psychology 121, 246. Spring, alternate years.
PSYC 451 Pioneers of the Emotional Brain (3) Scientific pursuit is often driven by personal passion in addition to simple curiosity. In this course, the work of a selection ofhighly influential researchers in thepsychologicalneuroscienceswillbecovered.Theircontributions to the field will be evaluated chronologically over the course of their careerwithattentiontohistorical and personalelementsthathelpto contextualizetheirstories.Much oftheresearch will pertaintolearning, memory and emotion. Prerequisites: PSYC 121 and NEUR 125.
PSYC 464 Psycholinguistics (3) Introduction to psycholinguistics providing overview of language processes including speech perception, meaning representation, language processing, language production and comprehension, and language acquisition. Details theoretical linguistic concepts and their empirical support data. Examines language related to brain, thought, and reading. Prerequisite: Psychology 121. Recommended: Psychology 366.
PSYC 466 Cognitive Development (3) Examines development of cognitive skills from birth through adolescence with emphasis on memory,attention, perception,language,and problem solvingskills. Discusses major theories of cognitive development with focus on experimentalfindings.Therelationshipbetweenbiologicalchanges andcognitiveabilitiesexploredasistheinfluenceofneurologicaland physiological impairments. Impact of cognitive skills on academic abilities and performance also discussed. Prerequisites:Psychology 121, 226. Recommended: Psychology 366. Spring, alternate years.
PSYC 489 Field Experience: Internship in Psychology (1) Provides work experience in a preferred field of psychology. Features work experience in area clinics, agencies, schools, and other institutions under guidance of professional personnel. Weekly class discussions focusonongoingexperiences and professionaldevelopmentissues. May be repeated for a maximum of nine hours. Prerequisites: Senior psychologyorneurosciencemajors;mustmeetwiththeinstructorat least one month before semester begins to arrange placement. Fall, spring.

PSYC 490 Senior Review and Senior Thesis (3) Reviews contempo-rarypsychologythroughreadings,studentpresentations,anddiscussions.Preparationforthecomprehensiveexaminationin psychology. Provides supervision of the senior thesis, which must include a thoroughliteraturereviewofatopicrelevanttopersonalgoals.Thesismay include but does not require original research. Prerequisite: Senior psychology or neuroscience major. Fall.

## Public Health (PH)

PublicHealth coursesaretaughtbythefaculty oftheSchool ofPublic Health.
PH 190 Intro to Public Health (3) Introduces students to the concepts, principles, andoutcomes ofpublichealth.Studentswillexplore theories of health, illness behavior, and health education considering community health data sources, classical health intervention approaches, and the planning and evaluation of community health interventions.Course providesbasicknowledgeandskillsneededfor conductingcommunityneedsassessmentwith diversepopulations. Additional topics such as infectious diseases, environmental health, chronic diseases, maternal and child health and women's health are also covered.
PH 195 Global Health Issues (3) Provides an overview of important health problems of the world's populations, including improving health globally, reducing health disparities and examining keyareas
ofdisease burden. Particularattention will be paidtohealth status of women, children and the poor.
PH 340 Public Health Nutrition (3) This course focuses on food and nutrition problems in the setting of the general community. The course is designed to provide students with an understanding of theoretical and practical issues underpinning population-level assessment in nutrition and an appreciation of nutrition within the broadercontextofpublichealth.Specifictopicsincludethederivation andapplication of nutrientrequirementestimates andnutrition recommendations,themeasurementoffoodintakeandfoodinsecurity, currentissuesand controversiesinfood policy, andthedevelopment ofindividualvs.population-basedinterventionstrategies.Prerequisite: Public Health 190.
PH 360 Community Health and Social Justice (3) Provides an overview of the major health issues influencing quality of human life. Topics include individual and social planning for optimal health. Prerequisite: $\mathrm{PH}-190$ or permission of instructor.
PH 400 Food Science (3) Knowledge of basic groups of foods in the food supply and their nutrient profiles, their harvesting, processing andstorageproceduresandpolicies.Thiscoursewill providestudents a broad overview of certain aspects of the food supply both locally andworldwideandwillexamineissuesaffectingfoodsafetyincluding someofthemechanismsbywhichfood-bornepathogensthatcause diseaseinhumans, aswellasthehumanconsequencesofinfectionby major food-borne pathogens. Prerequisites: Public Health 190.
PH 401 Epidemiology (3) Introduces students to epidemiology and epidemiological methods. Students will explore study designs and measures of effect used to study disease in human populations, as wellasconcepts of causal inferenceandthreatsto study validity. This course will prepare students to critically evaluate public health and medicalliteraturebasedonthemajorcriteriausedtoassesscausality.
PH 409 Environmental Health (3) Environmental health is concerned with the biological chemical, and physical influences on humanhealth. Thecoursewillexaminetopicssuchasenvironmental health determinants, generalmechanisms oftoxicity, genetic, physiologic, and psychosocial factors related to environmental health, environmentalriskassessmentmethods,federalandstateregulatory guidelinesand programs, environmentaljustice,riskcommunication, and prevention and management of environmental hazards. Fall.

PH 415 Health Behavior (3) Health Behavior Change is an overview of the health behaviors contributing most dramatically to increased morbidity and mortality in the United States. The course emphasizespublichealthinterventions, theoreticalmodelsandstrategiesto promotehealthybehaviorsanddiscourageunhealthybehaviors. The course examines consequences, patterns, risk factors, and change/ interventionsforeachbehaviororproblem.Behaviorsareexamined from multiple perspectives (e.g., individual, social, environmental) and with a systems perspective in mind, illuminating the interconnecting influences on behaviors. Health behaviors and behavior changeinterventionsarepresentedinthecontextofcurrentresearch and theory. The course also examines the role of health disparities, public health policy, current debate, health behavior theory and emerging research. Fall.
PH 425 Biostatistics (3) This course will cover biostatistical methods andapplications relatedtopublichealth. Topics willincludedescriptive statistics, probability theory, and a wide variety of inferential statistical techniques that can be used to make practical conclusions about empirical data. Learned statistical knowledge will be applied to understanding and designing research studies.
PH 467 Statistics Appraisal and Evaluation (3) Focuses on the analysisofdatacommontohealthcare.Includesdatadescription,elements
of probability, distribution of random variables, estimation and confidenceintervals, binomialandnormaldistributions, hypothesis testing, contingency tables, regression analysis, and ANOVA.
PH 480 Programs, Problems, and Policies in Public Health (3) This courseexaminesthemyriad ofprogramsand policies in publichealth viaadevelopmentalapproachtolearningabouthealthproblems. The course will cover a variety of topics, including state programs and policies, maternal and infant health, program planning, research, monitoring, and advocacy.
PH 488 Internship (1) Offers the public health major practical expe-rienceinaspecializedcareerarea.Fostersdevelopmentofskills,competencies,andorganizationalandadministrativetechniquesneeded for successful entry into the public health workforce or entry into a professionalgraduate program, whileworkingunderdirectsupervision of selected professionals.
PH 490 Integrative Experience (3) Examines decision making in health services administration by extensive use of casestudies. Integrates material from other HSA courses into the study of decisions facing all types of health care organizations.
PH 499 Special Topics Public Health (1) Study of topics of special interest not covered in regular course offerings. Topics announced. Coursemayberepeated,butthetopicmustbedifferent.Prerequisite: Permission of instructor.

## Quantitative Methods (QM)

Quantitative methods courses are taught by the faculty of the DepartmentofAccountingandBusiness Administration. Allcourses are subject to the leveling policy and prerequisite requirements of the Schroeder Family School of Business Administration. See the "SchroederFamilySchool ofBusiness Administration" section ofthis catalog for the complete leveling policy.
QM 160 Introduction to Data Analytics (3) This course is an introductiontodataanalysis andmanagement.Itincludescomprehensive introduction to Microsoft Excel and a brief treatment of Microsoft Access. Excel topics include formatting workbook text and data; implementationofdesignedfunctions;analysisandchartingoffinancialdata;application oftables, pivottablesandtablecharts;managing multipleworksheetsandworkbooks;validationanddevelopmentof macros; nested commands and other advanced functions; financial tools and functions; scenario analysis; retrieval and importation of externaldata;anddescriptivestatisticalanalysis.Accesstopicsinclude a brief introduction to database techniques.
QM 227 Introduction to Statistics (3) General purpose introduction to principles of analysis and inference under conditions of uncertainty. Focuses on the logic of statistical inference. Topics include probability, probability distributions, random variables, sampling and sampling distributions, estimation, hypothesis testing, and linear regression and correlation. Prerequisite: Proficiency in algebra at introductory level. Credit not given for both QM 227 and either PSYC 245 or SOC 344.
QM 327 Statistical Methods (3) This is a second course in applied statistics. It uses basic principles of statistical inference to introduce studentsto categorical data analysis, analysis of varianceand design ofexperiments,regressionmodelingandbasicextensionsofregression analysis. Possible additional topics include nonparametric statistics, methods for quality control, and introduction to multivariate methods. With emphasis on applications of statistical analysis, this courseisappropriateforstudentsinavarietyofmajors, rangingfrom business and economics to health and life sciences, social sciences, andexercisescience.Offeredinalternateyears.Prerequisite:Gradeof C- or better in QM 227.

QM 380 Special Topics in Quantitative Methods (3) Covers topics not included in other courses; gives greater depth in certain areas; explores current quantitative methods topics. Repeatable course. Content changes each time course is offered. Prerequisites: Grade of C- or better in QM 227. Offered periodically.
QM 406 Applied Business Analytics (3) This course utilizes realworld data to solve business problems using various software tools. Students will learn to conduct a complete business analytics project and present their findings. Prerequisite: C- or better in either QM 227 or STAT 266.

## Race and Ethnicity Studies (RES)

Race and Ethnicity Studies courses are taught by faculty of several departments.
RES 492 Special Topics: Race and Ethnicity Studies (3) Special topics in raceand ethnicity studies notincluded in regularcourse offerings. Mayconsistoflectures and discussion with anemphasis on research. Content changes each time course is offered. Repeatable up to six credit hours.
RES 493 Independent Study in Race and Ethnicity Studies (3) Research in areas of race and ethnicity studies on topics not covered inexisting courses.Subjectandcreditearnedmustbeapproved bya facultymember, coordinator ofRaceandEthnicityStudies, anddean oftheCollegeofArtsandSciences.Contentchangeseachtimecourse is offered. Repeatable up to six credit hours. Pre-requisite: junior standing or permission of coordinator of Race and Ethnicity Studies.

## Religion (REL)

Religion courses are taught by the faculty of the Department of Philosophy and Religion.

REL 120 Religion in America (3) This course examines mutually intersecting themes and influences between religion and American culture.Topics varyandmay include,for example, religious diversity in America, American religious history, the intersection of religion with American politics and cultural debates.

REL 125 Religion and Science (3) This course introduces students to the interaction of religion and science, covering historical, theological, philosophicalandscientificaspects.Itexplorescontemporary issues concerning the origins of the universe, the meaning oflife, the "anthropic principle," and other such topics.
REL 130 Christian Thought (3) Introduces themes of Christian thought in historical and contemporary perspectives.
REL 140 Reading the Old Testament (3) Engages select passages from the Old Testament, examining their historical context, place in the Bible, textual features, and a wide variety of subsequent interpretations. Focus is on developing basic skills for reading the Old Testament.

REL 150 Introduction to the New Testament (3) Introduces the New Testament, its background, content, andmajorthemes. Exploresthe ancient world and the life of the first Christian communities in order to illumine the New Testament texts. Emphasis on key topics of theology and interpretation and their contemporary relevance.
REL 201 Comparative Religious Ethics (3) Provides a comparative introduction to religious moral thinking, paying attention to the basis, nature, content, and consequences of ethical thought and the religious traditions that address them.
REL 205 Everyday Islam in the West (3) This course examines some of the major theories in the study of the lived religion through the lens of everyday experiences and practices of Muslim in the "West".
REL 212 Living World Religions (3) Comparative study of the origin,
development,literature,organization, andcontrollingideas ofmajor world religions.
REL 220 Reformers and Revolutionaries in Christian History (3) Examines key issues in the history of Christian thought through study of significant figures in late medieval and modern Christian history. Examples of theologians covered include Anselm, Thomas Aquinas, Julian of Norwich, Martin Luther, John Calvin, Teresa of Avila, Anne Hutchinson, and Jonathan Edwards
REL 240 Philosophy of Religion (3) Examines mutually intersecting themes and influences between Western philosophy and religion fromantiquitytothepresentday.Sampletopicsincludethenature of religious experience,claimstoreligiousknowledge,therelationship between faith and reason, etc.
REL 275 Race and Religion (3) This course introduces students to the complex intersection of race and religion in America. We will examine the role of religion in constructing ideas about race and in supporting racialized power inequities. Furthermore, we will explore ways religion has been shaped by minority communities in response to racial realities in America.

REL 300 Eastern Religious Philosophies (3) This course will cover the main systems of philosophy embedded in Taoism, Buddhism, Hinduism, and other Eastern religious traditions. Topics will include: Who am I? What is really real? What happens after death? What is the good life? What is the relationship between the individual and society? What is wisdom? The answers that Eastern cultures offer to these questions tell us not only about their cultures and philosophers, but also provide valuable perspectives on contemporary problems such as social and environmental disruptions and the allocation of limited resources. Prerequisite: FYS 112 or 312.
REL 305 Bible and Justice (3) Explores the Bible's relationship to contemporary social justice issues. Topics include issues linked to social identity (race, class, gender, sexuality, etc.) as well as global diversity (poverty, globalization, human rights).
REL 310 Contemporary Theologies (3) Examines major Christian theologies ofthe 19th and 20th centuries, includingneo-orthodoxy, liberalism,existentialism, processtheology,globaltheology,andfeminist, Latin American, African American, and Asian liberation theologies.Prerequisite:Onecoursein religionorpermission of instructor.
REL 314 Religions of East Asia (3) Studies the texts, thought, and practices of the religions of East Asia, specifically China and Japan, including Confucianism, Daoism, Shinto, and Buddhism. Prerequisite: sophomore standing.
REL 315 Jews, Christians, Muslims (3) Examines the three religious traditionsthattracetheirheritagetoAbraham:Judaism,Christianity, and Islam. Prerequisite: sophomore standing.

REL 320 Jesus and the Gospels (3) Studies the Gospel texts, explores issues and options of interpretation, and engages the key issues of modern scholarly debate concerning the Gospels. Emphasis on the use of contemporary methods of Biblical exegesis to illumine the Gospel texts. Prerequisite: Junior or Senior standing, or permission of instructor.
REL 325 Ancient Christianity (3) Traces the history of Christianity from the Apostolic Fathers at the close of the first century until the earlymedieval period.Emphasisonthelife,theology,spirituality, and expansion of the early Church, with special attention to Christianity in ancient Roman and Saxon Britain. Prerequisite: FYS 112.
REL 330 Paul and His Letters (3) Studies key themes of Paul's letters a illumined by contemporary study of Paul. Special attention given to the place of Paul within the history of ancient Christianity, and to core features of Christian theology and practice shaped by Paul's
letters. Prerequisite: junior or senior standing.
REL 335 Biblical Narratives (3) Examines theory and practice of biblical interpretation through in-depth study of select biblical narratives, including the Joseph Story, the Succession Narrative (King David), the books of Ruth, Jonah, Daniel, Esther, Tobit, and Judith. Specialattentiongiventoliteraryapproachesandtheologicalissues.

REL 340 Women and Religion (3) Examines women's religious thoughtinhistoricalorcontemporarysettings.Exploreshowwomen's sense of self-identity and their social position shaped their unique theological perspectives.
REL 345 Religion and Story (3) This course explores the role of story as a means of communicating religious truth claims. Students willexamineselectedreligiousthemespresentedand/orchallenged innovelsandfilms representingdiversesocio-religiousperspectives. Topics include, for example, faith, human nature, good and evil, redemption, and what is ultimate. Prerequisite: One course in religion or permission of instructor.
REL 350 God, Suffering and Evil (3) How can God be all-good and all-powerfulifevilexists? Theclassicquestion oftheodicyguidesthis course, with a study of classic and contemporary attempts to deal withtheproblemofevil.Thiscourseexploreshowpeopleinreligious traditions have thought about and lived in relation to evil and the experiencesofsuffering.Sustainedfocusononetopicenablesstudents to practice critical thinking in the study of philosophy and religion. Prerequisite: FYS-112.
REL 375 Religion, Gender, and Culture (3) This course uses gender asa categoryofanalysistostudyreligion.Topics varyandmayinclude suchthingsastheconnectionbetweenreligiousnotionsofgenderand largersocial,political,andeconomicissues;representativeinterpretive traditions of religious texts and figures in literature and art; or constructions of gender in major world religions.
REL 380 Topics in Religious Studies (3) Content changes each time course is offered.Repeatable course.Prerequisite:Onecoursein religion or permission of instructor.
REL 431 Prophets (3) Examines Old Testament prophets in light of their historical, social, political, and religious backgrounds. Taught as a seminar. Prerequisite: One course in religion or permission of instructor.
REL 435 Biblical Languages Practicum (1) Provides opportunity to employ Greek or Hebrew skills and tools in biblical interpretation andexegetical research.Usuallytaken in conjunction with one ofthe following: Religion 320, 330, 335, or 431. Repeatable course. Contentchangeseachtime courseis offered.Repeatableuptofourcredit hours. Prerequisite: Greek 211 or Hebrew 112.
REL 445 Religion, Peace and Justice (3) Provides in-depth engagement with religious approaches to ethical concerns in the social sphere,especiallyrelatedtoquestions of warand peace,violenceand nonviolence,andeconomicandsocialjustice.Predominantlyfocused on the Christian tradition, the course will also include engagement with significantfigures inselected otherreligioustraditions.Prerequisite: One course in religion (preferably Religion 201) or permission of instructor.
REL 481 Directed Study in Religion (1) Offers research in special problemsorpersonsunderthedirection of a memberofthe religion faculty. Contentchangeseachtimecourseisoffered.Mayberepeated for up to nine hours. Prerequisite: Permission of instructor.
REL 492 Religion Internship (1) Supervised field experience in church or other house of worship, nonprofit organization, or similar area of direct relevance to a religion major.
REL 495 Capstone Experience in Religion (1) A one credit hour
course that must be taken in conjunction with an approved 300 or 400 level religion course in orderto meet the general education capstone requirement.

## Russian (RUSS)

Russian courses are taught by the faculty of the Department of Foreign Languages and Cultures.
RUSS 111 Elementary Russian I (3) Emphasizes practice in grammar, speaking, listening, writing, reading, and cultural awareness.
RUSS 112 Elementary Russian II (3) Emphasizes practice in grammar, speaking, listening, writing, reading, and cultural awareness.
RUSS 211 Intermediate Russian I (3) Continues practice in grammar, speaking, listening, writing, reading, and cultural awareness.

RUSS 212 Intermediate Russian II (3) Continues practice in grammar, speaking, listening, writing, reading, and cultural awareness.

## Social Work (SW)

Social work courses are taught by the faculty of the Department of Law, Politics, and Society.
SW 120 Introduction to Social Work (3) Introduces profession of socialwork. Focusesonthehistoricalevolution ofthe professionand its role in modern society.

## Sociology (SOC)

SociologycoursesaretaughtbythefacultyoftheDepartmentofLaw, Politics, and Society.
SOC 105 Introduction to Sociology (3) Introduces major concepts used by sociologists to understand and predict the behavior of individuals in group settings.
SOC 201 Professional Development in Sociology (1) This course is a professional orientation designed to provide an overview of various internship opportunities, career pathways, and graduate school options available in the discipline. In addition, the course serves as an introduction to academic writing, ethics, and research in sociology and social and human services. Students cannot earn credits in SOC 201, CJ 201, and PSYC 201.

SOC 210 Deviance and Crime (3) Examines deviance and crime throughanumberofsociological, psychological, andcriminological perspectives.
SOC 230 Social Problems in the Modern World (3) Focuses on major social,economic, political, andenvironmental issuesconfronting the modern world. Covers both global and U.S. issues.
SOC 327 Human Behavior in the Social Environment (3) A sociologicalsocial psychologycourse.Exploressocialinteraction,selective perception, human symbolic behavior, language, social structure, emotions, perceptions and memory, sexuality, development of self, identity, aging, and deviance. Prerequisite: SOC 105 or permission of instructor.

SOC 330 Community Organization (3) Explores the basics of communityorganizationanddevelopment, withspecialattentionto urbanized areas. Prerequisite: SOC 105 or SOC 230; or permission of instructor.
SOC 335 Marriage and Family (3) Designed to give an in-depth look at changing courtship, martial, and family patterns in America over the course of the last century. Studies the history and importance of the family as a social institution, and the different forms and configurations of the family found in modern America. Prerequisite: SOC 105 or SOC 230; or permission of instructor.

SOC 337 Social Aspects of Health and Health Care (3) Examines the nonbiological aspects of health and health care. Topics include socialdefinitions ofhealth, professionalizationinthehealthindustry, patient-practitionerrelationships, andtheorganizationofhealthcare systems in the United States and other countries. Prerequisite: SOC 105, SOC 230, PH 190, or PH 195; or permission of instructor.
SOC 343 Social Research Methods (4) Covers both quantitative and qualitative sociological research methods. Topics include the relationshipbetweentheoryandresearch, conceptualization,opera-tionalization,hypothesis,andmodeldevelopmentandsampling.Specific datagatheringtechniques coveredincludesurveydesigns,field studies,secondaryanalysis, unobtrusivemeasures, andexperimental techniques. Discusses ethical issues and responsibilities in social scienceresearch andthelimits ofthescientificmethodin social science. Prerequisites: Sociology or criminal justice major or permission of instructor.
SOC 344 Introduction to Behavioral Statistics (4) Recommended for studentsdesiringanintroductorystatisticscoursewhichemphasizes application and interpretation. Covers basic statistical techniques usedinbehavioral research. Studiesfrequentlyuseddescriptiveand inferentialstatisticswithemphasisontheinterpretationofquantitative dataandstatistical reasoning inbehavioral research. Prerequisite:SOC 343 and criminaljusticeorsociologymajororpermission ofinstructor.

SOC 350 Popular Culture (3) Examines the sociological impact of popularculturebyexploringrace,class,gender, sexuality,andfamily throughtheculturallensoffilm,television, andmusic. Topicsinclude the changing portrayals of race, class, gender, sexuality, and family across the last century in reflecting cultural values and ideals, and theirreciprocalinfluenceoncultureandAmericanidentity. Prerequisite: SOC 105 or SOC 230; or permission of instructor.
SOC 370 Advanced Topics in Sociology (1) Intensive analysis of sociological topics not covered in regular course offerings. Provides greaterdepthtotopics of special interestorexploreschangingareas ofsociologicalstudy.Repeatablecourseupto3credithours;content changes each time course is offered. Prerequisites:SOC 105 andSOC 230; or permission of instructor.
SOC 371 Love and Attraction (1) Examines the theoretical frameworksandresearchfindingsonhumansocialrelationships,exploring the social norms, values, attitudes, and behaviors of love and attraction. Topics include: the social construction of love and attraction, cross-historicaldefinitionsoflove,acceptableforms oflove,problematicaspectsofloveandattraction, the developmentofinterpersonal attraction, intimacy, and attachment styles. Prerequisites: SOC 105 and SOC 230; or permission of instructor.
SOC 372 Qualitative Interviewing Skills (1) Intensive methodological training in qualitative interviewing with a focus on skill developmentandexperientiallearningininterviewtechniques.Prerequisites: SOC 105, SOC 230 and junior or senior standing; or permission of instructor.
SOC 380 Applied Research Lab (1) Provides opportunities for collaborativeundergraduateappliedresearchusingsociological research techniques to gather project-based information. This research is conducted with the guidance and supervision of a faculty member. Prerequisite:Sociology or criminal justice major, sponsorship by the supervisingfacultymember,andjuniororseniorstanding;orpermission of instructor.

SOC 386 Death and Dying (3) Explores thanatology - the study of death - using a sociological lens. Examines how American society shapes attitudes and behaviors toward dying, death, and bereavement. Topics of study include: cultural traditions, rituals, practices, and attitudes toward death, self-awareness and value identification
concerning death and dying, grief and bereavement, the impact of death and dying across the life span, and end-of-life planning. Prerequisites: SOC 105 or SOC 230 and junior or senior standing; or permission of instructor.
SOC 390 Principles of Sociological Theory (3) Examines classical and contemporary sociological theories, as well as micro- and mac-ro-sociologicalapproaches.Generaltheoreticalframeworksinclude constructionism,functionalism, conflicttheory,feminism, symbolic interactionism, postmodernism, network analysis, and integrated theories. Prerequisites: SOC 105 or SOC 230 and junior or senior standing; or permission of instructor.
SOC 415 Globalization and the Environment (3) Examines the changingdemographicsofourworldandhowtheyimpactthesocial, economic,environmental, and politicalrelationshipsbetweencountries. Explores the transformation to a global society and the basic concepts of globalization, as well as how the relationships between human societies and the larger natural environment are affected by demographic pressures and global needs. Prerequisites: Junior or senior standing; or permission of instructor.
SOC 435 Sex, Gender, and Sexualities (3) This course explores the social norms, values, and expectations that influence - and are influencedby-attitudes,beliefs,andbehaviorsregardinggenderand sexuality. The course examines the different and changing cultural understandingsofgenderrolesandsexuality, andthesocial construction of both. Prerequisite: SOC 105 or SOC 230 and junior or senior standing; or permission of instructor.
SOC 438 Race and Ethnic Relations (3) Studies the sociology of United States and global minority and ethnic relations. Examines class, ethnic, gender, andracialstratification, and powerandinequality. Analyzes patterns of ethnic integration and multiculturalism. Detailsthesocialand psychologicaldimensionsofdiscriminationand prejudice, as well as racial and ethnic conflict and accommodation. Prerequisite: SOC 105 or SOC 230; or permission of instructor.
SOC 450 Senior Seminar in Sociology (3) Capstone educational experienceinsociology, offeringstudentstheopportunitytousetheir substantiveandmethodologicaltrainingtocompleteand presentan original research project. Prerequisites: SOC 343, 344 and criminal justice or sociology major; or permission of instructor.
SOC 460 Aging and Society (3) Recommended for any student desiring a thorough introduction to gerontology. Examines the social response to aging in American society and in other countries. Emphasis on the roles ofelders inthefamilial, religious, political, and economic institutions. Prerequisite: SOC 105 or SOC 230 and junior or senior standing; or permission of instructor.
SOC480UndergraduateResearchinSociology(1-2) Providesopportunitiesforundergraduateresearchthatinvolveliteraturereview, data collection, analysis, andformalreporting.This research is conducted withtheguidanceandsupervision of adepartmentfacultymember. May be repeated for a maximum of 2 hours. Prerequisites: Junior or senior standing; or permission of instructor; sponsorship by the supervising faculty member.
SOC 494 Directed Study (3) Provides opportunity for specialized advanced study. Prerequisite: Permission of instructor.
SOC 496 Internship (1-2) Internships available to majors of junior or seniorstandingwhohavecompletedcorecourses.GPArequirements must be met and student must file an internship application with advisor.
SOC 497 Internship in Teaching Sociology (1-2) Provides majors of junior or senior standing with a comprehensive, supervised field experienceinteachingandsociologicalpedagogy.Designedforstu-
dentswhoarepreparingforgraduatestudyinthesocialsciences.GPA requirements must be met and students must file a teaching intern-shipapplicationwithadvisor.Prerequisites:Sociologymajor,sponsorship by the supervising faculty member, junior or senior standing, or permission of instructor. (1-2 credits).

## Spanish (SPAN)

Spanish courses are taught by the faculty of the Department of Foreign Languages and Cultures. All courses are taught in the target languageunlessotherwisenoted.Prerequisite:CompletionofSpanish 312 for all 300-level courses or above.
SPAN 111 Elementary Spanish I (3) Emphasizes practice in speaking, listening, writing, reading, and cultural awareness.
SPAN 112 Elementary Spanish II (3) Emphasizes practice in speaking, listening, writing, reading, and cultural awareness.
SPAN 211 Intermediate Spanish I (3) Continues practice in speaking, listening, writing, reading and cultural awareness.
SPAN 212 Intermediate Spanish II (3) Continues practice in speaking, listening, writing, reading and cultural awareness.
SPAN 312 Conversation and Composition (3) Focuses on the process and development of effective writing skills and expression in Spanish. This course is a prerequisite for all 300/400-level Spanish courses. Prerequisite: SPAN-212.
SPAN 313 Spanish for Heritage Speakers (3) Spanish heritage language learners are those individuals who are proficient in English and who were immersed in or exposed to the language while growing up, but who have received little or no formal instruction in Spanish. This course focuses on the development of communicative competence in reading, writing, speaking and listening, as well as on understanding Hispanic cultures and issues of identity of heritage speakers of Spanish in the United States. Students will also develop an awareness and understanding of Hispanic cultures, including language variation, customs, geography, history, and current events. Taught exclusively in Spanish, this course is designed for heritage or native speakers only. Prerequisites: SPAN 212 , or placement exam score, or AP exam score 4.
SPAN 314 Business Spanish (3) This course provides specialized vocabulary, idiomatic expressions, communication patterns, and common practices in Hispanic societies and settings in the world of business and commerce. This course is recommendedforthosewho wishtoapplytheirknowledgeofSpanish in business careers. Taught in Spanish. Prerequisite: SPAN-312.
SPAN 317 Intro to Spanish-English Translation (3) This course will explorethebasic principles oftranslationandinterpretation, thetheory, the methods, the challenges, the problems and the satisfaction involved in rendering both written texts and oral statements from SpanishintoEnglishandvice-versawithoutlosingthebasicideas, the intent, thestylisticlevel, andthelinguisticregister.Theemphasisison generalmaterialtakenfromjournals, newspapers,electronicmedia, governmentpublications,pre-recordedaudioandvideospeechesand dialogues, andlive presentationswith someconsideration ofspecializedmaterialfromthefields ofbusiness, literature, medicine,agriculture,biodiversityandsustainability, politicalscience,advertisement, law, informationtechnology, and sports. Emphasis will be placed on translating fromSpanishtoEnglish, withsomeconsiderationgivento English-Spanish translation. Prerequisite: SPAN-312.
SPAN 320 Social Issues in Hispanic Society (3) Introduces specific social, ideological, and philosophicalissuespertinenttotheHispanic world in Spain, Latin America, and United States. Prerequisite: SPAN-312.

SPAN 321 Introduction to Hispanic Literature (3) This course focuses on reading andanalyzingtexts by Hispanic (Spainand Spanish America) authors of various literary genres. Students study basic literary terms, concepts, methods, techniques, and movements to analyze and interpret literary texts.Students will develop aural, oral, reading, and writing skills, and deepen understanding of Hispanic culture and society. Taught in Spanish. Prerequisite: SPAN-312.

SPAN 325 Medical Spanish I (3) Focuses on medical terminology. The courseintroducessituationalvocabulary, anatomicalstructures and theirbasicfunctions, andmedical and clericalterms usedinclinicalsettings.Especiallyrecommendedforstudentsconsideringcareers inhealthcare,healthservices, publichealth, andteaching professions. Prerequisite: SPAN-312.
SPAN 330 Independent Study (1) Course content and credit hours determined in consultation with the instructor. Course may be repeatedwithcontentchange.Prerequisite:Spanish311 orpermission of instructor. Department chair approval is required. Prerequisite: SPAN-312.
SPAN 333 Introduction to Hispanic Culture (3) Introduces the various Hispanic cultures found in Spain, Latin America, and United States. Prerequisite: SPAN-312.
SPAN 335 Foreign Lang Study Abroad (1) Foreign Language Study Abroad. Repeatable with content change. Prerequisite: SPAN-312.
SPAN 350 Medical Spanish II (3) This course covers medical terminology and focuses on concepts and practices to develop culturally responsive care by highlighting medical assessment and stressing aural/oral communication in clinical settings. This course includes Hispanic cultural elements and an introduction to medical interpretation to prepare students for potential careers in healthcare, health services, public health, and teaching professions. Taught in Spanish. Prerequisites: SPAN 312 and 325.
SPAN 410 Spanish Practical Phonetics: Pronunciation and Variation (3) Introduction to theory and practice of Spanish pronunciation, including dialectal and historical variation. Prerequisite: SPAN-312.
SPAN 411 Advanced Spanish Grammar (3) An advanced grammar course that will provide students with the background necessary for moreadvanced courses. The course willfocuson continuedmastery of the most difficult points of Spanish grammar. Prerequisite: SPAN 312 or permission of instructor.
SPAN 433 Hispanic Civilization (3) Studies history and culture of Spain and Latin America. Taught in Spanish. Prerequisite: SPAN312.

SPAN 435 Foreign Lang Study Abroad (1) Foreign Language Study Abroad. Repeatable with content change. Prerequisite: SPAN-312.

SPAN 438 Spanish Seminar (3) Topics vary. Generally covers outstanding Hispanic authors and literary works. Course may be repeated with content change. Prerequisite: SPAN-312.
SPAN 450 Introduction to Spanish Linguistics (3) Studies the structure of the Spanish language as well as to the way in which language is used in different social situations by different speakers, and its dialectical, historical, social, and contactsituations such as the situation of Spanish in the U.S. Prerequisite: SPAN-312.
SPAN 458 Introduction to Hispanic Pragmatics (3) Focuses on the way we convey meaning through communication. This meaning includesverbalandnon-verbalelementsandvariesdependingonthe context, the relationship between people talking, and many other socialfactors. Exploresthewaysinwhich cultureinterrelateswithand effectscommunicationprocesses,andmorespecificallythedynamics that arise in social interactions in the Hispanic culture. Examines variouselements relatedto pragmatics such ascommunicativeacts,
politeness,andtheappropriateuseoflanguageinconductingspeech acts such as apologizing, requesting, complimenting, refusing, and thanking in Spanish. Prerequisite: SPAN-312.

## Statistics (STAT)

Statistics courses are taught by the faculty of the Department of Mathematics.

STAT 166 Introduction to R for Data Science (1) The course serves as an introduction to the statistical software program R as it applies to the field of Data Science. This course will cover the importation, exploration, visualization, and transformation of data in $R$ as well as the communication of results using R. Prerequisite: MATH-105.
STAT 188 Data Visualization (3) Data visualization involves the thoughtful design and creation of visual representations of data (such as charts, graphs, and maps) to convey numeric and non-numeric information in an informative and compelling way. In addition to learning foundational principles of the visual representation of data, students will gain the skills necessary to communicate complex information effectively, understand how data visualizations can be used to inform decision making and fuel data-driven insights, and create their own visualizations using software, including Tableau.
STAT 191 Special Topics in Elementary Statistics (0.5-3) Study of topics of special interest in statistical programming. Treats material not covered in other courses. Topics will be announced. May be repeated. Prerequisite: Will be announced when scheduled.

STAT 266 Introductory Statistics With R (3) This course serves as an introduction to the foundations and applications of statistics in the framework of the field of Data Science. Covering key aspects of data exploration, visualization, and traditional topics in statistical inference,thiscourseis approachedthroughaproject-basedcurriculumusingopendata sourcesfromvariousareasofapplicationandthe open-sourcestatistical software program R.Prerequisite: Grade of C or better in STAT-166 or permission of instructor.

STAT 267 Experimental Design (3) The thoughtful design of an experiment provides the best chance of producing meaningful, defensible evidence to answer questions of interest. This course will cover the process of planning a well-designed experiment to collect appropriate data such that an analysis using standard statistical procedures results in valid and objective conclusions. Design methods will be applied and analyzed using a standard statistical software program, such as R. Prerequisite: STAT-266.
STAT 286 Polling and Surveying (3) Polling and surveying are fundamental methods for gathering information in a wide variety of fields. This course explores key aspects of the full polling and surveying endeavor, including clearly defining the purpose of a poll or survey, questionnaire design, sampling, poll/survey deployment, data analysis, and the communication of findings and insights.Pre-Requisites QM-227, STAT-266, SOC-344, PSYC-245, or permission of instructor
STAT 291 Special Topics in Intermediate Statistics (0.5-3) Study of aspects or applications of statistics and/or experimental design not covered in STAT 266 or 267 . Topics will be announced. May be repeated.Prerequisite:STAT266;any additional prerequisites willbe announced when scheduled.
STAT 300 Data Analysis in the Real World (3) This course is designedto providestudentsanopportunitytoapplydataanalytics inarealworldcontext.Studentswilllearntoconductacompletedata analytics project, including understanding the context; collecting, organizing, visualizing, and analyzingthe data; and communicating the findings to the client. Analysis will be supported using statistical
software,includingR.Becauseitsoverarchinggoalsalignclosely with the university's ChangeLab program, this course may be offered as a ChangeLabcourse.Becausethetopics(andthusthenecessarystatistical tools) will vary with each offering, this course may be repeated. Prerequisite: STAT-266.
STAT 361 Linear Models (3) Provides an in-depth look at linear regression models by considering both the theory of the linear model and the skills needed to conduct relevant analyses using the statistical software program R. Topics includeestimation, inference, diagnostics, transformations, variable selection, ANOVA, and a brief introduction to Generalized Linear Models. Prerequisites:STAT-266, MATH-341.
STAT 362 Machine Learning (3) Introduces Machine Learning and its core models and algorithms by examining techniques in both supervised and unsupervised learning. Algorithms under considerationareregression, decision trees, neuralnetworks, supportvector machines, andclusteringalgorithms. Conceptsandalgorithmswillbe implementedusing thestatistical software program R.Prerequisite: STAT-266.
STAT 391 Special Topics in Statistics (0.5-3) Covers topics not includedinothercoursestogivegreaterdepthincertainareas and to explorecurrentstatistical topics. Topics vary, may includeadvanced regressiontechniques, advancedmachinelearningtechniques, artificialintelligence,advancedtimeseries.Mayberepeated.Prerequisite: STAT 267; additional prerequisites will be announced when scheduled. Prerequisites will be announced when scheduled.
STAT 474 Techniques for Large Data Sets (3) This course treats methodologies and customized algorithms and tools for efficiently extracting, interpreting, and drawing inferences from very large datasets. It begins with an introduction of the Big Data problem and the limitations of applying standard statistical techniques to large datasets. It develops algorithms for Big Data analysis - including data compression, indexing, and summarization - and provides experience in using Big Data-specific tools such as Map-Reduce and Hadoop in conjunction with the general purpose statistical software program R. Prerequisite: STAT-266.
STAT 490 Seminar/Workshop/Independent Study Statistics (0.5-3) Seminar/workshop topics announced when scheduled. Independent study topics selected by students in consultation with the mathematics professor who supervises the work. Permission of instructor
STAT 491 Special Topics in Advanced Statistics (0.5-3) In-depth exploration of a topic not covered in other courses. Topics vary, but may include advanced data mining, text mining, and advanced database structures. May be repeated. Prerequisites: STAT-361; additional prerequisites will be announced when scheduled.

STAT 493 Statistical Modeling (3) Encompasses the entire cycle of a data analysis project, including problem formulation, acquisition andcleaning ofdata, modelselection, andfitting, parameterestimation, interpretation, and reporting. Draws on multiple data analytic techniquesdevelopedacrossanarray ofstatistics coursestoaddress real-world problems. Involves team projects and a seminar format. Corequisites: STAT-362, MATH-466. Prerequisite: STAT-361.

## Teaching English as a Second Language (TESL)

TESL 200 Second Language Acquisition (3) TESL 200 introduces students to the field of second language acquisition (SLA), which is adisciplinefocused onhowhumanslearnadditionallanguagesafter they have learned their first; factors that contribute to the variability observedin rates andoutcomes;andwhatittakestoattainadvanced
academiclanguageandliterarycompetenciesinalanguageotherthan the mother language.
TESL 301 English Teaching Grammar ESL/EFL Studnt (2) TESL 301 will provide a thorough grounding in the grammar of English and a variety of approaches and techniques for teaching English grammar. It will present English as both a set of rules and as a communicativeresourcesthatshouldbeexploredcriticallyandappliedin a context-specific manner. This course is a critical study of aspects of Modern English grammar important for the teaching of English as a Second ofForeign Language. Students will gain an understanding of themajorsyntacticandsemanticphenomenaimportantforteaching ESL/EFL, becomefamiliar with the practical and theoreticalliterature onteachingEnglishgrammar,participateinpracticalexercisesofgrammar correction in writing with actual ESL students, and develop and compile classroom activities for teaching points of grammar.
TESL 302 Assessment and Evaluation of English Language Acquisition (3) This course examines various assessment measurements and their role in the evaluation of the placement and progress of English second language (ESL) learners in the United States and abroad. This course emphasizes the use of alternative assessments and reviews placement diagnostic outcomes, exit criteria, and State mandated assessments. Alternative assessments, which are linked to standards, learning objectives, and national norms that may be connected to instruction are examined. Prerequisite: TESL 200 or permission of instructor.
TESL 325 Developmental Linguistics (2) This course introduces students to the nature of language development in infancy and childhood. It also examines cognitive, developmental, environmental, and physiological influences on language skills. Theories of language development, and their influences on research and our understanding of children, will be discussed. Topics include perception of sounds, acquisition of grammar, first and second language learning, and developmental language disorders. The relationship between language skills and overall development (social, cognitive, and biological) will also be explored.
TESL 326 Principles and Methods of TESL (3) This course provides a comprehensive overview of effective English as a new language strategies and techniques to the fundamentals of second language acquisition. Designed for those who are either presently teaching or will be teaching English to ESL students in the classroom. Prospective ESL teachers learn practical classroom applications and various teaching strategies based on ESL principles. This course provides guidelines for planning lessons, developing activities, and effective methods for correcting student errors. Prerequisite: TESL 200 or permission of instructor.
TESL 328 Foundations of Dual Language Instruction History (2) his course provides a broad foundational basis for understanding the history and legal basis of bilingual education, dual language programs, and ESOL programs in the United States and in international contexts. Ethical, legal, historical, and linguistic aspects of second language education are explored.
TESL 329 Linguistics for ESL Teachers (3) This course provides the essential linguistics background necessary for the ESL teacher. It address the Standard 1 Linguistics requirements developed by the Indiana Department of Education (IDOE). Teachers of English Learners (EL) should have a broad and comprehensive understanding of the components of language as applied to ESL instruction. It introduces elements of English phonology, morphology, syntax, semantics, and pragmatics and the similarities between English and other common languages. It discusses English language variation of English in regional dialects and international contexts. It provides a bridge for specific strategies to help ESL
students develop proficiency in all skill areas of English. Prerequisite: TESL 200 or permission of instructor.
TESL 417 Internship in English as a New Language (3) Opportunities to integrate basic skills and knowledge in selected applied practice situations.Includesafieldexperiencewithobservations,assessments, lessonpresentationand planninginanEnglish-as-a-new-languagesetting. Prerequisites: TESL-200 or permission of instructor.
TESL 433 Supervised Teaching and Observation ESL (6) Teaching, observation, and participation activities under the supervision of a cooperatingteacherandaUniversitysupervisor.A gradeofCorbetter mustbeearnedinstudentteachingtoberecommendedforateaching license.
TESL 491 International Clinical Experience TESL (3) International internship placement providesopportunitiestointegratebasicskills and knowledge in selected applied practice situations. Includes an arrangedinternationalfieldexperiencewithobservations,assessments basedontheCEFR standards,lesson presentation and planning inan Englishasasecondlanguagesetting.Studentswillmaintainareflective journal, developanevaluative portfolioofonestudents' work, useand evaluatemultipleassessmentinstruments,anddemonstrateapplication ofthestate professionalandcontentstandards.Perquisites:TESL325, 328 , or permission of instructor.

## Theatre (THTR)

Theatre courses are taught by the faculty of the Department of Theatre.

THTR 110 Introduction to Theatre (3) Acquaints students with the process of creating theatre and enhances their ability to enjoy andappreciateperformances.Requiresobservationsofsomeevening rehearsals and performances in addition to attendance at lectures. Fall, spring.

THTR 111 Fundamentals of Acting (3) Introduces fundamentals of actingthroughscenestudyandrelatedexercisesandexploresthevoice process during two consecutive semesters. Fall, spring.
THTR 112 Fundamentals of Acting (3) Introduces fundamentals of actingthroughscenestudyandrelatedexercisesandexploresthevoice process during two consecutive semesters.
THTR 120 Production Techniques I (3) Introduces concepts and techniques in the areas of scenery construction, theatre space use and organization. Students becomefamiliar with management and organizationbehindthescenes.Specialemphasisonsafetyandhealth backstage. Fall.
THTR 125 Introduction to Makeup and Costumes (3) Introduces essential techniques for makeup application and costume constructionandmaintenance.Coverstoolsand principles ofbasic corrective makeup and costume construction with practical application. Fall, spring.
THTR 130 Color and Design for Theatre (3) Acquaints students with the basic principles of design which govern all forms of visual expression. Provides students with the means to communicate in visual terms. Fall, spring.
THTR 135 Graphic Communication for the Theatre (3) (with lab) Preparesstudentsfordesigncoursesbyexaminingmethodsandprocedures for developing effective communication and realization of visual concepts.Placesequalemphasisonmechanical handdrafting, drawing, and sketching. Includes introduction to lighting graphics and model making. Spring.
THTR 160 Dramaturgy I: Script Analysis (3) Introduces students to dramaturgical techniques for interpreting plays.

THTR 171 Acting I: Process Awareness (3) Examines the fundamentalsoftheactingprocessthroughexercisesandscenestudy.Students participate in exercises designed to strengthen such skills as trust, relaxation, imagination, concentration, ensemble, andobservation. Prerequisite: Theatre majors only. Fall.
THTR 172 Acting II: Process Awareness (3) Explores the vocal and physical demands placed on an actor. Techniques are learned for finding physical neutrality and acquiring a basic knowledge of how thevoiceworks.Addresses AmericanStageStandardanddeveloping apersonalvocal and physicalregimen.Prerequisites:Theatremajors only; THTR 171. Spring.
THTR 190 Theatre Practicum (1) Introduces departmental procedures in all areas of theatre operation. Provides students with the knowledge of backstage safety, equipment, and methodology throughformal presentationandhands-onexperiences.Beginsstudent involvement in practical participation in productions. May be repeated for a total of 2 credit hours. Fall, Spring.

THTR 220 Production Techniques II (3) Develops advanced theoretical and practical application of concepts begun in Theatre 120. Students investigate advance scenic construction techniques in carpentry, metalworking, and rigging. Prerequisites: THTR 120. Spring (offered alternate odd years).
THTR 221 Production Techniques III (3) Explores a variety of technical theatre topics offered in relation to current production needs and student interests. Topics may include Lighting production, sound design and production, advanced woodworking, rigging, metalwork, or automation. Repeatable course up to 3 separate topic offerings
THTR 225 Makeup (3) Refines the techniques of makeup introduced in Theatre 125. Provides a detailed study ofthe techniques for applyingmakeupemphasizingcharacterandperiodresearch.Projects introduce prosthetics and the application offacial hair. Prerequisite: THTR 125. Fall.

THTR 226 Costume Construction (3) Investigates the fundamentals of costume construction introduced in Theatre 125. Topics include pattern drafting, draping, cutting, fitting, and advanced stitching. Practical projects introduce fabric identification. Prerequisite:THTR 125. Fall, spring.

THTR 245 Dance I (2) Develops the actor's physical movement and dance proficiency in a one-year studio. Fall, spring.

THTR 246 Dance I (2) Develops the actor's physical movement and dance proficiency in a one-year studio. Fall, spring.

THTR 251 Introduction to Theatre Histories (3) Introduces students to the creation of theatre in different time periods and cultures.
THTR 271 Acting III: Character Study (3) Investigates the basics of character development through scene study, text analysis, vocal, and physical exercises. Prerequisites: THTR 111, 112 or 172. Fall.
THTR 272 Acting IV: Character Study (3) Investigates the basics of character development through scene study, text analysis, vocal, and physical exercises. Prerequisites: THTR 111, 112 or 172. Spring.
THTR 290 Theatre Practicum (1) Through practical experiences, involvesstudentsintheareas oftechnicaltheatre,costumeconstruction, and ticket office. May be repeated for a total of 2 credit hours. Prerequisite: THTR 120 or 190. Fall, spring.
THTR 291 Theatre Practicum for Stage Managers (1) Through practical experiences, involves students in the area of stage management. Prerequisite: THTR 190. Fall, spring.
THTR 331 CADD for Theatre I (3) Develops beginning-level techniques for using computer assisted drafting and design (CADD)
for theatre. Emphasis on Vectorworks 2D drafting and theatre graphics. Prerequisites: THTR 135. Fall.
THTR 332 CADD for Theatre II (3) Develops advanced level techniques using computer applications for a variety of purposes in the theatre. Emphasis on use of software such as Vectorworks 3D, Google Sketchup 3D, and Adobe Creative Suite to enhance skills for portfolios, presentations, and rendering. Prerequisite: THTR 130, 331.
THTR 335 Scene Design (3) Examines the theory and practice of scenic design and manipulation of stage space. Special emphasis on the development of the "design concept" as related to all aspects of theatrical design. Prerequisites: THTR 135. Spring.
THTR 336 Lighting Design (3) Examines the theory and practice of lighting design. Emphasis on the role of the lighting designer as a creative member of a collaborative team. Students explore a variety of approaches to developing a successful lighting design. Prerequisites: THTR 135. Fall.
THTR 337 Costume Design (3) Examines theory and practice of costume design. Emphasis on development of design concepts and visualization and articulation of ideas. Investigates various approaches and techniques for creating the costume design. Prerequisites: THTR 125, 130, 135; or permission of instructor. Fall.
THTR 338 Sound Design For The Stage (3) An in-depth study of the artistic and mechanical fundamentals of sound design for theperforming arts. Through demonstrations, lectures, labs, and projects we will examine the various tools and techniques necessary to create sound designs with current standards and practices.Emphasis on the role of the sound designer as a creative member of a collaborative team.
THTR 345 Dance II (2) Expands the actor's physical movement and dance proficiency in a one-year studio. Prerequisites: THTR 245, 246; or permission of instructor. Fall, spring.
THTR 346 Dance II (2) Expands the actor's physical movement and dance proficiency in a one-year studio. Prerequisites: THTR 245, 246; or permission of instructor. Fall, spring.
THTR 350 Stage Management (3) Examines current topics and trends in stage management and explores techniques in the field. Seminar-style class involves students in independent research projects with written and oral sharing of information. Prerequisites: THTR 120. Spring (offered alternate odd years).
THTR 361 Theatre History I (3) Examines social, religious, political, and artistic forces that have contributed to the development of theatre in the West from its origin through the present. Culminates with a final project in which students choose a play or topic and research its social, religious, political, and artistic context. Should be taken in sequence. Prerequisites: THTR 110 or 160; junior or senior standing. Fall.
THTR 362 Theatre History II (3) Examines social, religious, political, and artistic forces that have contributed to the development of theatre in the West from its origin through the present. Culminates with a final project in which students choose a play or topic and research its social, religious, political, and artistic context. Should be taken in sequence. Prerequisites: THTR 110 or 160; junior or senior standing. Spring.
THTR 363 Period Styles for the Theatre 1: Architecture and Decor (3) Connects cultural values with visual imagery representative of important historical periods through a survey of architecture, interior design, and decorative arts from the pre-historic to the modern eras. Emphasis on period research and its importance in the artistic process. Prerequisite: THTR 110 or 160 . Spring (offered
alternate even years).
THTR 364 Period Styles for the Theatre 2: Costume History (3) Connects cultural values with visual imagery representative of important historical periods through a survey of fashion and clothing from the prehistoric to the modern eras. Emphasis on period research and its importance in the artistic process. Prerequisite: THTR 110 or 160 . Spring (offered alternate odd years).
THTR 365 Playwriting (3) Proceeds from basic scene and character development to the writing one-act plays. Prerequisite: THTR 110 or 160 .
THTR 371 Acting V: Classical Texts (3) Prepares the student actor to perform scenes from classical dramatic literature, including Shakespeare, Sophocles, Ibsen, Chekhov, and others. Scenes specifically selected to develop physical, sensorial, vocal, and emotional skills. Prerequisites: THTR 271 or 272; permission of acting faculty. Fall.

THTR 372 Acting VI: Advanced Scene Study (3) Catered to students enrolled, scenes are specifically selected to further challenge the individual actors process and allow exposure to a wide variety of established works. Prerequisites: THTR 371 or permission of acting faculty. Spring.
THTR 375 Acting in Dialect (3) Presents an in-depth study of performing in dialect. Students gain the necessary knowledge and skill required to create appropriate and credible dialects needed for roles in the theatre. The course teaches students to develop a dialect through vowel and consonant changes, sound placement, and mastering the differences in inflection, rhythm, and tempo. Prerequisite: THTR 172 and junior or senior standing. Fall.
THTR 381 Philosophies and Ethics of Theatre (3) Explores the intersections of past and present in the act of creating theatre and the art of writing historical narratives. Prerequisite: THTR 160
THTR 382 Dramaturgy II: Research Methods (3) Introduces students to dramaturgical methods for researching and contextualizing plays for production. Pre-requisite: THTR 160.

THTR 390 Theatre Practicum (1) Continues student involvement begun in Theatre 290 with practical experiences in various aspects of theatre production. May be repeated for a total of 2 credit hours. Prerequisites: THTR 190 and 290. Fall, spring.
THTR 391 Theatre Practicum for Stage Managers (1) Continues student involvement begun in Theatre 291 with practical experiences in stage management. May be repeated for a total of 2 credit hours. Prerequisite: THTR 291. Fall, spring.
THTR 395 Special Topics (1) (1-3 credits) Permits the study and/or practice of auxiliary topics not covered in the regular curriculum in a seminar format. Topics might include musical theatre, regional theatre, stage management, or advanced stagecraft. May be repeated for a maximum of six credits. Offered on demand.
THTR 400 Theatre Management (3) Examines the history, theory, and practice of theatre management and arts administration. Covers basic components of organization, operations, and general management practices. Prerequisite: Junior or senior standing. Spring (offered alternate odd years).
THTR 430 Advanced Design Projects (1) (1-3 credits) Provides design students an opportunity to explore concepts and skills on an advanced level through paper projects. Individualized course of study is theoretical in nature and is developed in conjunction with a member of the faculty to satisfy each student's needs. Prerequisite: Permission of design faculty. May be repeated for a maximum of six hours. Fall, spring.

THTR 435 Senior Portfolios and Career Preparation (3) Prepares students to interview for opportunities in the professional theatre, graduate programs, and internships. Acquaints students with the nature of postgraduate training and career options. Prerequisites: Senior standing; permission of design faculty. Fall.
THTR 440 Director and Designer Collaboration Seminar (3) Explores the collaborative experience in design, through shortterm and long-term projects. Focuses on the interaction of artistic teams and the creative process of conceptualizing a theatrical production. Prerequisite: Successful completion of one or more of the following: THTR 335, THTR 336, THTR 337, THTR 481. Fall.
THTR 450 Arts Leadership (3) Overview of accounting procedures and budgeting for the theatre, in combination with an intensive study of audience development and marketing trends directly related to the efficient management and promotion of the arts. Prerequisite: Junior or senior standing. Spring (offered alternate even years).
THTR 465 Senior Seminar in Theatre (3) Encourages students to consider their own values and goals as they prepare to embark on a career in theatre. Emphasis on integration of independent research and creative practice through writing and presentations. Capstone general education requirement for theatre majors. To be taken in the senior year. Spring.
THTR 471 Acting VII: Audition Techniques (3) Prepares students to audition for opportunities in the professional theatre, graduate programs, and internships. Acquaints students with the nature of postgraduate training and career options. Prerequisite: THTR 372 or permission of instructor. Fall.
THTR 472 Acting VIII: Advanced Project (3) Provides students the opportunity to demonstrate research, analytical, artistic, and technical skills, culminating in a formal presentation. Prerequisite: THTR 471 or permission of instructor. Spring.
THTR 481 Directing I (3) Provides the beginning directing student with an initial experience in directorial analysis and the experience of mounting selected scenes in a proscenium, arena, and thrust environment. Focuses on Principles of directing, interpretation, composition, the actor, and realization of a directorial concept. To be taken in the junior year. Fall, spring.
THTR 482 Directing II (3) Provides a limited number of advanced directing students with an opportunity to expand their directing skills with more complex scene choices. Intensive analysis is expected as well as production exercises which illustrate a student's ability to deal with the concept-to-realization process. To be taken in the senior year. Entrance by application. Fall, spring.
THTR 495 Independent Study (1-3 credits) Permits advanced creative and scholarly work in any area of the theatre arts. The specific plan of study for each individual is determined in consultation with the faculty. Areas of study may include directing, design, playwriting, dramaturgy, theatre history, and pedagogy. Prerequisite: Permission of instructor. May be repeated for a maximum of six hours. Fall, spring.
THTR 497 Production Problems (1-3 credits) Offers credit for significant technical projects undertaken. Individual student works with faculty supervision in conjunction with a specific production. Such areas as technical direction, stage management, costume construction, property construction, and dialect coaching may be included. Prerequisite: Permission of instructor. May be repeated for a maximum of six hours. Fall, spring.
THTR 499 Internships in Theatre (3-12 credits) Provides advanced students with the opportunity to work or study in a commercial
or regional theatre or with a professional training program while earning college credit. Program developed in conjunction with faculty. Prerequisites: Junior or senior standing; completion of core requirements in field of study; minimum GPA of 3.0; permission of department chair. Fall, spring, summer.

## Writing (WRTG)

Writing courses are taught by the faculty of the Department of Creative Writing.
WRTG 204 Copy Editing (3) Introduces the profession of writing and publishing, focusing on craft fundamentals (grammar and mechanics), publishing and copy editing, resources for writers, literary analysis, and submission procedures.
WRTG 205 Introduction to Creative Writing (3) Introduces basic experience and techniques of description, characterization, poetry, and narration.
WRTG 206 Introduction to Poetry Writing (3) Teaches basic forms and structures of poetry. Concentrates on techniques as well as content. Prerequisite: WRTG 205 or permission of instructor.
WRTG 207 Introduction to Short Story Writing (3) Teaches elements of short story writing. Concentrates on plot construction with attention to character, dialogue, and setting. Prerequisite: WRTG 205 or permission of instructor.
WRTG 211 Introduction to Creative Nonfiction (3) Teaches elements of the personal essay and memoir. Concentrates on voice, structure, language, and forms. Prerequisite: WRTG 205 or permission of instructor.
WRTG 306 Short Story Writing (3) Teaches techniques for creating characters and turning experiences into short stories. Prerequisite: WRTG 207 or permission of instructor.
WRTG 307 Poetry Writing (3) Teaches techniques of great poets. Provides opportunity for students to write poems. Prerequisite: WRTG 206 or permission of instructor.
WRTG 309 Genre Fiction (3) Teaches tropes and techniques of selected genre fiction such as science fiction, fantasy, mystery, and horror. Provides opportunity for students to write short genre fiction.
WRTG 310 Editing and Publishing (1) Introduces students to the publication processes involved in producing a literary journal from start to finish.
WRTG 311 Creative Nonfiction Writing (3) Teaches advanced techniques of creative nonfiction. Provides opportunity for students to work on rhetorically complex and experimental CNF projects. Prerequisite: WRTG 211 or permission of instructor.
WRTG 330 Special Topics in Writing (3) Topics vary and may include young-adult fiction, writing, advanced copy editing, literary translation, technical writing, form and theory of poetry, form and theory of fiction.
WRTG 390 Screenwriting (3) Teaches the techniques of screenwriting. Allows students to initiate their own screenplays. Prerequisite: WRTG 207 or permission of instructor.
WRTG 480 Senior Seminar in Creative Writing (3) Permits students to pursue an extended, independent writing project alongside close study of an element of craft or genre. To be taken senior year. Spring.
WRTG 490 Writing Workshop (3) Opportunity to write short stories, poems, essays, and plays with weekly discussion and criticism in a small group. May be taken three times. Prerequisite: One course in creative writing at the 300 level or permission of
instructor.
WRTG 494 Writing Internship (1-6 credits) Opportunity for on-site experience in various settings for writing experience.
WRTG 495 Creative Writing: Independent Study (1-9 credits) Opportunity for independent work on writing projects with criticism and assistance. May be taken three times.

## Graduate Programs

The University of Evansville offers the following graduate programs: Master of Public Health (MPH), Master of Science in Athletic Training (MSAT), Master of Science (MS) in Leadership, Master of Science in Athletic Training (MSAT), Master of Science in Health Services Administration (MSHSA), Master of Physician Assistant Science (MPAS) Master of Science (MS) in Innovative Leadership in Heritage Management and Doctor of Physical Therapy (DPT).

Some of the graduate programs are located at the Stone Family Center for Health Science. 515 Bob Jones Way Evansville, IN 47708

## Admission

Applicants must have a bachelor's degree from a regionally accredited institution. Please refer to each graduate program for specific admission requirements. An application for admission must be filed before course registration is approved.

## Special Student

Students holding baccalaureate or advanced degrees from regionally accredited institutions of higher education who do not intend to complete a program of study but who wish to take a graduate course for personal or professional enrichment must complete a special student application and receive special permission from the appropriate program director. A special student may earn no more than nine hours of graduate course credit. A special student application must be filed before course registration is approved.

## International Students

The University of Evansville welcomes international students to its campus. International graduate students should submit an international student application, official transcripts of high school university degrees and diplomas, official English proficiency exams (IELTS or TOEFL), GRE/GMAT exams (where required), and proof of financial support. For English proficiency requirements or other international admission requirements by program, please contact: Office of International Admission, University of Evansville, 1800 Lincoln Avenue, Evansville, Indiana 47722 USA, 812-4881392, international@evansville.edu or evansville.edu.

All students whose native language is not English must take the Michigan Test of English Language Proficiency in addition to the University's writing skills test as a part of registration for their first term. Placement in appropriate English language credit courses will be made to provide students with the skills necessary to demonstrate English proficiency.

## Graduate Academic Policies

## Degree Requirements

To graduate with a master's degree, a student must meet the following requirements:
-Complete all program requirements, including credit requirements.
-Achieve a minimum cumulative grade point average of 3.00 . -Complete a minimum of $80 \%$ of credit requirements at the University of Evansville.

The program director and the dean must approve any exceptions to these requirements.

To graduate with a doctoral degree, a student must meet the following requirements:
-Complete all program requirements, including credit requirements.
-Achieve a minimum cumulative grade point average of 3.00. -Complete a minimum of $80 \%$ of credit requirements at the University of Evansville.

The program director and the dean must approve any exceptions to these requirements.

Culminating Experiences in Graduate Education All graduate degree programs require the completion of a substantial culminating experience. These experiences may include a traditional thesis or dissertation, a major faculty-supervised research project, a semester or year-long professional experience, or a capstone course.

Thesis
Some master's degree programs require a thesis or offer a thesis option. The description, requirements, and guidelines for thesis work are available from the Program Director.

Dissertation/Capstone Projects
Doctoral degree programs may require a dissertation and/or capstone project. The description, requirements, and guidelines for these projects are available from the Program Director.

Electronic Thesis and Dissertation (ETD) Policy All theses and dissertations must be submitted electronically for deposit in the University's ETD archive. Dissertations must be submitted to ProQuest/UMI for inclusion in Dissertation Abstracts. Graduate degrees culminating in a thesis or dissertation are completed after the acceptance of the ETD and the completion of all other requirements for the degree.

## Academic Advising

Every graduate student will have an academic advisor to provide advice on planning an effective plan of study. Program directors will assign academic advisors to students. Students have a responsibility to meet regularly with their academic advisors.

## Graduate Program Handbooks

Some graduate degree programs have program-specific handbooks, and some of the policies in them supersede this catalog's policies. Students are responsible for knowing the policies and procedures outlined in their program handbook. Contact the Program Director to receive a copy or with any questions about the handbook.

## Independent Study and Contract Courses

Independent Study
Independent study courses allow students to work independently under the guidance of a faculty member on topics not already addressed in the program's curriculum. Students must complete a form available through the Academic Services Office, and approval must be given by the faculty member offering the course, the department chairperson, and the school's dean in

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which the course is offered. Independent studies are graded on the A-F system. A graduate student may take up to nine credit hours in independent study and contract courses combined; no more than six hours may be taken during any semester.

## Contract Course Option

Contract courses allow students to work with a faculty member to complete a course already in the Course Catalog. Students must complete a form available through the Academic Services Office, and approval must be given by the faculty member offering the course, the department chairperson, and the school's dean. A graduate student may take up to nine credit hours in independent study and contract courses combined; no more than six hours may be taken during any semester.

## Portfolio

Up to six graduate credits may be gained in this category. We recognize the value of life and work achievement by awarding academic credit for knowledge gained through experience. A detailed explanation and documentation of the learning acquired outside the academic classroom are presented in portfolio format for evaluation by faculty. Successful completion of the Portfolio results in a "Pass" grade. A fee of one credit hour of tuition is charged for each course equivalent after a portfolio has been evaluated. A non-refundable $\$ 70.00$ fee is charged at the point of portfolio application.

## Transfer of Credit

We reserve the right to accept or reject any credits earned at other institutions. No more than 9 credits may be accepted for application toward a graduate degree. The residency requirement of the individual graduate program must be satisfied regardless of the number of credits transferred.

Any accepted credit must represent work applicable to the current curriculum of the appropriate graduate program, have a grade of B- or better, and be from a regionally accredited institution. The graduate program director and the Registrar make transcript credit evaluations. Consult the director of the specific program for more information on transfer credit.

Students must provide official transcripts sent directly from the other institution(s) to be reviewed for transfer of credit eligibility. Transfer work becomes a part of the official record after a student has been fully accepted and enrolled in the university. Transcripts and other documents submitted from other institutions and agencies are the property of and will not be reissued to applicants, students, alumni, or other parties.

The official transcript records credits and grades; transfer grades do not affect the student's grade point average. Once a student has matriculated, they may not take a course at another institution and transfer it back to repeat a course previously taken (transfer credits do not include GPA; therefore, the original grade earned cannot be replaced).

## Visiting Students

Graduate students who wish to take graduate courses at another accredited institution must obtain written permission from the
director of their graduate program. A graduate student is limited to six total credits as a visiting student. Credits earned as a visiting student are considered transfer credits (see policy above).

## Academic Petition Policy

Students seeking an exception to an academic policy or degree requirement must petition the appropriate graduate program director. Students are advised to meet informally with their program director and then submit a written request to the program director if formal action is warranted.

If the program director disapproves the petition, the student can appeal to the Graduate Curriculum and Admissions and Standards Committee within two weeks of receiving written disapproval.

When appealing to the Graduate Curriculum and Admissions and Standards Committee, the student must send a copy of the appeal to the program director. The student and the program director will be requested to appear before the committee. In exceptional circumstances, the committee may allow other parties to attend the hearing to provide additional information.

The committee chair will notify all parties of the decision. It is the student's responsibility to retain all dated correspondence until the final decision is reached.

Accelerated Master's Degree Programs (early-entry graduate programs)

The University offers a variety of accelerated programs that pair undergraduate students with graduate programs. Contact the Office of Graduate Admissions for a full list and program details.

## Second Master's Degrees

Students pursuing a second (or multiple) master's degree may be permitted to apply up to twelve (12) of the minimum required credit hours from a previously completed or concurrently enrolled master's degree program with the approval of the program director. The remaining coursework for the second degree must be completed at the University of Evansville.

Additionally, the culminating experiences (thesis, research project, clinical, or internship) for the degrees cannot be shared. Please note, University approved a separate policy governing joint or dual degree programs.

## Joint Degree Programs

Joint or dual degree programs are defined as University approved degree programs that culminate in the simultaneous awarding of two graduate degrees housed in different academic departments, schools, or colleges. Students must be admitted to a formal joint degree program within one semester of initial enrollment in graduate study and apply for admission to both academic programs. In contrast to a second master's degree program, joint master's degree programs may share a common culminating experience; but cannot share more than twelve (12) credit hours of common coursework. Dual degree programs that award a doctoral and master's degree must meet the minimum
requirements for a doctoral degree and ordinarily will not share more than fifteen (15) credit hours.

## Grading Policies

## Grading System

The University of Evansville uses a 4.00 scale. The Grade Point Average (GPA) is a calculated by dividing the sum of quality points by the sum of quality hours shown on the transcript. Quality points are assigned to letter grades as follows:
A $\quad 4.00$ quality points per quality hour
A- $\quad 3.67$ quality points per quality hour
B+ $\quad 3.33$ quality points per quality hour
B $\quad 3.00$ quality points per quality hour
B- $\quad 2.67$ quality points per quality hour
C $\quad 2.00$ quality points per quality hour
F $\quad 0.00$ quality points per quality hour
FX $\quad 0.00$ quality points per quality hour Student stopped
attending class without official withdrawal
P Pass Pass, hours earned only
I 0.00 quality points per quality hour Incomplete $\mathrm{AU} \quad 0.00$ quality points per quality hour Audit

## Incomplete Grades

See the Undergraduate Academic Policies section of this catalog for the Incomplete Grade Policy.

## Repeat Policy

A student is permitted to repeat a course with a grade of C or F earned. In deciding to exercise the repeat option, the student agrees to accept for the record the grade earned for the course as repeated. The earlier grade and quality points will remain on the transcript for the term it was received but will not be used in computing the student's cumulative grade point average and cumulative earned hours. The student will receive the grade and quality points of the repeat, which will determine the grade point average and the number of hours earned.

No more than two graduate courses may be repeated unless otherwise stated in the student's degree program handbook. Students must consult with their program director before repeating any course.

## Grade Change Policy (for faculty)

See the Undergraduate Academic Policies section of this catalog for the Grade Change Policy.

## Grade Appeal Policy

Any student who questions a course grade should speak to the instructor. If the instructor is unwilling to change the grade and the student is not satisfied with the reasons given, the student may commence a formal appeal.
Any student wishing to contest a course grade formally must do so in writing within 60 calendar days after the last day of the semester. Correspondence should be addressed to the instructor
with a copy to the immediate supervisor. A grade change will
occur if the instructor and his or her immediate supervisor approve and sign a change of grade form, which is forwarded to the Academic Services.

If the instructor or the immediate supervisor disapproves of the grade change, the student can appeal to the Graduate Curriculum and Admissions and Standards Committee within two weeks of receiving written disapproval. Any appeal to the Graduate Curriculum and Admissions and Standards Committee must be filed during the semester (exclusive of summer terms) immediately following that in which the disputed grade was received.

When appealing to the Graduate Curriculum and Admissions and Standards Committee, the student must send a copy of the appeal to the instructor and immediate supervisor. The student, the instructor, and the immediate supervisor will be requested to appear before the committee. In exceptional circumstances, the committee may allow other parties to attend the hearing to provide additional information.

The committee chair will notify all parties of the decision. It is the student's responsibility to retain all dated correspondence until the final decision is reached.
Full-time/Part-time Classification
Full-time student status is a graduate student registered for nine or more semester credit hours in a term (fall, spring, or summer), exclusive of audit courses. Students are eligible for financial aid as full-time students if enrolled in a minimum of 6 hours. Degree-seeking students enrolled in less than 6 hours but no less than three hours are also eligible for financial aid. As such, degree-seeking graduate students pursuing a full course of study in evening or weekend cohort programs based on standard academic plans are eligible for full-time financial aid if enrolled in at least 6 hours per term.
Academic Status
A student's academic status is determined by the grade point average (GPA) achieved, both on a semester and cumulative basis. GPA is calculated by dividing the sum of quality points by the sum of quality hours. To be eligible for graduation, a student must have a cumulative GPA of 3.00 or higher. Good Standing

The status of good standing indicates that a student has a cumulative Grade Point Average of 3.00 or better and is making satisfactory progress toward a degree. Refer to the Undergraduate Student Handbook regarding non-academic good standing.

## Academic Probation and Dismissal Based on GPA

Graduate students whose cumulative grade point average (GPA) falls below 3.00 are placed on academic probation. The probation and dismissal process, including summer, occurs at the end of every semester.

Students placed on probation have one semester (the next semester of enrollment in the program) to raise their cumulative GPA to 3.00 . If, after a semester of probation, the student's GPA does not warrant removal from probation, a determination will be made by the program director or applicable committee to either continue the student on probation or academically

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dismiss the student. Dismissal appeals must be made to the academic dean, whose decision is final.

Graduate students whose semester GPA falls below 3.00 (but whose cumulative GPA does not fall below 3.00 ) are considered at risk. Although at-risk students are not on probation, they should work closely with their advisor or program director to determine improvement strategies.

Probationary and at-risk status are not noted on the official academic transcript. Academic dismissal is recorded on the official academic transcript.

## Readmission after GPA Dismissal

A student dismissed for GPA may apply for readmission to the program; specific policies, procedures, and opportunities for reapplication vary among graduate programs, and program readmission is not assured. The student considering re-application should consult the graduate program director for specific program policy. The student will be readmitted to academic probation if the application is approved. The student will work with the program director to set up a plan to be removed from academic probation. All appeals of readmission denial must be made to the academic dean, whose decision is final.

## Registration Procedures

See the Undergraduate Academic Policies section of this catalog for Registration Procedures.

## Academic Honor Code

See the Undergraduate Academic Policies section of this catalog for the Academic Honor Code.

## Academic Grievance Policy

The University of Evansville embraces a culture that encourages students to seek informal resolutions to issues or concerns by directly contacting the faculty member or administrator with the authority to respond. The University recognizes, however, that not all concerns can be handled effectively or efficiently by one individual. Therefore, it provides formal processes by which students may pursue a more formal resolution to their concerns. Students seeking counsel about such processes may contact the student ombudsman or the Office of the Dean of Students.

Students wishing to file a formal grievance regarding an academic matter should submit a written and signed statement, as well as the resolution sought, to the vice president for academic affairs, except where other procedures specific to the concern are in place (e.g., grade appeals).
Class Attendance
Each graduate student is expected to attend all classes for which they are enrolled. No student may attend a course for which they are not officially registered. Non-attendance in a course does not result in an automatic drop. See the semester class schedule for procedures and add/drop/withdraw deadlines.

The instructor determines each course's attendance policy stated in the course syllabus. It is the student's responsibility to know the policy on attendance for each course in which they are enrolled. A detailed statement regarding attendance and punctuality may be found in the program handbook for programs with handbooks.
Credit Hour and Academic Calendar Policy
See the Undergraduate Academic Policies section of this catalog for the Credit Hour and Academic Calendar Policy.
Cancellation of Classes
See the Undergraduate Academic Policies section of this catalog for the Cancellation of Classes Policy.
Withdrawal Policies
See this catalog's Undergraduate Academic Policies section for the Withdrawal Policies.
Access to Education Records
See this catalog's Undergraduate Academic Policies section for the Access to Education Record policy.
Transcripts of Academic Record
See the catalog's Undergraduate Academic Policies section for the Transcripts of Academic Record policy.
Graduation Information
Applying for Graduation \& Degree Evaluation
All students must formally apply for graduation by submitting a Graduation Application through the Graduation Overview tab in Self Service according to this timeline:

- Graduate level students: one semester in advance of the intended graduation date

Applying for graduation is the first step in the process to be eligible for graduation. The student is responsible for being aware of the application process and deadlines. The University does not assume to know the student's intended graduation date and will not automatically complete a student's degree without a Graduation Application form on file.

Submitting a Graduation Application form places the student into graduation candidacy status. Shortly thereafter, the Registrar reviews the academic transcript, and the student is notified via email with instructions on how to review their degree evaluation online.A Graduation Application is a separate form and must be submitted regardless of a student's intention to participate in commencement.

## Participation in the Commencement Ceremony

The graduation ceremony is held in May. They include graduates who have completed their degree requirements in the Fall and Spring or will complete them in the Summer of the academic calendar year. Intent to participate in commencement can be indicated in the Graduation Application.

Master of Science in Innovative Leadership in Heritage Management

> Master of Science with a Major in Innovative Leadership in Heritage Management

Text

Certificate in Advanced Heritage Practice (12 hours)
Complete the following courses: ILHM-515, ILHM-520, ILHM-525 ARCH-395, ILHM-524, ILHM-526.

Certificate in Advanced Leadership (12 hours)
Complete the following courses: LDR-530, LDR-512, LRD-508, ILHM-530, ILHM-532, ILHM534.

Certificate in Advanced Business Management (12 hours)
Complete the following courses: MKT-574, MKT-585, MGT-569, ILHM-536, ILHM-538, ILHM-
531.

Certificate in Advanced Environmental Systems Management (12 hours)
Complete the following courses: ILHM-512, ILHM-536, ILHM-533, ILHM-535, ILHM-537 PHIL316.

Masters of Science
Master of Science in Innovative Leadership in Heritage Management
2023-2024| 36 Hours Required
Major Requirements (36 hrs)
Innovative Leadership Core
ILHM 505 Journey to Sustainability
ILHM 510 Heritage \& Community Changemaking
LDR 505: Leadership Theory
LDR 542: Change \& Innovation in Non-Profit Organizations
ILHM 651
ILHM 652
ILHM 653

Complete One Course from Each Category Below:
Heritage
ILHM 515: Cultural Heritage Laws, Policy, \& Practice
ILHM 520: Cultural Tourism, Education \& Interpretation
ILHM 525: Heritage \& Equality, Diversity \& Inclusivity
Leadership
LDR 530: Cultural Competency \& Leadership
LDR 512: Organizational Behavior
LDR 508: Communicatio Across Organization
Business
MKT 574: Integrated Marketing Communications
MKT 585: Digital Marketing
MGT 569: Entrepreneurship
Environmnet
ILHM 512: Environmental Policy Analysis
ILHM 540: Intro to GIS \& Environmental Impact Assesssment ILHM 506: Environmental Ethics and Justice

Complete two additional courses from those listed above.

## Center for the Advancement of Learning <br> Master of Science in Leadership

The two-year online program will assist working professionals in their acquisition of the skillsets and mindsets necessary to lead in a variety of settings. Through a rich curriculum and set of program experiences, students will learn ways to provide innovative thinking and visionary leadership to take their organizations to the next level. Graduates of the program will emerge with the knowledge and confidence to thrive in today's dynamic environments and be prepared for tomorrow's opportunities and challenges.

The Master of Science in Leadership Degree is a 36 -credit-hour program that integrates a core leadership curriculum with concentration areas focusing on higher education, nonprofit leadership, innovation, health services administration and public health.

The public health concentration will educate and train students to apply the leadership knowledge and skills acquired in the core of the program to the challenges facing public health and health care providers in the local community and society at large.

The non-profit concentration will give students the necessary skills to grow in leadership and management positions. From learning about management styles, new media platforms, fundraising techniques, and innovation strategies, students will be uniquely prepared for the complex challenges and opportunities facing non-profit organizations and the communities where they are located.

The higher education concentration will build upon the knowledge obtained in the core of the program to the issues and trends facing those in various roles in higher education. This will prepare those in administrative and leadership roles with the foundation necessary for professional growth in the educational setting.

The innovation concentration will give individuals valuable information on using creativity, design thinking, problem-solving, and facilitation of change management in a hands-on environment. Leaders will learn how to leverage the innovative capacities of employees to generate growth, seize opportunities, drive efficiencies, and position their organizations for future growth.

The health services administration concentration will build on the leadership core curriculum by studying key areas of health care management and is designed for individuals who want to assume health care leadership positions in public or private health service organziations

Admission to the Program Requires the Following:

- Official transcript verifying receipt of a bachelor's degree from an accredited university
- Completed application
- Resume detailing three years of professional or internship experience
- Undergraduate cumulative GPA of 2.5 or essay
- Two letters of reference


## Change Leadership Graduate Certificate ( 15 hours)

Complete the following courses: LDR 525, LDR 560, and LDR 561. Complete two from the following: LDR 562, LDR 542, LDR 512, LDR 543.

Innovation Graduate Certificate (9 hours)
Complete the following courses: LDR 560, LDR 561, and LDR 562.
Non-Profit Leadership Graduate Certificate (9 hours)
Complete the following courses: LDR 540, LDR 541, and LDR 542.
Higher Education Leadership Graduate Certificate (9 hours)
Complete the following courses: LDR 550, LDR 552, and LDR 554.
Leadership Essentials Graduate Certificate (9 hours)
Complete the following courses: LDR 505, LDR 514, and LDR 528.
Advanced Leadership Essentials Graduate Certificate (9 hours)
Complete the following courses: LDR 590, LDR 530, and LDR 543.

## Masters of Science

## Master of Science in Leadership

2023-2024 | 36 Hours Required<br>Major Requirements (36 hrs)<br>Leadership Core<br>LDR 505: Leadership Theory<br>LDR 508: Communicating across Organizations<br>LDR 514-Project Managemen<br>LDR 590: Decision Making<br>LDR 543: Strategic Planning and Implementation<br>LDR 528: Financial Decision Making<br>LDR 525: Design Thinking for Organizational Change<br>LDR 530: Cultural Competence and Leadership<br>LDR 599: Capstone<br>Complete One Concentration:<br>Higher Education<br>LDR 552: Policy and Historical Trends in Higher Education<br>LDR 550: Critical Issues in Higher Education<br>LDR 554: Legal Aspects of Higher Education<br>Non-Profit<br>LDR 540: Non-Profit Fundraising and Practice<br>LDR 541: Managing Non-Profit Organizations<br>LDR 542: Change \& Innovation in Non-Profit Organizations<br>Innovation<br>LDR 560: Empathy and Prototyping<br>LDR 561: Leading Creative Problem Solving<br>LDR 562: Transforming Organizations to an Innovation Culture<br>Public Health<br>PH 543: Population-based Health<br>PH 542: Health Systems and Policy<br>PH 580: Programs, Problems and Policies in Public Health<br>Health Services Administration<br>(Choose three from the following courses)<br>HSA 512: Health Services Organziational Behavior<br>HSA 516: Health Care Information Systems<br>HSA 528: Financial Management of Health Care Organizations<br>HSA 532: Managed Health Care

# College of Education and Health Sciences <br> Doctor of Nurse Anesthesia Practice <br> Program Director: Dr. Melissa Fitch, DNP, CNRA Assistant Director: Dr. Meghan Buchta, DNP, CRNA 

Nurse Anesthesia (CRNAs) are advanced practice registered nurses with graduate level education who enjoy a high degree of autonomy and professional respect. CRNAs provide anesthetics to patients in every practice setting, and for every type of surgery or procedure. CRNAs safely administer more than 50 million anesthetics to patients each year in the United States. As advanced practice registered nurses, CRNAs are among the nation's most trusted professions according to Gallup. For more information about the profession, visit www.aana.com.

The Nurse Anesthesia Program is accredited by the Council on Accreditation of Nurse Anesthesia Educational Programs (COA). Following completion of an accredited program, graduates are eligible to take the National Certification Examination (NCE) administered by the National Board of Certification and Recertification for Nurse Anesthetists (NBCRNA). Entry into the Nurse Anesthesia Program is highly competitive, and students will graduate with a Doctor of Nurse Anesthesia Practice (DNAP) degree after 3 years of full-time, yearround study. Entry into the program is based on scores from both an application and an interview process. Application calendar, prerequisites, application, and acceptance requirements are available on the Nurse Anesthesia Program's website: https://www. evansville.edu/majors/nurse-anesthesia-program/

The Nurse Anesthesia Program reserves the right to make final decisions regarding all admission criteria. Upon entry into the Nurse Anesthesia Program, students will be responsible for following programmatic guidelines and policies as outlined in the Nurse Anesthesia Program Student Handbook which can be found on the program's website.
https://www.evansville.edu/majors/nurse-anesthesia-program/downloads/Nurse-Anesthe-sia-Student-Handbook.pdf
In addition to all of the CRNA courses listed, students will take several cross-listed courses with the Physician Assistant Science, Public Health, and Health Services Administration programs, including: PA612, PA511, PA520, PH501, PH542, HSA567, HSA507, HSA512, HSA516, and HSA528.

## Doctor of

## Nurse Anesthesia Practice

2023-2024|110 Hours Required
Major Requirements
CRNA 500: Professional Role Development (3 hrs)
CRNA 502 Health Care Policy and Law in Nurse Anesthesia (3 hrs)
CRNA 510: Pathophysiology (4 hrs)
CRNA 511 Pathophysiology II (3 hrs)
CRNA 513: Basic Principles of Nurse Anesthesia I (4 hrs)
CRNA 514: Basic Principles of Nurse Anesthesia II (4 hrs)
CRNA 542: Health Systems and Policies (3 hrs)
CRNA 565 Pre-clinical Practicum I(1 hr)
CRNA 560:Introduction to Clinical Anesthesia (3 hs)
CRNA 570 Pre-clinical Practicum II (1 hr)
CRNA 613: Advanced Principles of Nurse Anesthesia I (3 hrs)
CRNA 614: Advanced Principles of Nurse Anesthesia II (3 hrs)
CRNA 615 Advanced Principles of Nurse Anesthesia III (3hrs)
CRNA 620: Advanced Pharmacology (4 hrs)
CRNA 632 Advanced Health Assessment (3 hrs)
CRNA 640: Project/Practicum (1 hr)
CRNA 641: Project/Practicum (1 hr)
CRNA 642: Project/Practicum (1 hr)
CRNA 655 Introduction to Clinical Practicum (4 hrs)
CRNA 660: Nurse Anesthesia Clinical Practicum I (8 hrs)
CRNA 665: Nurse Anesthesia Clinical Practicum II (8 hrs)
CRNA 670: Nurse Anesthesia Clinical Practicum III (8 hrs)
CRNA 740: Project/Practicum (1 hr)
CRNA 741: Project/Practicum (1 hr)
CRNA 765: Nurse Anesthesia Clinical Practicum IV (8 hrs)
CRNA 770: Nurse Anesthesia Clinical Practicum V (8 hrs)
CRNA 780: Nurse Anesthesia Seminar I (2 hrs)
CRNA 781: Nurse Anesthesia Seminar II (2 hrs)
CRNA 782: Nurse Anesthesia Seminar III (1 hr)
HSA 507 Healthcare Research and Design (3 hrs)
PA 512: Anatomy (5 hrs)
PA 520: Pharmacology I (4 hrs)
DNP 567 Statistics for Appraisal and Evaluation for Nursing Professionals( 3hrs)

Faculty: Huebner (Chair), Lockwich, Liang, Matsel, Pitt, Plisky, Schwartzkopf-Phifer, Whetstone, Nolen, Marchino
The University of Evansville offers a professional entry-level Doctor of Physical Therapy (DPT) degree, which is accredited by the Commission on Accreditation in Physical Therapy Education (CAPTE). The curriculum involves three or four years of prerequisite and undergraduate course work followed by three years (nine semesters including summers) of professional study. The physical therapy faculty has designed a curriculum that reflects contemporary professional education and clinical practice modeling professional excellence. A strong liberal arts and sciences background, a diverse undergraduate experience, and innovative professional classroom and clinical course work define the DPT program at UE. Through classroom and clinical experiences, students acquire the requisite critical thinking and problem solving skills necessary to deliver quality patient care based on current best evidence. Students interested in the Doctor of Physical Therapy program follow normal University admission procedures.

## Fees and Assistance

In addition to regular University costs, certain additional expenses are incurred by physical therapy students. These include uniforms, laboratory fees, summer tuition, and costs associated with clinical courses (travel and housing, criminal background checks, CPR certification, etc.). Students should consult with the Office of Student Financial Services for information about financial assistance. Additional scholarships may be available through health care facilities and professional organizations.

## Course Work and Clinical Facilities

All of the physical therapy didactic course work is taught at the Stone Family Center for Health Sciences. Throughout the physical therapy professional curriculum, students are exposed to integrated clinical activities at local off-campus health care facilities. Students admitted to the Doctor of Physical Therapy program begin professional course work in the summer after their third year ( $3+3$ track) or fourth year ( $4+3$ track). Students on the $3+3$ track complete all remaining undergraduate degree requirements during the fourth year and graduate with a bachelor's degree in May of their senior year. The students' fifth and sixth years are devoted to DPT courses. Students on the $4+3$ track will enroll in professional DPT course work in years 5, 6, and 7. A bachelor's degree must be completed prior to enrolling in Physical Therapy 661, Clinical I.

Students complete full-time clinical courses during the summer sessions of the professional program. Two clinical courses are completed during the spring semester of the final year. Various clinical facilities are utilized in the educational preparation of students. The Department of Physical Therapy affiliates with local, regional, and national health care facilities to provide a diverse range of quality clinical education experiences. While the Evansville community provides a number of clinical opportunities, including initial observational and more advanced direct patient care experiences, students should anticipate the personal and financial impact associated with transportation and accommodation outside the Evansville area for the majority of their full-time clinical course work. International clinical course placements for final-level DPT students may be available.

Prerequisite courses must be successfully completed prior to beginning the professional program. All science courses must be designed for science majors. Other designs will not be accepted.
Prerequisite courses taken by University of Evansville students
Biology 107; Chemistry 118, 240; Exercise and Sport Science 111, 112, 113; Physics 121, 122; Psychology 121; Quantiative Methods 227

Application Calendar, Application Materials, Admission Criteria
Enrollment in the University does not necessarily guarantee enrollment in the DPT program.

Application calendar, application materials, and admission criteria are available on the web at www.evansville.edu/majors/physicaltherapy

Admission criteria are subject to change. The Department of Physical Therapy reserves the right to make final decisions concerning all admission criteria.

## Doctor of Physical Therapy Curriculum

Once accepted into the DPT program, students will be responsible for following programmatic guidelines and progression policies as outlined in the DPT student handbook, which is available at www.evansville.edu/majors/physicaltherapy

## Program Progression

The physical therapy faculty makes decisions regarding a student's progression through the professional program. It is the responsibility of the student to complete each course successfully and to demonstrate appropriate professional behavior in all situations in order to progress through the professional program. Successful completion is defined as the ability to demonstrate competence in course content. Criteria for successful completion of each course are conveyed to the student via the course syllabus. Failure to successfully complete a professional course will result in delayed progression or dismissal from the professional program.

Each course instructor determines the means for achieving competence in the professional course work he or she teaches. These criteria are articulated in the course syllabus that is provided to the student in written or electronic form. Every student is responsible for reviewing these criteria including the methods of evaluation and grading criteria.

Grading Scale and Minimum Passing Grades for
Doctor of Physical Therapy Program
The minimum passing grade for each course in the curriculum is a C .

For the post-baccalaureate semesters 2-9, students may earn no more than 10 semester hours of course work with grades of $\mathrm{C}+$ or lower. If an 11th semester hour with a grade of $\mathrm{C}+$ is earned, progression through the program will be delayed and the student will be placed on an individual program of remediation that will allow repetition of up to 2 courses. If an additional grade of $C+$ (or lower) is earned, the student will be dismissed from the program. All graduate work is counted and none of it may be omitted in computing the overall grade point average.

## Doctor of Physical Therapy

## PHYSICAL THERAPY

2023-2024 | 114 Hours Required
Major Requirements
Year 1
PT 505: Human Physiology (4 hrs)
PT 510: Foundations in PT (2 hrs)
PT 512: Physical Interventions (2 hrs)
PT 514: Foundations of Therapeutic Exercise (2 hrs)
PT 517: Test \& Measurements (2 hrs)
PT 521: Patient Management I Musculoskeletal (8 hrs)
PT 523: Wellness in Physical Therapy (2 hrs)
PT 531: Gross Anatomy (5 hrs)
PT 532: Kinesiology (3 hrs)
PT 533: Human Growth \& Development (3 hrs)
PT 534: Medical Pathology I (2 hrs)
PT 536: Medical Pathology II (2 hrs)
PT 542: Clinical and Professional Issues II: Adult Learner (1 hr)
PT 551: Scientific Inquiry I (2 hrs)
PT 552: Scientific Inquiry II (2 hrs)

Year 2
PT 661: Clinical I (5 hrs)
PT 622: Patient Management II: Cardiovascular \& Pulmonary (3 hrs)
PT 623: Patient Management III: Multiple Systems (4 hrs)
PT 630: Rehabilitation Pharmacology (2 hrs)
PT 631: Neurobiology (3 hrs)
PT 632: Medical Imaging (2 hrs)
PT 641: Ethics (1 hr)
PT 651: Scientific Inquiry III (3 hrs)
PT 626: Patient Management V Neuromuscular (7 hrs)
PT 644: Behavioral Psychology (3 hrs)
PT 643: Leadership \& Administration (3 hrs)

## Year 3

PT 761: Clinical II (5 hrs)
PT 724: Patient Management IV: Pediatrics (3 hrs)
PT 726: Patient Management VI: Integrated Musculoskeletal ( 5 hrs )
PT 727: Community Health (2 hrs)
PT 728: Advanced Screening and Diff Diagnosis (3 hrs)
PT 730: Management of the Patient with Complex Diagnoses (3 hrs)
PT 742: Clinical \& Professional Issues III: Transition to Practice (2 hrs)
PT 751: Scientific Inquiry IV (2 hrs)
PT 762: Clinical III (5 hrs)
PT 763: Clinical IV (5 hrs)

Program Director: Jeff Tilly
The certified athletic trainer (ATC) is a highly educated and skilled allied health professional. In cooperation with physicians and other allied health personnel, the ATC functions as an integral member of the health care team for the physically active. Traditionally, secondary schools, colleges and universities, sports medicine clinics, orthopedic surgeon offices, industrial settings, and professional sports teams have employed certified athletic trainers.

The Master of Science in Athletic Training major is designed for those individuals who seek certification as an athletic trainer for the Board of Certification (BOC) and have an under- graduate degree with the necessary prerequisites. The Commission on Accreditation of Athletic Training Education (CAATE) is the accrediting body for athletic training education programs. The University of Evansville's MSAT program is competitive, and a set number of students are allowed entry per year.

The master's degree program prepares the athletic training student for challenges that will be encountered as an allied health professional. Clinical experiences include NCAA DI and DII athletics, professional sports, high school athletics, non-athletic populations, and general medical rotations.

## Admission:

Completed bachelor's degree and admission to UE with the following required course equivalents: Human Anatomy and Physiology with Lab (Exercise and Sport Science 112 and 113)

Recommended course equivalents:

- Introduction to Psychology Biomechanics
- Exercise Physiology Nutrition
- Medical Terminology


## Other requirements:

- Grade of C or better in required pre-requisite courses (all prerequisites must have been completed within the last 5 years prior to application).
- Scores for the Graduate Record Examination (GRE) if undergraduate cumulative GPA is below 3.0.
- Official transcripts showing completion of undergraduate degree or official transcripts showing ability to complete undergraduate degree at the University of Evansville prior to enrollment in AT 691 (second year of program).*
- Submission of Master of Science in Athletic Training Program Application.
- Interview (phone or in-person).
- Completed Technical Standards Form.
- Physical examination.
- Proof of immunizations required by UE and Hepatitis-B vaccination.
- Current Emergency Response \& CPR for Professional Rescuer Certification. Background Screen.
- Two letters of recommendation.

Recommended:

- Observational experience documented by a Certified Athletic Trainer.


## Masters of Science

## ATHLETIC TRAINING: SPORTS MEDICINE RESIDENCY OPTION

2023-2024 | 52 Hours Required

## Major Requirements

AT 521: Adv Applied Human Anatomy \& Physiology Lab (2 hrs)
AT 551: Psych Interventions Athletic HC (3 hrs)
AT 575: Advanced Nutrition Issues in Athletic Training (3 hrs)
AT 580: Evidence Based Inquiry (3 hrs)
AT 582: Foundational Skills in Athletic Training (3 hrs)
AT 587: Advanced Therapeutic Modalities (3 hrs)
AT 588: Evaluation of Lower Extremity (3 hrs)
AT 589: Evaluation of Upper Extremity (3 hrs)
AT 590: Clinical Education I (1 hr)
AT 591: Graduate Clinical Education I (2 hrs)
AT 592: Graduate Clinical Education II (3 hrs)
AT 650: Administration of Athletic Training (3 hrs)
AT 688: Advanced Rehab of Athletic Injuries (3 hrs)
AT 690: General Medicine and Pharmacology (3 hrs)
AT 691: Graduate Clinical Education III (5 hrs)
AT 692: Graduate Clinical Education IV (3 hrs)
AT 693: Professional Issues in Athletic Training (3 hr)
Complete one course from:
*AT 699: Directed Evidence Based Inquiry (3 hrs)
PH 501: Epidemiology (3 hrs)
PH 515: Health Behavior (3 hrs)
PH 542: Health Systems and Policy (3 hrs)
PH 580: Programs, Problems, \& Policies in Public Health (3 hrs)
*For students with research-intensive projects, AT 699 will be added to the Spring Semester, second year.

## Master of Science in Education

Faculty:

## Master of Science in Education

Become the school leader you have always strived to be with the University of Evansville's Master of Science in Education degree. Throughout the course of the program, students will discover how to best implement a nurturing classroom environment that fosters learning and inspires creativity.

100 percent online
12-month, 30 -credit hour program beginning each May
Accelerated five-week courses
No application fee or required GRE scores
Students learn best through immersion and hands-on learning, so each course in the program incorporates a specific amount of hours for observation or internships. During the final semester, students will complete a five-week internship with a minimum of 50 hours. The program will conclude with a Research and Inquiry course for students to demonstrate what they have learned throughout the year.

## Masters of Science

## Master of Science in Education

2023-2024 | 39 Hours Required
EDUC 510 Advanced Education Perspectives and Foundations
EDUC 515 Curriculum \& Instruction: Science of Reading \& Learning Foundations
EDUC 518 Personnel Administration in Educational Institutions
EDUC 524 Advanced Study Curriculum/Standards/Data-Driven
EDUC 519 Principal Internship I
EDUC 590 Decision Making
EDUC 525 Collaboration and Leadership in a Global Society
EDUC 531 School Law
EDUC 532 The School Principal - Leadership
EDUC 533 Principal Internship II
EDUC 540 Research and Inquiry

Program Director: Bill Stroube
The University of Evansville's Master of Science in Health Services Administration (MSHSA) is designed for those who want to assume management positions in public and private health service organizations. The multidisciplinary approach to the program is enhanced by adjunct faculty from the business community and health care organizations in addition to University of Evansville full-time faculty.

The student's area of undergraduate study, past work experience, and future career goals provide direction for the selection of elective courses and learning activities. Health agency field experience, supervised by faculty and agency preceptors, may be required or encouraged based upon learning needs and past experiences. A health services administration graduate-level study abroad experience is offered most summers at Harlaxton College in England or at other sites.

The health services administration graduate program is designed to suit the schedules of both students who hold full-time jobs and wish to further their education on a part-time basis and students interested in full-time study.

## Application Requirement

- Bachelor's degree from a regionally accredited college or university; a degree in health-related profession or business is preferred but other undergraduate degrees will be considered
- Scores for the Graduate Record Examination (GRE) or the Graduate Management Admission Test (GMAT)
- Two references from the applicant's work environment or undergraduate faculty
- A personal interview with the health services administration program director
- Requirements (114 hours)

Health Service Administration Gradaute Certificate (9 hours)
Complete three of the following courses: HSA 506, HSA 512, HSA 516, HSA 528, HSA 532

## Masters of Science

## Master of Science in Health Services Administration

2023-2024 | 39 Hours Required
Major Requirements (39 hrs)
HSA 505: Health Care Systems: Issues and Trends (3 hrs)
HSA 506: Jurisprudence and Ethics in Health Care (3 hrs)
HSA 507: Health Care Research/Design (3 hrs)
HSA 512: Health Service Org. Behavior (3 hrs)
HSA 514: Health Care Mngt Theory \& Human Resources (3 hrs)
HSA 516: Health Care Information Systems (3 hrs)
HSA 520: Health Care Planning and Marketing (3 hrs)
HSA 524: Health Problems in Health Care (3 hrs)
HSA 528: Financial Management of Health Care Organizations (3 hrs)
HSA 529: Health Services Field Experience (3-6 hrs)
HSA 532: Managed Health Care (3 hrs)
HSA 567: Statistics Appraisal/Evaluation (3 hrs)
HSA 590: Decision Making in Health Care (3 hrs)
*Exact course requirements may vary depending upon the individual's background.

# College of Education and Health Sciences <br> Master of Physician Assistant Science <br> Program Director: Andy Lampkins 

Physician Assistants (PA) are nationally certified and state-licensed health care professionals who provide direct patient care and work as part of a physician-led team in delivering a broad range of diagnostic, therapeutic, preventive, and health maintenance services. They work in diverse medical and surgical specialties including family and internal medicine, emergency care, pediatrics, obstetrics and gynecology, general surgery and sub-surgical specialties, and mental and behavioral health care. PAs work in a wide variety of settings including hospitals, clinics, physicians' offices, and other health care facilities. For more information about the profession, visit www.aapa.org.

Entry into the PA Program is based on both quantitative and qualitative variables. There are two admission pathways into the PA Program. Students on both pathways must meet the same minimum entrance requirements. Students on the B/PA pathway (Pathway 1) must meet additional requirements throughout their undergraduate experience at UE to maintain their status.

Application calendar and prerequisite, application and acceptance requirements are available on the PA program's website: https://www.evansville.edu/majors/physicianassistant/admission.cfm

Admission criteria are subject to change. The PA program reserves the right to make final decisions regarding all admission criteria.

Upon entry into the PA program, students will be responsible for following programmatic guidelines and progression policies as outlined in the PA Student Handbook, which is available on the PA website https://www.evansville.edu/majors/physicianassistant/handbook.cfm

## Masters of Science

## Master of Physician Assistant Science

2023-2024 | 113 Hours Required
Major Requirements
PA 511: Human Physiology (4 hrs)
PA 512 Anatomy (5 hrs)
PA 520: Pharmacology (4 hrs)
PA 530: Diagnostic Tests (3 hrs)
PA 531: Medical Imaging (1 hrs)
PA 532: 12-lead EKG (1 hr)
PA 540: The PA Profession (3 hrs)
PA 541: Medical Ethics (1 hr)
PA 544: Cultural Competence and IPE (2 hrs)
PA 545: Introduction to Clinical Practice (2 hr)
PA 610: Medical Literature and EBM (3 hrs)
PA 621: Behavioral Health (3 hrs)
PA 622: Clinical Medicine I (4 hrs)
PA 623: Therapeutics I (4 hrs)
PA 624: Clinical Medicine II (5 hrs)
PA 625: Therapeutics II (3 hrs)
PA 626: Clinical Medicine III (5 hrs)
PA 632: History and Physical Exam I (3 hrs)
PA 633: History and Physical Exam II (3 hrs)
PA 634: Clinical Skills (5 hr)
PA 645: Inter Comm \& Case-Based Learn (2 hr)
PA 700: Formative Experience (3 hrs)
PA 701: Supervised Clinical Pracitce Exerience 1 ( 4 hrs )
PA 702: Supervised Clinical Pracitce Exerience 2 ( 4 hrs )
PA 703: Supervised Clinical Pracitce Exerience 3 ( 4 hrs )
PA 704: Supervised Clinical Pracitce Exerience 4 ( 4 hrs ) PA 705: Supervised Clinical Pracitce Exerience 5 (4 hrs)
PA 706: Supervised Clinical Pracitce Exerience 6 (4 hrs)
PA 707: Supervised Clinical Pracitce Exerience 7 (4 hrs)
PA 708: Supervised Clinical Pracitce Exerience 8 ( 4 hrs )
PA 709: Supervised Clinical Pracitce Exerience 9 (4 hrs)
PA 770: Core Review I (2 hr)
PA 771: Core Review II (2 hr)
PA 772: Core Review III (2 hr)
PA 774: Summative Experience (2 hrs)

## Doctor of Science

Earn your terminal academic doctorate degree in Health Professions Education, a program in Health Profes- that is uniquely designed for working clinicians ready to transition to higher education or cursionals Education解
The PhD in Health Professions Education will be an avenue to help clinicians develop the skills necessary to be effective educators who contribute scholarship to interdisciplinary research adross the healthcare continuum.

## Certificates

Health Professions Education Certificate (10 Hours)
Required (7 hours):
HPE-500: Innovative Curricular Design (3 hours)
HPE-520: Student and Program Assessment (3 hours)
HPE-690-01: Capstone Seminar Teaching(1 hour)
Choose (need 3 hours):
HPE-510: Evidenced-Based Practice in Education (3 hours)
HPE-600: Learning Theories (3 hours)
HPE-610: Online Pedagogy and Course Delivery (3 hours)
HPE-505: Thriving in Higher Education (1 hour)
HPE-525: Core Concepts of IPE (1 hour)
HPE-515: Current Issues in Higher Education (1 hour)
Health Professions Research Certificate (10 Hours)
Required (7 hours):
HPE-550: Research Methods (3 hours)
HPE-570: Quantitative Research (3 hours) or HPE-560: Qualitative Research
HPE-690-02: Capstone Seminar Research (1 hour)
Choose (need 3 hours):
HPE-570: Quantitative Research (3 hours) or HPE-560: Qualitative Research (3 hours)
HPE-650: Advanced Quantitative Research (3 hours)

## Doctor of Science in

## Health Professionals Education

2023-2024 | 44 Hours Required
Major Requirements
HPE-500: Innovative Curricular Design (3 credits)
HPE-505: Thriving in Higher Education (1 credit
HPE-510: Evidenced-Based Practice in Education (3 credits)
HPE-515: Current Issues in Higher Education (1 credit)
HPE-520: Student and Program Assessment (3 credits)
HPE-525: Core Concepts of Interprofessional Education: Education,
Practice, and Research (1 credit)
HPE-600: Learning Theories (3 credits)
HPE-615: Leadership, Ethics, and Organizational Change (1 credit)
HPE-610: Online Pedagogy and Course Delivery (3 credits)
HPE-620: Teaching Practicum (3 credits)
HPE-690-01: Capstone Seminar Teaching (1 credit)
HPE-550: Research Methods (3 credits)
HPE-560: Qualitative Research (3 credits)
HPE-570: Quantitative Research (3 credits)
HPE-650: Advanced Quantitative Research (3 credits)
HPE-655: Academic Writing (1 credit)
HPE-660: Dissertation Proposal (3 credits)
HPE-690-02: Capstone Seminar Research(1 hour)
HPE-700: Mentored Dissertation I (3 credits)
HPE-710: Mentored Dissertation II (3 credits)

Program Director: Payal Patel-Dovlatabadi
The University of Evansville's online Master of Public Health in Health Policy is a great opportunity for those who want further study in public health policy. Students may enroll on either a full-time or part-time basis, with a full-time student taking two years to complete the program. All courses are taught in an online format. Distance learning provides location and day-to-day flexibility in scheduling "class" for students who have work, family, or other responsibilities.

The program provides a unified approach to policy. It is built on the recognition that issues of health policy cannot be divorced from principles of sound management, nor can health care management or policy be developed without a fundamental understanding of morbidity, mortality, and epidemiologic methods. Further, the program recognizes that leaders cannot make successful decisions about the delivery of health care nor solve the health problems affecting society over the next decades without extensive analytic and decision-making skills. Students need to be able to translate sound scientific evidence into effective health policy. The program emphasizes training in quantitative methods, economics, epidemiology, and evaluative methods for policy and management. Social and behavioral sciences are integral parts of many courses throughout the two-year curriculum.

## Application Requirement

- Bachelor's degree from a regionally accredited college or university
- An undergraduate GPA of 3.0 or above
- Three references from the applicant's work environment or undergraduate faculty
- A statement of purpose


## Public Health Graduate Certificate (18 hours)

Complete the following courses: PH 501, PH 509, PH 515, PH 525, PH 543, and PH 580.
The mission of the Public Health graduate certificate is to give students a basic, yet robust understanding of all the aspects of public health. The graduate certificate in Public Health consists of the core curriculum for the Master of Public Health (MPH) degree and is intended for those who:

- areinterestedinlearningmoreabout thefield ofpublichealth without committing toafull graduate degree
- are currently public health professionals and want to be eligible to take the certifying examination in public health
- areinterestedinadegreein publichealthbutarenotsurewhatspecificareofexpertisethey might want to pursue

The certificate program is 18 credits and can be applied to the University's online MPH program should a student decide to pursue the degree program. The Public Health certificate program is completed online to allow students maximum flexibility while maintaining personal and professional commitments.

## Gerontology Graduate Certificate

Complete 9 hours from the following courses: GT 501 Biology, Health, and Personality Dimensions of Aging, GT 503: Later Life and Spirituality, GT 505: Institutional Care and Geriatric Assessment, GT 507: Economics of Aging and Social Policies, SOC 560: Aging and Society, SOC 586: Death, Dying, and Bereavement.

## Master of

Public Health
2023-2024 | 39 Hours Required
Major Requirements
PH 501: Epidemiology (3 hrs)
PH 509: Environmental Health (3 hrs)
PH 515: Health Behavior (3 hrs)
PH 525: Biostatistics (3 hrs)
PH 530: Health Economics (3 hrs)
PH 535: Public Health Law and Ethics (3 hrs)
PH 540: Strategic Management in Health Programs (3 hrs)
PH 542: Health Systems and Policy (3 hrs)
PH 543: Population-based Health (3 hrs)
PH 547: Survey Research Methods (3 hrs)
PH 580: Programs, Problems, and Policies in Public Health (3 hrs)
PH 590: Integrative Experience (3 hrs)
PH 598: Public Health Internship (3 hrs)

## PsyD in Clinical Psychology

The five-year program includes four years of on-campus classes and one year of clinical internship*.

Year One

The first year is focused on didactic training in foundational psychotherapy skills, assessment, psychopathology, diversity, ethics, research methods, and statistics.

Year Two and Three

Students will begin seeing clients in a community-based mental health clinic at UE, serving clients of all ages with many different presenting concerns, such as depression, anxiety, PTSD, substance abuse, school problems, and more.

Year Three and Four
Students will participate in external practicum experiences at a variety of different training facilities. This includes a state hospital, two major hospitals, an inpatient facility, a school system, a private practice, and several outpatient mental healthcare centers.

## Year Five

Students will complete their clinical internship at a placement in the United States or Canada. The program also culminates with a dissertation

## PsyD in

## Clinical Psychology

2023-2024 | 118 Hours Required
Major Requirements
PSYC 521: History \& Systems (3 hrs)
PSYC 629: Social Psychology (3 hrs)
PSYC 645: Statistics (3 hrs)
PSYC 646: Research Methods (3 hrs)
PSYC 688: Affective Neuroscience (3 hrs)
PSYC 696: Research in Clinical Psychology (3 hrs)
PSYC 698: Developmental Cognitive Neuroscience (3 hrs)
PSYC 601: Cognitive Assessment (4 hrs)
PSYC 610: Foundations of Pers and Psychotherapy (3 hrs)
PSYC 623: Personality Assessment (3 hrs)
PSYC 635: Advanced Psychopathology across the Lifespan (4 hrs)
PSYC 648: Ethics and Professional Issues (3 hrs)
PSYC 652: Cognitive Behavior Therapy (3 hrs)
PSYC 675: Culture and Diversity in Clinical Psychology (3 hrs)
PSYC 680: Interpersonal Psychotherapy (3 hrs)
PSYC 685: Advanced Assessment and Treatment (3 hrs)
PSYC 691: Clinical Supervision and Consultation (3 hrs)
PSYC 692a: Seminar: Psychological Sciences I (1 hrs)
PSYC 692b: Seminar: Psychological Sciences II (3 hrs)
PSYC 693: Clinical Practicum (23 hrs)
PSYC 695: External Practicum (5 hrs)
PSYC 665: Advanced Professional Development (2 hrs)
PSYC 699a: Clinical Internship (2 hrs)
PSYC 790: Dissertation (14 hrs)
Complete 15 credits from the following courses:
PSYC 506: Gender, Psychology, and Law (3 hrs)
PSYC 526: Seminar: Child and Adolescent Psychology (3 hrs)
PSYC 528: Psychology of Religion (3 hrs)
PSYC 564: Psycholinguistics (3 hrs)
PSYC 622: Clinical Health Psychology (3 hrs)
PSYC 625: Advanced Lifespan Development (3 hrs)
PSYC 630: Seminar: Severe Mental Illness (3 hrs)
PSYC 694: Neurodevelopmental Disabilities (3 hrs)

## Graduate Course Descriptions

## Athletic Training (AT)

AT 521 Advanced Applied Human Anatomy (2) This course is designedforgraduatestudentswhoneedtostudyhumananatomyin a more detailed format. Emphasis is placed on the gross anatomy of thehumanskeleton, muscular, nervousandcirculatorysystemsusing previouslydissectedcadavers.Studentswillexplore,ingreaterdetail, specific areas related to orthopedic clinical evaluation (ankle, knee, hip, wrist, elbow, shoulder). Additionally, students will complete a teaching componentbasedoninstructorassignmentofabodyarea.
AT 551 Psych Interventions Athletic Health Care (3) This course will provideanoverviewoftherapidlydevelopingfield ofsport psychology. A wide range of topics in sport and exercise psychology will be reviewed,includinganxiety\&performance,overtraining\&staleness, psychometriccharacteristicsofsportparticipants,andotherpsychologicalfactorsthatmayaffectsportperformance.Althoughthemajor interestofAmericansportpsychologyinvolvesapplicationsintended to enhanceathletic performance, this course will also covertopics of exercise and mental health as well.

AT 575 Adv Nutritional Issues Athletic Training (3) In this course, students will gainknowledgeaboutnutritional needs of athletesand nutrition-related issues which may arise in working with athletes. This study of the science of sport nutrition includes normal nutritional needs; needs for weight gain, loss, and maintenance; effect of diet on performance, training, and recovery; disordered eating, energy requirements and exercise metabolism
AT 580 Evidence-Based Inquiry (3) Theory and practice of evi-dence-basedsportsmedicineforbothclinicalandresearchenvironments, with emphasis on understanding the results of health care interventions and practices for patients and research subjects. This course will introduce the student to clinical epidemiology and the evaluation of the efficacy of prevention, diagnostic, and treatment strategies for acute and chronic conditions. Intended for graduate athletic training majors.
AT 582 Foundational Skills in Athletic Training (3) This course addresses a variety of topics in order to develop the student's competence as an athletic trainer. Emphasis is placed upon skills such as construction and application of protective devices, taping and ban-dagingtechniques,on-fieldassessmenttechniques,andemergency care. This course is designed to satisfy CAATE competences related to the above mentioned content areas and is intended for graduate athletic training majors.
AT 587 Advanced Therapeutic Modalities (3) This course addresses the principles, indications, contra-indications, physiologicaleffects, safety procedures and application of therapeutic modalities for the treatment of athletic injuries, with particular emphasis on evi-dence-based practice and integration with modality selection. This courseisdesignedtosatisfyCAATEcompetences relatedtotheabove mentionedcontentareasandisintendedforgraduateathletictraining majors.
AT 588 Evaluation of Lower Extremity (3) This course addresses the principles,techniques, andtheoriesbehindathleticinjuriesandtheir assessmentfromthewaistdown.Thestudentwillbeabletoassessan injury and determine which special tests to use in order to come to aconclusion about what has occurred to the athlete and what needs to be done in a timely manner. Also, a thorough knowledge of bony landmarks, dermatomes, andmyotomes is coveredwhich willaidthe athletictrainingstudentininjuryassessment.Thiscourseisdesigned to satisfy CAATE competences related to the above mentioned content areas and is intended for graduate athletic training majors.

AT 589 Evaluation of Upper Extremity (3) This course addresses the principles, techniques, and theories behind athletic injuries and their assessment from the head to waist. It also presents a thorough coverageofbonylandmarks,dermatomes, andmyotomeswillaidthe student in injury assessment. Students will learn to assess an injury anddeterminewhichspecialteststouseinordertocometoaconclusionaboutwhathasoccurredtotheathlete.Thiscourse is designedto satisfyCAATEcompetences relatedtotheabovementionedcontent areas and is intended for graduate athletic training majors.
AT 590 Clinical Education I (1) This course is one of a series of five clinicaleducationcoursesintheGraduateProfessional AthleticTraining Program designedtoprovideproficiencyinstructionandclinical experience in the field of Athletic Training. The emphases in this course are clinical anatomy, goniometry, patient initial assessment, and modalities. This includes palpation of various bony landmarks and soft tissue structures, goniometric skill development, various taping techniques, patient assessment skills such as blood pressure, pulserate, anddocumenting relevant medical history, andmodality usage. Clinical application and understanding are emphasized. The fieldexperiencerotationswillbeassigned pertheclinicalinstruction plan. Prerequisite: Admission to the MSAT program.
AT 591 Clinical Education II(2) This course is one of a series of five clinical education courses designed to provide proficiency instruction and clinical experience in the field of Athletic Training. The emphasis in this course is basic taping and bandaging techniques, emergency procedures and on field assessment. The field experience portion will include local high school football coverage and other field experience as assigned. The athletic training student will work toward completion of the proficiency check-off sheet. This class will meet formally at the discretion of the instructor outside of the clinical setting to ensure adequate progress is being made toward completion of the respective clinical proficiencies. Total clinical hours will be a result of 2 clinical rotations with an area high school to provide an adequate equipment intensive rotation as well as a. Hour totals for AT 591 will be dependent upon successful completion of proficiencies designated for this class with a minimum of 90 clinical hours and a maximum of 300 . This course is designed to satisfy CAATE competences related to the above mentioned content areas and is intended for graduate athletic training majors.
AT 592 Clinical Education III (3) This course is one of a series of five clinical education courses designed to provide proficiency instruction and clinical experience in the field of Athletic Training. The emphasis in the course is the clinical application of therapeutic modalities. The field experience will include sport rotations with emphasis on the application of modalities. The student will work towards completion of a proficiency check -off sheet and total clinical hours will be a result of two clinical rotations with the University of Evansville's athletic department. Hour totals for AT 592 will be dependent upon successful completion of proficiencies designated for this class with a minimum of 135 clinical hours total and a maximum of 300 hours. This course is designed to satisfy CAATE competences related to the above-mentioned content areas and is intended for graduate athletic training majors.
AT 650 Administration of Athletic Training (3) This course is designed to familiarize students with the administration and management responsibilities of athletic training. Topics of study include managementofathletictrainingfacilities, personnel,students,facility design, purchasing of supplies and equipment, and budgeting. This courseisdesignedtosatisfyCAATEcompetences relatedtotheabove mentionedcontentareasandisintendedforgraduateathletictraining
majors.
AT 688 Advanced Rehab Athletic Injuries (3) This course is designed to preparethestudentathletictrainertoplan,implement, document and evaluate the efficacy of therapeutic exercise programs for the rehabilitationandreconditioningoftheinjuriesandillnessofathletes and others involved in physical activity. It will include mobilization andtapingtechniques commonlyused tofacilitatetherehabilitation process. This course is designed to satisfy CAATE competences relatedtotheabovementionedcontentareasandisintendedforgraduate athletic training majors.
AT 690 Gen Medical \& Pharmacology Athl HIth Care (3) Offers insight on current trends in pharmacology use in an athletic training environment. Also offers current evaluation of general medical conditions, treatment, andreferralbaseforconditionsfoundinathletics. This course is designed to satisfy CAATE competences related to the abovementionedcontentareasandisintendedforgraduateathletic training majors.

AT 691 Clinical Education IV (5) This course is one of a series of five clinical education courses designed to provide clinical experience in the field of Athletic Training. Each course has a specific area of emphasis to ensure a diverse experience and provide an opportunity to become proficient in required skills within Athletic Training. The emphasis in this course is rehabilitation. The field experience will be assigned per the clinical instruction immersive plan. The student will work toward completion of the proficiency check-off sheet. This class will meet formally at the discretion of the instructor at least one hour per week, outside of the clinical setting, to ensure adequate progress toward completion of the respective clinical proficiencies. Total clinical hours will be a result of one clinical rotation that is outlined by the program as deemed as an immersive clinical rotation. Hour totals for AT 691 will be dependent upon successful completion of proficiencies designated for this class with a minimum of 225 clinical hours total and a maximum of 600 . This course is designed to satisfy CAATE competences related to the above-mentioned content areas and is intended for graduate athletic training majors.
AT 692 Clinical Education $V(3)$ This course is one of a series of five clinical education courses designed to provide clinical experience in the field of Athletic Training. Each course has a specific area of emphasis to ensure a diverse experience and provide an opportunity to become proficient in required skills within Athletic Training. The emphasis in this course is the evaluation of athletic injuries and illness and rehabilitation of athletic injuries. Clinical time will be spent with various athletic trainers working in various athletic training settings including populations of patients from various age groups and non-athletic populations. This class will meet formally at the discretion of the instructor outside of the clinical setting to ensure adequate progress is being made by the student toward completion of the respective clinical proficiencies. Field experience assignment will be made and student performance assessed by the preceptor. Total clinical hours will be a result of clinical rotations with the various athletic training settings. Hour totals for AT 692 will be dependent upon successful completion of proficiencies designated for this class with a minimum of 135 clinical hours total and a maximum of 300 . This course is designed to satisfy CAATE competences related to the above-mentioned content areas and is intended for graduate athletic training majors.
AT 693 Professional Issues in Athletic Training (3) As a capstone class tothe program, this course will be place anemphasis on preparation for the BOC exam and professional development issues related to athletictraining.Thesetopicsincludeincorporatingevidence-based
medicineintoclinicalpractice, patient-orientedoutcomes inathletic health care, creating a professional presence in athletic training (resumedevelopment, networking, and job searchtactics), and professionalism/professional ethics.

AT 699 Directed Evidence-Based Inquiry (3) Students will develop a critically appraised clinical topic and evaluate evidence related to its clinicalefficacy.Afacultymentorwillbeassignedtothestudentwho will act an in a supervisory role during the research project.

## Certified Nurse Anesthesia (CRNA)

CRNA 500 Professional Role and Leadership Development for the CRNA(4) Course includes an introduction to the professional components of nurse anesthesia practice emphasizing ethical, social, and the collaborative responsibilities of the CRNA practitioner. The course also explores the professional attributes required in a doctoral level nursing profession including a commitment to cultural competence, life-long learning and advocacy. Individual leadership styles will be assessed. The course will also explore leadership roles at state and national nurse anesthesia association levels. Legal issues involved in the regulation of nurse anesthesia practice, safety and wellness in nurse anesthesia practice, and the history of the profession will also be discussed in the course.
CRNA 501 Epidemiology (3) The course covers applications of epidemiologic methods and procedures to the study of the distribution and determinants of health and diseases, morbidity, injuries, disability, and mortality in populations. Epidemiologic methods for the control of conditions such as infectious and chronic diseases, mental disorders, community and environmental health hazards, and unintentional injuries are discussed. Other topics including quantitative aspects of epidemiology, for example, data sources, measures of morbidity and mortality, evaluation of association and causality and study design.
CRNA 502 Health Care Policy and Law for Nurse Anesthesia (30 This course focuses on health care policy, economics and finance and how they impact the nurse anesthesia profession, and the health care of individuals and populations. Health policy proposals, health policies and related issues from the perspective of consumers, advanced practice nurses, other health care professions and other stakeholders will be critically analyzed. The conceptual basis and methods of financial analysis and decision making as they pertain to the healthcare delivery systems are analyzed. Health care economics, marketing principles, and the availability of nurse anesthesia services in both rural populations and within the VA system will be analyzed.
CRNA 507 Helthcare Research and Design (3) This course examines research principles and methods as they contribute to healthcare organizations and the delivery system. Provide experience in developing a research proposal and formal critique of research literature.
CRNA 510 Pathophysiology (4) This course explores normal physiologic processes. Disorders, diseases, and syndromes involving all major body systems are addressed. Topics include diseases of the cardiovascular, respiratory, central nervous, musculoskeletal, endocrine, renal, and hepatobiliary system as well as pathophysiological changes in the geriatric patient. The course focuses on the pathogenesis, clinical presentation, laboratory findings, prognosis, medical intervention and basic implications related to the administration of anesthesia.

CRNA 511 Human Physiology (4) This course focuses on the aspects of human physiology that are most important to build a basic science foundation for future clinical practice. The focus is
that all disease and injury to the human body is a deviation from normal anatomy and physiology. Material will focus on normal physiology (and some anatomy) and clinically relevant pathophysiology to set a foundation for future clinical courses. Instruction will introduce how clinicians use "breaks" in homeostasis to diagnosis and treat disease. Prerequisite: CRNA 510.
CRNA 512 Health Service Organizational Behavior (3) Health care organizations function today in a very dynamic and challenging environment. Effective and successful leaders must have an understanding of how workforce behavior impacts group dynamics and productivity of an organization. This course will study organizational theory, content and process theories of motivation, stress and conflict in the organization, and explore skills for leadership development.
CRNA 513 Basic Principles of Nurse Anesthesia I (4) This course includes lecture and simulation introducing the basic principles of anesthesia practice. Coverage of general chemistry, physics, biochemistry, and quantum physics as they relate to anesthesia practice will be included. Fluid volume assessment and blood component replacement during anesthesia will be covered. Anesthetic implications involving the endocrine, gastrointestinal, and hematologic systems will be included in the course. The course will also include discussion of MAC/IV sedation and indications, implications, and potential complications of light, moderate, and deep sedation. Laboratory sessions, including the use of an anesthesia patient simulator, are designed to operationalize theoretical concepts. Prerequisite: CRNA 560
CRNA 514 Basic Principles of Nurse Anesthesia II (4) Lecture and laboratory course which continues to build on concepts studied in the Basics I course. This course includes case planning protocols and strategies for interventions and problem solving throughout the perioperative period. Students will develop plans of care based on test results and pre-existing conditions. Extensive coverage of local/regional anesthetics, peripheral nerve blocks, neuraxial including its technique, physiologic alterations, and complications will be in this course. hypotensive and ERAS techniques, the use of imaging for diagnosis, and other conditions that affect the provision of anesthesia This course will focus on readying the student for clinical residency and includes cases encountered in the first clinical residency. These include basic general, gynecological, orthopedic, ophthalmological, and laparoscopic techniques. The anesthesia patient simulator is also utilized to further operationalize theoretical and critical thinking concepts. Prerequisite: All first year courses as outlined by CRNA schema.
CRNA 516 Healthcare Information Systems (3) Students will gain an understanding of managing health information as it flows through the healthcare system. Regardless of where students work in the healthcare industry, a conceptual knowledge of health information systems is critical. This class will prepare students to utilize health information to improve the quality, safety, and efficiency of patient care, population health, and healthcare operations. The class topics will be grouped into 4 focus areas of electronic medical records, interoperability, government influences, and emerging technologies.
CRNA 520 Pharmacology (4) The goal of pharmacology is to appreciate the principles of drug absorption, distribution, metabolism, excretion and the mechanisms of drugs to enable the rational use of effective agents in the diagnosis and treatment of disease. Major emphasis is placed on mechanism of action, indications, adverse effects, and drug interactions. Spring.

CRNA 528 Financial Management of Health Care Organizations
(3) This course is designed for the health care manager (or future manager) who does not have an academic background in financial management. It will expose the manager to a variety of financial objectives including but not limited to: cost analysis, financial position analysis and strategies, reimbursement, pricing policies, operating budget, capital assets/expenditures, analysis of financial reports, and internal and external financial controls.

CRNA 542 Health Systems and Policies (3) This course will give an overview of the health care system. We will review the history and current status of various segments of health care, including an analysis of the impact of socioeconomic, political, and current health care issues and trends.
CRNA 560 Introduction to Clinical Anesthesia (3) This course is designed to provide instruction and practice in basic anesthesia techniques and procedures for the registered nurse entering into anesthesia residency. Focus is placed on basic anesthesia procedures for patient safety, anesthesia machine safety, drug selection and calculations. Simulation experiences are designed to enhance critical thinking, problem solving, and skill development. Competency exams will be administered to ensure that students have mastered entry level competency.
CRNA 565 Pre-Clinical Practicum I(1) This course is designed to provide nurse anesthesia residents (NARs) the experience of observing anesthesia providers in a surgical setting in order to visualize the application of what is being learned in the didactic area. NARs will be introduced to anesthesia care across the lifespan. With the guidance of a clinical preceptor, NARs will observe pre-operative, intraoperative and postoperative anesthesia services. NARs will observe as CRNAs communicate with medical providers, OR staff, patients and family members. NAR will observe the administration of various methods of anesthesia.
CRNA 567 Statistics for Appraisal and Evaluation (3) Statistics for Appraisal and Evaluation provides an introduction to data commonly used in health care. Emphasis is on determining when and how research results may be applicable to a variety of healthcare settings. Includes data descriptions, elements of probability, variables, levels of measurement, sampling, central tendency, hypothesis testing, difference tests, relationship tests, regression analysis, ANOVA, and Chi Square.
CRNA 570 Pre-Clinical Practicum II (1) This course is designed to provide nurse anesthesia residents (NARs) the experience of observing anesthesia providers in a surgical setting in order to visualize the application of what is being learned in the didactic area. NARs will be introduced to anesthesia care across the lifespan. With the guidance of a clinical preceptor, NARs will observe pre-operative, intraoperative and postoperative anesthesia services. NARs will observe as CRNAs communicate with medical providers, OR staff, patients and family members. NAR will observe the administration of various methods of anesthesia.
CRNA 613 Advanced Principles of Nurse Anesthesia I (3) This course involves an integrated and comprehensive study of anesthesia for surgical procedures. Content includes the unique physiologic and pathologic states of patients undergoing orthopedic, ENT, neurosurgical, and gynecological, genitourinary, anal/rectal procedures. Additional areas of study include management of the difficult airway and an introduction to the special needs of the pediatric population undergoing anesthesia. Prerequisite: All first year courses as outlines by CRNA schema
CRNA614 Advanced Principles of Nurse Anesthesia II (3) This course continues to build on the concepts presented in Advanced Principles of Anesthesia I. Using an integrated and comprehen-
sive approach, the unique physiologic and pathologic states of patients undergoing intrathoracic, vascular, advanced maxiofacial, advanced ear/nose/throat, and advanced pain management procedures. Additional areas of focus include provision of anesthesia for the advanced pediatric population and anesthesia for obstetrics. Special diagnostic and therapeutic procedures include bariatric, NORA, and organ transplantation. Prerequisite: All first year courses as outlines by CRNA schema and CRNA 613.
CRNA 620 Advanced Pharmacology II (4) This course focuses on advanced pharmacological concepts in anesthetic administration including pharmacodynamics, pharmacokinetics, pharmacotherapeutics and toxicology profiles of adjunct anesthetic drugs and agents. This course involves problem-solving application to the clinical area. Prerequisite: All first year courses as outlined by CRNA schema.

CRNA 632 Advanced Health Assessment (3) This course focuses on performing an accurate and thorough history and physical exam. Mastery of this information is necessary to make diagnostic and therapeutic decisions for patients during the perianesthesia period. This course is designed to develop a providers knowledge base for differential diagnoses and medical conditions of health and disease to craft an appropriate anesthetic plan. Documentation, interpersonal communication skills and professionalism will be emphasized in the instruction of all patient encounters.
CRNA 640 Project Practicum I (1) This course is the first of fivecourse series that is designed for the student to develop a scholarly proposal appropriate for a CRNA project. The evidence-based proposal includes the following components: (a) a focus on a change that directly or indirectly affects health care outcomes, (b) a focus on a system or population/aggregate, (c) an implementation plan in an arena or area of practice, (d) a plan for sustainability, and (e) an evaluation plan that measures processes and/or outcomes (formative or summative). The CRNA Clinical Project is about process and product, both aspects carry equal importance. The clinical project process is organized and well-delineated to guide the CRNA student towards incorporating specific knowledge and skill set that ultimately improve healthcare delivery, clinical practice, and patient care. This first course will focus on an appropriate topic that has the potential to positively affect healthcare outcomes. Students will meet with CRNA faculty for 1 hour each week. Prerequisite: HSA-567, HSA-507.
CRNA 641 Porject Practicum II (1) This course is the second of five-course series that is designed for the student to develop a scholarly proposal appropriate for a CRNA project. The evi-dence-based proposal includes the following components: (a) a focus on a change that directly or indirectly affects health care outcomes, (b) a focus on a system or population/aggregate, (c) an implementation plan in an arena or area of practice, (d) a plan for sustainability, and (e) an evaluation plan that measures processes and/or outcomes (formative or summative). The CRNA Clinical Project is about process and product, both aspects carry equal importance. The clinical project process is organized and well-delineated to guide the CRNA student towards incorporating specific knowledge and skill set that ultimately improve healthcare delivery, clinical practice, and patient care. This course will focus on appraising evidence and completing a literature search on an appropriate topic that has potential to positively affect healthcare outcomes. Students will meet with CRNA faculty for 1 hour each week. Prerequisite: All first-year courses as outlines by CRNA schema.
CRNA 642 Project/Practicum III (1) This course is the third of five-course series that is designed for the student to develop
a scholarly proposal appropriate for a CRNA project. The evi-dence-based proposal includes the following components: (a) a focus on a change that directly or indirectly affects health care outcomes, (b) a focus on a system or population/aggregate, (c) an implementation plan in an arena or area of practice, (d) a plan for sustainability, and (e) an evaluation plan that measures processes and/or outcomes (formative or summative). The CRNA Clinical Project is about process and product, both aspects carry equal importance. The clinical project process is organized and well-delineated to guide the CRNA student towards incorporating specific knowledge and skill set that ultimately improve healthcare delivery, clinical practice, and patient care. This course will focus on plan implementation that has the potential to positively affect healthcare outcomes. Students will meet with CRNA faculty for 1 hour each week. Prerequisite: All first-year courses as outlines by CRNA schema and CRNA 641.

CRNA 660 Nurse Anesthesia Clinical Practicum I (8) This course is designed to provide nurse anesthesia residents (NARs) experience in the administration of anesthesia in a surgical setting. NARs will be introduced to anesthesia care across the lifespan. With the guidance of a clinical preceptor, NARs will perform pre-operative, intraoperative and postoperative anesthesia services under the direct supervision of an anesthesiologist or CRNA. NARs will communicate effectively with medical providers, preceptors, OR staff, patients and family members. NAR will administer various methods of anesthesia under the direct supervision. Prerequisite: All first year courses as outlined by CRNA schema.
CRNA 665 Nurse Anesthesia Clinical Practicum II (8) This 15-week full-time clinical course is designed to provide stuThis full-time clinical course is designed to provide nurse anesthesia residents (NARs) experience in the administration of anesthesia in a surgical setting including outpatient surgery and diagnostic settings. With the guidance of a clinical preceptor, NARs will perform pre-operative, intraoperative and postoperative anesthesia services under the direct supervision of an anesthesiologist or CRNA. Emphasis is on the development of professional behaviors, written and verbal communication skills, and the performance of the examination and therapeutic interventions previously addressed in didactic coursework. Prerequisite: All first-year courses as outlined by CRNA schema and CRNA 660.
CRNA 670 Nurse Anesthesia Clincical Practicum III (8) This full-time clinical course is designed to provide nurse anesthesia residents (NARs) experience in the administration of anesthesia in a surgical setting including outpatient surgery and diagnostic settings. This course is designed to provide students with a supervised clinical experience in an outpatient surgery or diagnostic setting. With the guidance of a clinical preceptor, students will perform pre-operative, intraoperative and postoperative anesthesia services across the lifespan and under the direct supervision of an anesthesiologist or CRNA. Emphasis is on the development of professional behaviors, written and verbal communication skills, and the performance of the examination and therapeutic interventions previously addressed in didactic coursework. Prerequisites: CRNA 665

CRNA 740 Project Practicum IV (1) This course is the fourth of a five-course series that is designed for the student to develop a proposal appropriate for a CRNA project. The evidence-based proposal includes the following components: (a) a focus on a change that directly or indirectly affects health care outcomes, (b) a focus on a system of population/aggregate, (c) an implementation plan in an arena or area of practice, (d) a plan for sustainability, and (e) an evaluation plan that measures processes and/or outcomes (formative or summative). The CRNA Clinical Project is
about process and product, both aspects carry equal importance. The clinical project process is organized and well-delineated to guide the CRNA student towards incorporating specific knowledge and skill sets that ultimately improve healthcare delivery, clinical practice, and patient care. This course will focus on plan sustainability that has the potential to positively affect healthcare outcomes. Students will meet the CRNA faculty for 1 hour each week.
CRNA 741 Project Practicum V (1) This course is the fifth of a five-course series that is designed for the student to develop a proposal appropriate for a CRNA project. The evidence-based proposal includes the following components: (a) a focus on a change that directly or indirectly affects health care outcomes, (b) a focus on a system of population/aggregate, (c) an implementation plan in an arena or area of practice, (d) a plan for sustainability, and (e) an evaluation plan that measures processes and/or outcomes (formative or summative). The CRNA Clinical Project is about process and product, both aspects carry equal importance. The clinical project process is organized and well-delineated to guide the CRNA student towards incorporating specific knowledge and skill sets that ultimately improve healthcare delivery, clinical practice, and patient care. This course will focus evaluation of the project and dissemination of the project results that has the potential to positively affect healthcare outcomes. Students will meet the CRNA faculty for 1 hour each week.

CRNA 765 Nurse Anesthesia Clinical Practicum IV (8) This full-time clinical course is designed to provide nurse anesthesia residents (NARs) experience in the administration of anesthesia in a surgical setting including outpatient surgery and diagnostic settings. With the guidance of a clinical preceptor, students will perform pre-operative, intraoperative and postoperative anesthesia services across the lifespan and under the direct supervision of an anesthesiologist or CRNA. Emphasis is on the development of professional behaviors, written and verbal communication skills, and the performance of the examination and therapeutic interventions previously addressed in didactic coursework. Pre-requisites; CRNA 660, CRNA 665, and CRNA 670.
CRNA 770 Nurse Anesthesia Clinical Practicum V (8) This full-time clinical course is designed to provide nurse anesthesia residents (NARs) experience in the administration of anesthesia in a surgical setting including outpatient surgery and diagnostic settings. With the guidance of a clinical preceptor, NARs will perform pre-operative, intraoperative and postoperative anesthesia services across the lifespan and under the direct supervision of an anesthesiologist or CRNA. Emphasis is on the development of professional behaviors, written and verbal communication skills, and the performance of the examination and therapeutic interventions previously addressed in didactic coursework. Pre-Requisites: CRNA 660, CRNA 65, CRNA 670, and CRNA 770.
CRNA 780 Nurse Anesthesia Seminar I (2) This course is the first in a three-course series that is taught concurrently with the Clinical Practicum experiences. Students meet with UE faculty for 2 hours each week. Knowledge and clinical cases that may not be observed during the clinical rotation are discussed. Students will engage in review of culturally sensitive care and discussion of patient cases, including special circumstances such as anesthesia for the patient with cancer, and airway fires. The importance of personal health and wellness for healthcare professionals will be emphasized. Students will design a study plan to prepare for the NCE. Other topics of discussion include patient handoff in post-anesthesia areas, error management, and social media presence. Pre-Requisites: All second year courses as outlined by CRNA schema. Co-requisite: CRNA 670

CRNA 781 Nurse Anesthesia Seminar II (2) This course is the second in a three course series that is taught concurrently with the Clinical Practicum experiences. Students meet with UE faculty for 2 hours each week. Knowledge and clinical cases that may not observed during the clinical rotation are discussed. Students will engage in review and discussion of patient-centered communication, personal leadership styles, crucial conversations and negotiation, contract negotiation, and common business practices and billing practices. Students will take the SEE exam during this course. A score of 425 or higher must be achieved to be submitted as a candidate to take the NCE after graduation. Prerequisite: All second-year courses as outlined by CRNA schema, CRNA 780. Co-requisite: CRNA 765.

CRNA 782 Nurse Anesthesia Seminar III (1) This course is the third in a three-course series that is taught concurrently with the Clinical Practicum experiences. Students will meet with UE faculty for 2 hours each week. Students will engage in discussion of clinical issues important to the profession. Crisis management and debriefing will continue from Seminar II. Select topic reviews will be incorporated into this course. The SEE exam may be taken again during this course if the required score was not received during Seminar II. A score of 425 must have been received on the SEE exam in order to pass this course and be eligible for graduation. Pre-requisite: All second-year courses as outlined by CRNA schema, CRNA 765, RNA 780. Co-requisite CRNA 770.

## Education (EDUC)

EDUC 510 Advanced Education Perspectives and Foundations (30 The course cultivates an understanding of the evolving contexts within which traditions of educational purposes, policies, and practices occur. This course provides an intellectual foundation for all subsequent coursework in the Masters of Science in Education with a concentration in Educational Leadership program and results in selecting a research area of study. (includes a minimum of 10 hrs . principal observations)
EDUC 515 Curriculum \& Instruction: Science of Reading \& Learning Foundations(3) This course offers ways to evaluate and teach the most effective teaching processes, including implementing content successfully, understanding how state standards are written, creating targets and essential lessons, and identifying effective instruction through deep curriculum knowledge. This includes the science of learning and the science of reading. (Includes a minimum of 10 hours principal observation)
EDUC 518 Personnel Administration in Educational Institutions (3) Focuses on relationship building, conducting interviews, and social/emotional learning. Principal interns also examine the importance of building productive and respectful relationships with parents/guardians while encouraging families to engage in their childs learning. This course focuses on practical ways to support all school stakeholders by studying trauma-informed technology, social/emotional learning, and buildings relationships. Students will learn to conduct interviews, meet with stakeholders, and organize the personnel of school. (includes a minimum of 10 hrs. principal observations)
EDUC 519 Principal Internship 1 (3) This course is the first of two practicum in the principal internship under the joint supervision of a certified school administrator and the University. (Includes a minimum of 50 hrs. principal observations) Pre-Requisites EDUC515 and EDUC-518
EDUC 524 Advanced Study Curriculum/ Standards/ Data Driven(3) Designed to help students understand the relationship among standards, curriculum, instruction and the use of assessment data
to drive instruction and improve curriculum. The course provides extensive study and an opportunity to learn how to consistently analyze, use, and deliver assessments and other student data to improve learning and achievement. The essential question for this course is, How can I best use assessments of my students and my teaching to improve student learning? (includes a minimum of 10 hours principal observation)

EDUC 525 Collaboration and Leadership in a Global Society (3) The course provides perspectives on educational leadership, collaboration, and understanding of cultural and educational issues facing educators in the U.S. and other nations. The primary purpose of this course is to provide an intensive study of teacher practice, collaboration, and leadership needed in education for an increasingly global economy and society. The course will also provide opportunities for additional study of how educational effectiveness and strategies learned in the program can be understood in particular cultural contexts. This includes the completion of IDI. (includes a minimum of 10 hours principal observation)
EDUC 531 School Law (3) This course covers Article 7, Title IX, and historical school law decisions that led to educational precedent. The course will include implementations of school law. (Includes a minimum of 10 hours principal observation)
EDUC 532 The School Principal (3) The course is a study of the various roles of a building-level principal, including leading through mission statements, organizing effective PLCs, understanding of diversity, systems thinking, communication, instructional leadership, developing talent, respecting culture, and the ability to keep a balanced approach. (Includes a minimum of 10 hours principal observation).
EDUC 533 Principal Internship II (3) The course is a practicum in the principal internship under the joint supervision of a certified school administrator and the University. Each student will develop a portfolio demonstrating performance activities that meet certification and standards and complete an action thesis (Includes a minimum of 100 hrs . principal internship).
EDUC 540 (3) Research \& Inquiry This course includes a series of workshops for students to prepare for their research. The course provides study and an opportunity to demonstrate and publicly present, cumulatively, the data, work, and research gathered and used throughout the program and within the students respective classrooms. (Includes a minimum of 10 hours principal observation.)
EDUC 590 Decision Making (3) The course examines decision-making in leadership roles through extensive use of case studies. The studies focus on the decisions facing all types of organizations committed to leading and serving with an emphasis on educational institutions. This includes budgeting and fianc and how to involve teacher-leaders in decision making. (Includes a minimum
of 10 hrs . principal observations)

## Gerontology (GT)

GT 501 Biology, Health, and Personality Dimensions of Aging (3) This course covers the basic biological, health, and personality factors related to aging. Topics include life course changes, normal aging, nutrition, aging related diseases, frailty, incontinence, cognition, anxiety and depression, dementia, and personality changes. Prerequisites: SOC 105, 230 or GT 225 and permission of instructor or Director of the Gerontology Center.
GT 503 Later Life and Spirituality (3) This course covers key issues
facing elders and their families in later life related to health care, death, and the spiritual needs of elders. Topics include: dying, ethical issues, end-of-life reviews, and the role of religion over the life course. Prerequisites: SOC 105, 230 or GT 225 and permission of instructor or Director of the Gerontology Center.
GT 505 Institutional Care and Geriatric Assessment (3) This course covers the various institutional settings serving the needs of elders, as well as issues related to geriatric assessment. Topics include: assisted living, residential and home-based care, community based long-term care, designing physical environment for elders, comprehensive geriatric assessment, specific functional assessments, and geriatric assessment instruments. Prerequisites: SOC 105, 230 or GT 225 and permission of instructor or Director of the Gerontology Center.
GT 507 Economics of Aging and Social Policies (3) With the impending retirement of millions of Baby Boomers, understanding the economic, political, and social issues related to the elder population becomes ever more important to individuals and society. This course is a comprehensive and balanced assessment of economic issues, social policies, and their impact on everyone, old and young. Prerequisites: SOC 105, 230 or GT 225 and permission of instructor or Director of the Gerontology Center.

## Health Services Administration (HSA)

Enrollment is limited to students admitted to the health services administration master's degree program.
HSA 505 Health Care Systems: Issues and Trends (3) Overview of the health care system. Reviews the history and current status of various segments of health care. Includes analysis of the impact of socioeconomic and political factors, as well as current health care issues and trends.

HSA 506 Jurisprudence and Ethics in Health Care (3) Emphasizes legal and ethical processes and their application to the health care organization,administrator,staff,employees,and patients.Includes ethicaldimensionsofthedecision-makingprocessandcurrentethical issues in health care.

HSA 507 Health Care Research and Design (3) Examines research principlesandmethodsastheycontributetohealthcareorganizations andthedeliverysystem. Providesexperienceindevelopingaresearch proposal and formal critique of research literature.
HSA 512 Health Service Organizational Behavior (3) Uses various organizational, managerial, and behavioral theories, concepts, and principles to analyze, diagnose, predict, and guide human behavior within health care organizations. Emphasis on motivation, leadership,change,communication, personality, groupdynamics,decision making, andorganizationaldevelopment.Stressestheimportanceof understanding professional roles within health care organizations.
HSA 514 Health Care Management Theory and Human Resources (3) Includesthestudy ofmanagementtheoryand practiceasapplied bymanagersofhealthservices.Emphasizes analysisofthemanager's role, interactionswith people,theorganization, andtheenvironment. Special emphasis on human resource issues.
HSA 516 Health Care Information Systems (3) Provides an understandingoftheconceptsandapplicationsofinformationsystemsused in the management of health care systems.
HSA 520 Health Care Planning and Marketing (3) Integrates longrange goal planning with dimensions of marketing for health care services. Concepts,techniques, andtheories usedintheplanningand management of marketing in the health care industry.
HSA 524 Health Problems in Health Care (3) A study of health
promotion,specificdiseases,andhealth problemsthroughoutthelife cycle. Includes communicable and chronic diseases and conditions that affect the individual, the family, and the community. Explores role of health care system in dealing with these problems through prevention and treatment.
HSA 528 Financial Management of Health Care Organizations (3) Focuses on the acquisition, allocation, and management control of financial resources within health care organizations. Includes cost analysis, financial position analysis and strategies, reimbursement, pricing policies,budgeting, capitalexpenditure, analysis offinancial reports, and informal and external controls.
HSA 529 Health Services Field Experience (1) Provides field experiencewithinaselectedhealthcareorganizationwiththesupervision of anagencypreceptorandfacultymember.Designofcoursedependent upon the individual student's past and present work experiences in healthcareorganizationsaswellasfuturegoals.Prerequisite:Permission of the instructor.
HSA 532 Managed Health Care (3) Examines the changing role of managed careorganizationsinthehealth caresystem. Discussesthe history, basicstructureofmanaged carefirms, the interrelationships amongproviders, andtheirevolvingrole.Theirimpactonhealthcare economics discussed in detail.

HSA 567 Statistics for Appraisal and Evaluation (3) Focuses on the analysis ofdatacommontohealth care.Includesdatadescription, elements of probability, distribution ofrandomvariables, estimationand confidenceintervals,binomialandnormaldistributions, hypothesis testing, contingency tables, regression analysis, and ANOVA.
HSA 590 Decision Making in Health Care (3) Examines decision making in health services administration by extensive use of case studies.Material fromotherHSA courses integrated intothe study of decisions facing all types of health care organizations.
HSA 595 Independent Study (1) Independentresearch in health care managementconductedunderfacultysupervision. Prerequisite:Permission of the instructor.

HSA 598 Internship in Health Care Management (1) Structured assignment which allows student to gain practical experience in a healthcaremanagementposition relatedtoanarea of careerinterest. Student is directed by the internship director and supervised by a memberofthecooperatingorganization.Prerequisite:Permission of the health services administration program director.

HSA 599 Special Topics in Health Services Administration (1) Lectures and discussion of topics not covered in regular course offerings. Provides greater depth to topics of special interest or explores rapidly changing areas in health services administration.

## Health Professions Education (HPE)

HPE 500 Innovative Curricular Design (3) This course includes health systems and delivery topics, interdisciplinary issues, and varying curricular design. Instructional strategies that facilitate critical thinking and clinical reasoning and incorporate a variety of teaching and learning styles into health professions education programs will be explored and discussed. Ethical principles, integrity, and compliance issues associated with teaching and learning will be discussed and presented through individual and in-class activities including syllabus construction and classroom activity development.
HPE 505 Thriving in Higher Education (1) Through course activities, students will become familiar with institutional missions and their effects on institutional culture, understand organizational/ governance models, become familiar with the role and functions of academic faculty, explore strategies for obtaining and main-
taining academic appointment, and investigate the relationships between professional preparation programs in healthcare professions and the larger institutions in which they are housed. Students will facilitate seminar discussions, review promotion and tenure guidelines from representative institutions, and complete a tentative career plan. Offered in a 7-week module.
HPE 510 Evidenced-Based Practice in Education (3) A course to provide a framework for teaching that is grounded in evidence. This course will help students in developing their own teaching philosophy, design well-aligned courses, collect and evaluate evidence, and ultimately apply the science of learning to common teaching practicalities utilized. Various teaching strategies will be explored, including hands-on practical assessments, simulation, discussion, and assignment-based activities. Students will also learn strategies to overcome common barriers in evidence-based practice.
HPE 515 Current Issues in Higher Education (1) Description: This course will explore the academic, political, legal, governmental, financial, and other influencers that higher education leaders are forced to consider as they lead their institutions into the future. Offered in a 7-week module.
HPE 520 Student and Program Assessment (3) This course examines the importance of valid and reliable assessment data to support student learning, as well as the theories, techniques, methods, and program evaluation models currently used in assessing the effectiveness of various programs in higher education. Students will learn the appropriate methods for selection, administration, and interpretation of assessment data and how to lead the process of using student and graduate assessment data for instructional and programmatic decision-making to continue to improve outcomes.
HPE 525 Core Concepts of Interprofessional Education: Education, Practice, and Research (1) This course seeks to provide students with an appreciation of the diversity of knowledge and perspectives that are possible in interprofessional teams that can ultimately enhance patient care, public service, and research. Offered in a 7-week module.

HPE 550 Research Methods (3) Explores common designs utilized in health professions research, emphasizing critical appraisal of current evidence. Topics include experimental and non-experimental research designs, systematic reviews, and meta-analyses.
HPE 560 Qualitative Research (3) This course synthesizes the rationale, theoretical foundations, design, methods, analysis, and ethical issues related to qualitative research. Students will analyze the five approaches to qualitative research, including narrative, phenomenology, grounded theory, ethnography, and case study.
HPE 570 Quantitative Research (3) Prepares the student to code, analyze, and interpret data from health professions research. Topics include scales of measurement, measurements of central tendency, summary statistics, identification of variables, coding and analyzing parametric and nonparametric data using statistical software (Shapiro-Wilk, Kolmogorov-Smirnov, t-tests, Mann Whitney U, ANOVA, Kruskal-Wallis, linear regression).

HPE 600 Learning Theories (3) Explores the theories that form a foundation for all health professions educators. The primary focus of the course is to teach students foundational theories, integrative application, and social identity development in higher education today. Included are theories specific to attachment, adaptation and resilience, cognition, motor learning, empowerment, loss and grief, psycho-immunology, student development, and societal responses to stigmatized groups. Theories are
applied to interprofessional practice and research design across the life span.
HPE 610 Online Pedagogy and Course Delivery (3) This course will explore the science and understanding behind the pedagogy approach to teaching in the online environment. It will teach students what it means to deliver effective online content by utilizing the positive aspects of technology to deliver a beneficial educational learning experience. Students will learn how to create student-centered learning opportunities and how to develop active learning activities.
HPE 615 Leadership, Ethics, and Organizational Change (1) This course examines leadership theory, concepts, and practice. Students will identify leaders and leadership styles and apply the knowledge to better understand and positively affect their organization, business, or institution. Also includes an emphasis on ethical processes and their application to leadership. Offered in a 7-week module.
HPE 620 Teaching Practicum(3) In this course, students will apply educational theories and skills learned through this field-based course. Students will partner with an experienced educator for this 90 -hour practicum. Students may choose to complete this experience in various settings, including the classroom, laboratory, clinical setting with students or patients, and simulation.
HPE 650 Advanced Quantitative Research (3) Prepares the student to code, analyze, and interpret advanced statistical analyses to determine relationships between factors and differences between groups. Topics will include logistic regressions, odds ratios, and meta-analyses.
HPE 655 Academic Writing (1) Prepares the graduate to meaningfully contribute to research design and analysis in health professions. Topics include synthesizing literature, developing research questions, developing scientific communication strategies, and identifying funding sources. Offered in a 7 -week module.
HPE 660 Dissertation Proposal (3) This is the first course in the three-course mentored dissertation series. This course supports the development of the dissertation proposal. Students will select a faculty mentor, identify a research question, begin a systematic review, and submit a study protocol to the Institutional Review Board at the appropriate organization(s). Successful completion of the course requires defending the dissertation proposal in a formal proposal hearing. This course is repeatable up to 4 times
HPE 690A Capstone Seminar - Teaching (1) This course is designed to prepare the student to meaningfully contribute to health professions education. The student will partner with an experienced educator to apply educational theories and skills learned throughout the health professions education certificate.
HPE 690B Capstone Seminar - Research (1) This course is designed to prepare the student to meaningfully contribute to research design and analysis in health professions. The student will identify a faculty member with ongoing research, and assist in entry and analysis of data, as well as dissemination of findings in an appropriate public platform.
HPE 700 Mentored Dissertation I(3) This is the second course in the three-course mentored dissertation series. This course supports the development of the dissertation research through regular meetings with the faculty mentor. Students will complete the systematic review from HPE-660 and format it for submission to a peer-reviewed journal, gather data for their dissertation research project, and begin drafting the dissertation thesis (or whatever we call it). Successful completion of the course requires submission of the systematic review to a peer-reviewed journal.

HPE 710 Mentored Dissertation II (3) This is the third course in the three-course mentored dissertation series. This course supports the completion of the dissertation research through regular meetings with the faculty mentor. Students complete the dissertation research project from HPE-700 and format it for submission to a peer-reviewed journal. Successful completion of this course requires the completion of the dissertation thesis and an oral defense of the project. This course is repeatable up to 4 times.

## Innovative Leadership in Heritage Manage-

 ment(ILHM)ILHM 505 Journey to Sustainability (3) This course will rigorously explore the pillars of sustainability, weaving together the threads that bind the human, social, economic and environmental demands that form the fabric of modern life. We will investigate real-life case studies from each of the pillar, shedding light on how the global context for sustainability is driven forward by change within the individual, change within organisations and changes within infrastructure. Countries, corporations, and individual responsibility are thoroughly considered, considering major recent events, such as the Extinction Rebellion Movement and COP26. The social dynamics of sustainable change are studied, encouraging students to question what sustainability is and who is responsible for creating that change. Students will develop a range of skills, including critical thinking and writing, discussion and debating, and listening to and appreciating the range of global viewpoints brought to the table. They will be asked to consider the green and blue economy, the role of major NGOs and the grassroots player to establish a roadmap to sustainable transformation. Pre-requisiste: Acceptance onto MA course
ILHM 506 Environmental Ethics and Justice (3) Environmental Ethics and Justice bids students to consider a range of questions: what is our place in nature and are we central to it? What is the intersection between our treatment of nature and how we (as a Western society) have treated BAME/BIPOC peoples, including those from colonised geographies. We will critically evaluate what defines our moral relation to our own kind and to other non-human living systems, asking how value is defined. Students are also expected to investigate the extent to which wilderness has value in and of itself, and if it is possible to rewild places without changing their nature. Throughout this course, students will evaluate the human position within our limited planetary constraints, reflect on the means and processes through which we have come to oppress natural and human systems, analyse the anthropocentric values that pervade society, and ultimately offer a trajectory toward a more holistic and just future.
ILHM 510 Heritage and Community Change Making (3) Heritage and Community Change-Making captures the range of transformative effects that heritage built or natural has on communities. Bringing together concepts surrounding social dynamics, relative deprivation, access and inclusivity, and UNESCOs CDIS and Culture|2030 Indicators, the course sets out a depth and breadth of case studies that hinge on the central commonality of cultural heritage. Students can expect to holistically pursue the change-making ability of heritage on a local, regional, and global scale, as they investigate the ramifications of cultural heritage on those around it. From tourism programmes on the steppes of Mongolia and the economic value of Northern Irelands historic landscape, to the building of military veteran resilience across the Transatlantic and heritage as a tool for peacebuilding in Southeast Asia, the fullest change-making extent of heritage is explored. Impactful case studies from around the globe are used as the launching point for understanding the power and simplic-
ity of heritage as a transcendent human interface, while practical tasks bring global knowledge and experience back home for potent application. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 512 Environmental Policy Analysis (3) Environmental issues are growing in visibility in local, national, and world arenas, as a myriad of human activities leads to increased impacts on the natural world. Issues such as climate change, endangered species, wilderness protection, and energy use are regularly on the front pages of newspapers. Governments at all levels are struggling with how to address these issues. Environmental policy analysis is intended to present the environmental and social impacts of policies, in the hope that better decisions will result when people have better information on which to base those decisions. The aim of this course is to introduce students to the analysis of economic, scientific, and other data to provide objective information on environmental issues. The end goals are to create policy recommendations, promote solutions, and build public awareness.

ILHM 515 Cultural Heritage Laws, Policy and Practice (3) This course focuses on the legal and practical side of cultural heritage and cultural property management. We will unravel the range of laws and policies that govern cultural heritage both monumental and artefactual - at the local, federal and international levels, as well as seeking deeper cultural understanding by juxtaposing it against the British system of heritage practice. The legal framework will provide the foundation on which students will begin to build up policy and processual skills. With a focal point on the practice of heritage leadership, students will engage with industry-standard cultural heritage impact assessments and write policy memos that critically evaluate illicit trading and repatriation claims in the eyes of the law. The course is designed to provide students with both depth and breadth of understanding, all directly applicable to employment and heritage leadership, directing them to explore their own ethos as practitioners and applying knowledge to real life scenarios. Class will take a range of forms, from class debates about range of historic case studies that further promote legal and cultural understanding, (including those of Kennewick Man, the Elgin Marbles, the Bamyan Buddhas, and the destruction of cultural property during the Syrian conflict), to class trips, virtual tours, guest speakers and group discussions. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 520 Cultural Tourism, Education and Interpretation (3) Cultural Tourism, Education and Interpretation delivers the opportunity to evaluate how cultural heritage is central to the tourism market, analysing its economic and social value, and exploring the range of best practices surrounding education and interpretation within the sector. Central to the course is the motivation behind visitor site selection and why the indulgence in both tangible and intangible cultural experiences resonates with people from across the globe. Students should be prepared to consider how heritage sites can meet growing demands sustainably and be used as a force for peacekeeping, while continuing to meet the interest and demands of their visitor attraction demographic. The spectrum of types of cultural tourism is explored, alongside practical opportunities for students to engage on a cross-cultural scale. How and why education around cultural heritage has evolved is investigated, questioning current best practice at heritage centres, museums, world heritage sites, archives and non-institutionalised spaces. Finally, students are asked to scrutinise how interpretation of cultural heritage has transformed our understanding of the past and why the identities of a society demand a proactively reflective approach to interpretative
methodologies. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 524 Heritage and Identity (1) Heritage and Identity explores the remarkable interface between place, space, and identity, through the lens of individual, regional and national ideologies of self. Heritage has to do with everything but understanding the concept of identity and the role heritage plays in its shaping is a more elusive concept. Heritage and identity are intrinsically linked to space, place, memory and forgetting, and in many circumstances it is also linked to politicized and propagandized ideas surrounding domination and contestation. Heritage can be used to lift up and extol an identity, while in other instances it can be used to oppress or mask underlying identities. Central to this workshop will be the investigation of that transient intersection where time, place and space meet identity, and whether we can unravel the long-knotted threads that weave heritage and identity together. Ultimately, the question is posed and we will reach a determination of whether heritage informs identity, or identity informs interpretation and heritage. This is accomplished through the wide-ranging discussion of case studies, working group debates and identification of the myriad forms in which heritage and identity takes place: physical, intangible and digital. Students will prepare a research proposal for potential article publication and conduct a heritage interview with reflective poster for this workshop that aims to be a concentrated depth dive into the ambiguous boundary between cultural heritage and identity, critical to society. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 525 Heritage and Equality, Diversity and Inclusivity (EDI) (3) This course will explore the relationship between heritage, EDI, and identity in individual, community, regional, and national contexts. The course will bring together theoretical concepts around heritage and identity and their practical application, focusing on current global issues such as Heritage, EDI, and Identity as theoretical concepts; the importance of the creation of the biographies of people and things to heritage and identity; Black Lives Matter (BLM), Heritage, and Identity; Brexit and persistent right wing narratives around Britishness using heritage; Enabled Archaeology, working towards a more diverse and inclusive experience. The module will allow students to develop a range of skills including critical thinking and writing, discussion and debating, and the ability to listen to and appreciate different viewpoints. They will be encouraged to consider heritage and EDI in relation to their own identity/ies and of those around them to help them better understand current political, social, economic, and cultural systems in the world today. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 526 Heritage and Cultural Landscapes (1) In this graduate workshop, students will do a survey of the range of cultural landscapes and settings across the globe, toward recognition of the way heritage shapes the landscape and landscape shapes culture, including the three main categories of landscape according to the World Heritage Convention. Students will investigate the meaning of cultural landscape according to UNESCO and confront the everyday challenges of cultural landscape management. In an acknowledgement of the UNs sustainable development goals, students will form small working groups to juxtapose each others chosen landscapes and draw out the broad similarities and dissimilarities; review human impact on the landscape; reflect on that landscapes influence on how and why that culture formed; and ascertain to what extent sustainability goals are being met, hopefully developing a pathway toward sustainable development. Pre-requisites: Graduate level course; all program entry
requirements apply.
ILHM 530 Design Thinking in Change Management (1) This workshop is focused on the human-centred principles of design thinking, weaving together empathy, playful creativity and user needs. It provides an in-depth development of empathy for customers and surface insights for creating products and services they want and need. In the next set of workshops, students will go on to tackle the art of ideating, using rapid prototyping, play and iteration to move forward their ideas around management and change management within industry. Customer and staff needs are at the heart of all activities, transforming the role of manager to one of playful facilitator.
ILHM 531 Fundamentals of Financial Decision-Making (1) The Fundamentals of Financial Decision-Making workshop provides students with a brief but thorough introduction to all aspects of accounting and budgeting within a business, key considerations in budget planning and monitoring, and risk management. Students should expect to explore the essential tools and concepts of financial management in depth, feeling confident in their financial decision-making skills as managers of business or personal expenses after undertaking this course.
ILHM 532 Intercultural Competence (1) Whether you sit down to a plate of Chinese food, drive a Volkswagen, buy fairtrade clothing from Patagonia or drink coffee from Ethiopia, you might not realise that cultural geography and intercultural competence are the driving forces behind these commodities. Intercultural competence helps us to understand the relationship between where a person lives and how it affects their traditions and daily lives, from monuments to meals, languages to governance. This workshop explores the unique intersection between humanity and the environment, how they have each affected each other and what we can learn about ourselves and our unique world view through those foci.
ILHM 533 Natural Resource Management (1) Natural Resource Management explores the most common approaches to established and emerging natural resource and public land problems, as well as innovative and traditional solutions to those issues. Students will learn about government and economic regulations and incentives, while understanding the forces behind extinction and overpopulation events. The benefits and imperative to rewild and guerilla grow will be discussed in depth, as will concerns around the balance between indigenous and native flora and fauna. The workshop concludes with a depth dive into gender dynamics and Indigenous peoples rights and roles in this complicated but topical field. Classes are delivered in an innovative and interactive format, providing students with the maximum toolkit to succeed in their future roles as resource managers.
ILHM 534 Conflict Resolution(1) This graduate workshop is designed to introduce students to the concepts of conflict and conflict resolution within a professional setting. Starting with the evasive topic of what constitutes conflict, asking What is conflict?, students will engage with their ideas about conflict and how conflicts emerge. From there, students are asked to explore how conflict escalates, the different stages of conflict, and then identify and apply the five most common conflict resolution styles. Students are expected to deconstruct and mind-map issues around trust in the negotiation and mediation process. The students will emerge from the workshop with knowledge of the central paradigms and concepts of conflict resolution, and with an initial set of skills (negotiation and mediation) which can be used to manage conflicts with confidence in their own lives in order to enhance productivity and performance, and to encour-
age tranquil relationships.
ILHM 353 Ocean and Coastal Resource Management (1) In this workshop, students can expect to explore the key areas of ocean and coastal resource management, from fisheries to cultural heritage. Students will consider traditional conservation solutions, contemplate the work of prominent NGOs and investigate the role of international policy and law in managing ocean resources. The management of marine resources is a heavily political and culturally driven undertaking, and one that is shaped by perceptions of human livelihoods that can be traced to subsistence living. Students will explore this liminal space where notions of place and boundary are shaped through shared understandings and map out those nebulous zones where climate change disasters are unfolding and can be averted. Leaving with a portfolio of skills, this workshop is gateway for students who would like to venture into the marine conservation sector but are not necessarily marine scientists.
ILHM 536 Community Organising (1) Community organising is at the heart of pragmatic and people-driven change on the local, regional and global levels. It offers the cohesion of disparate individuals and ideas through authentic leadership and greater accountability. But where do you start to put together a community campaign? In this workshop, the dynamics of community organising are laid out as a road map to peaceful and impactful grassroots organising, touching on diverse topics such as black feminism, LGBT discrimination, workers' rights and much more. Students will explore community organising by campaign role playing, engaging with community leaders and through the thorough introduction to the social dynamics of power, political analysis and social change.
ILHM 537 Generation Earthshot (1) In 1961, the US Government launched Moon shot an ambitious initiative that would capture the ranging talents of Americans across disciplines with one goal: to land humans on the moon. The mission was a success. Today, the call is heard once more through Earthshot, launched by HRH Prince William and Sir David Attenborough. The initiative has been set up to drive talent and innovation with the goal of limiting or reversing climate change and the uninhabitable conditions it will bring with it. This workshop, entitled Generation Earthshot, will provide an in-depth analysis of the conditions around climate change in the key categories of the Earthshot prize, enabling students to engage with cutting edge innovation and ideology. It will provide them with the chance to network with progressive climate change agendas and professionals, while encouraging them to create their own mock Earthshot entry. This simple but ambitious workshop prepares students to work for a future that will improve life on Earth for generations to come. It represents the fruition of 21st century solutions for 21st century problems.
ILHM 538 Project Management (1) This Project Management workshop is designed to take participants through the steps of initiating, developing and managing any range of projects, from conception to evaluation. Together we will explore concepts around the project planning canvas, what change leadership means, how to meet the outputs and outcomes indicated in a theory of change, and which platforms are currently available to project managers. Throughout the workshop, we will use real world examples and role plays to enhance study learning, keeping deliverables and effective time and resource management at the core of 21st century project management.
ILHM 550 GIS and Environmental Impact Assessment (3) This module has two major themes: Geographic Information Systems (GIS) and Environmental Impact Assessment (EIA). Through the
use of ArcGIS, the industry-standard in geographic data and mapping software, students will reckon with the implications of the environmental impact assessment. This is accomplished through GIS labs, using environmental impact assessment data and case studies to aid in depth and breadth of knowledge. Combining these two skills provides students with the theoretical and practical knowledge required to plan, conduct and report on environmental investigations, on behalf of private clients, construction firms, environmental agencies and for in-house heritage projects. The wide applicability of GIS and the EIA allows environmental, heritage and urban planning practitioners alike to effectively interpret the impact of projects on surrounding environments and landscapes, as well as glean information about patterns and locations that would otherwise be indistinguishable. GIS and EIAs are both essential skills for heritage managers in the 21st century, whether seeking employment or progression in a commercial archaeology capacity or looking to manage a range of heritage assets as part of a larger institution. Over the course of this module, students will become masters of generating compelling data maps and deriving impactful meaning from the evidence available at the click of a button. Pre-requisites: Graduate level course; all program entry requirements apply.
ILHM 595 Archaeological Field School (1) This is a one credit-hour course designed to introduce you to the methods used to collect and analyse archaeological data in a hands-on field setting. The course will take place over the span of one week at an ongoing archaeological dig at Harlaxton Manor and may include the investigation of a Neolithic ritual landscape, WWI training trenches or a range of unique and interesting components of a Victorian walled garden. Archaeological field methods include mapping using measuring tapes and compasses as well as total stations to record the locations of archaeological features and artifacts. Excavation includes both excellence in documentation and a range of hands-on recovery procedures. In addition, you will have the opportunity learn a great deal about the heritage of the English Midlands through specialist evening talks (optional) and direct engagement with local historians, volunteers and community groups. Note: Cross-listing with ARCH395. ILHM595 is available to upper level archaeology students wishing to enroll on this course at the graduate level.
ILHM 650 MAILHM Capstone (6) The Masters in Innovative Leadership in Heritage Management Capstone Project is designed to provide Masters students with an opportunity to demonstrate the integration and application of their learning throughout their program, through an applied research-based case study.
ILHM 651 Capstone Section 1 (2) The Masters in Innovative Leadership in Heritage Management Capstone Project is designed to provide Masters students with an opportunity to demonstrate the integration and application of their learning throughout their program, through an applied research-based case study. Section I is dedicated to the exploration and investigation of suitable case study topics for deeper student inquiry. Section II comprises the literature review process and analysis of the chosen case study. Section III brings the summative experience of the MA together in the production of a final piece of substantive work, presented in the form of a thesis, based around a students chosen case study.
ILHM 652 Capstone Project Section 2 (2) The Masters in Innovative Leadership in Heritage Management Capstone Project is designed to provide Masters students with an opportunity to demonstrate the integration and application of their learning throughout their program, through an applied research-based case study. Section $I$ is dedicated to the exploration and investigation of suitable case study topics for deeper student inquiry. Section II comprises the
literature review process and analysis of the chosen case study. Section III brings the summative experience of the MA together in the production of a final piece of substantive work, presented in the form of a thesis, based around a students chosen case study.

ILHM 653 Capstone Project Section 3 (2) The Masters in Innovative Leadership in Heritage Management Capstone Project is designed to provide Masters students with an opportunity to demonstrate the integration and application of their learning throughout their program, through an applied research-based case study. Section I is dedicated to the exploration and investigation of suitable case study topics for deeper student inquiry. Section II comprises the literature review process and analysis of the chosen case study. Section III brings the summative experience of the MA together in the production of a final piece of substantive work, presented in the form of a thesis, based around a students chosen case study.

## Management (MGT)

MGT 569 Entrepreneurship (3) Introduces students to the fundamental knowledge and skills that are required in order to conceive, develop, start, and grow a new business enterprise with focus on opportunity recognition and capture, start-up, operations, and identifying and addressing risk. Cross-listed with MGT 469. Pre-requisites: Student in MAILHM program

## Marketing (MKT)

MKT 574 Integrated Marketing Communications (3): Provides an examination of all elements of the marketing promotion mix - advertising, sales promotions, point-of-purchase communication, direct marketing communication, public relations and sponsorship marketing, and personal selling. Overview of market segmentation, appeals, budgets, evaluation and management of the promotion mix. Cross-listed with MKT 374. Pre-requisites: Student in MAILHM program

MKT 585 Digital Marketing (3) This course examines timely concerns at the intersection of marketing and technology. Topics include internet technology for marketers, online privacy and security issues, buyer behavior online, and digital marketing techniques such as banner advertising, advertising and participating in social media, search engine optimization, and mobile and email marketing. Pre-requisites: Student in MAILHM program

## Leadership (LDR)

LDR 505 Leadership Theory (3) This course examines leadership theory, concepts, and practice.Studentswillidentifyleadersandlead-ershipstylesandapplytheknowledgetobetterunderstandandpositivelyaffecttheirorganization, business,orinstitution.Self-reflection will beafocus oftheclass as students evaluatetheirleadershipstyles and practicestoidentify areas ofgrowthandpersonaldevelopment.

LDR 506 Ethics and Jurisprudence (3) Emphasizes ethical processes andtheirapplicationtoleadership.Includedareethicaldimensionsof thedecision-making processandcurrentethicalissues.Examinesthe relationship between legal and ethical issues.
LDR 508 Communication Across Organizations (3) This course will examineandanalyzecommunicationtheories in organizations. The student will study the principles of communication effectively used in high-functioning teams. The course will allow students to look at problemsincommunicationandhowitcaneffectively createchange across an organization of any size.
LDR 512 Organizational Behavior (3) Uses various organizational, managerial, and behavioral theories, concepts, and principles in analyzing, diagnosing, predicting, and guiding human behavior
within organizations committed to public service. Emphasizes motivation, leadership, change, communication, personality, group dynamics, and organization development.
LDR 514 Project Management (3) In this course, leaders will learn how to launch, lead, and support successful projects. Leaders will contrast traditional and modern project management concepts to formulate an ideal project management process for their specific organization with the freedom to create a custom framework. Concepts include leading projects, planning, motivating teams, problem-solving, change management, strategic management approaches, lean and agile project management methods to sponsor successful project plans from initial development through implementation. Project management skills are essential for every manager and leader in our modernized project-driven world.

LDR 525 Design Thinking for Organization Change (3) This course will explore the concepts of systems thinking and design thinking and apply them to complex problems facing organizations of all types.Knowledgeandskillsaredevelopedinholisticsystemsanalysis, empathy,problem-definition,ideation,rapid-prototyping,andexperimentation to foster innovation. Students will utilize collaborative, cross-disciplinaryapproachestotacklemulti-faceted problems and develop innovative solutions.
LDR 528 Financial Decision Making (3) Focuses on the acquisition, allocation, and management control of financial resources within organizations. Includes cost analysis, financial position analysis and strategies, reimbursement, pricing policies, budgeting, capital expenditure, analysis of financial reports, and informal and external controls. Emphasizes financial terminology and organization of financial statements. Requires analytical approach to ratio analysis and organization diagnostics.
LDR 530 Cultural Competence \& Leadership (3) This course examines the competencies needed to thrive as a culturally responsive leader, while fostering growth within a diverse organization. Course participants will learn to recognize personal and institutional biases associated with discrimination and acquire the knowledge and the skillset needed to lead cross-culturally.
LDR 540 Non-Profit Fundraising \& Practice (3) This course is designedforcurrentoraspirantmanagers,staff,andvolunteersinthe non-profitsectorwhowanttobecomefamiliarwiththefundamentals of fundraising. We will look at philanthropy on a global scale and within the United States. Key areas that will be covered are funding sources;motivationsforgiving;methods of giving;types offunding; and developing relationships.
LDR 541 Managing Non-Profit Organizations (3) This course will help students understand the important role non-profits play in the United States and the impact they have on communities. We will discuss the strengths, weaknesses, opportunities and threats for non-profits and their leaders. Key areas such as a mission statement, strategicplanning,boards, volunteers,andcareersinnon-profitorganizations will be covered.

LDR 542 Change \& Innovation in Non-Profit Organi (3) This course is designed for students who are interested in learning about innovation in a world that is steeped in history. While the non-profit worldtends tochangeslowly, recentinnovations areforcing change quickly. In this course we will discuss the major theories of change; thedifferencesbetweenpersonalchangeandorganizationalchange; the impact of organizational change on leaders; and innovations in the world of non-profits.

LDR 543 Strategic Planning \& Execution (3) This course examines the strategicdimensionsofleadership. Topics includeestablishinga
vision,strategicplanning, andimplementationofstrategicinitiatives. Students will examine strategic issues and apply their knowledge to positively affect their organization, business, or institution.
LDR 544 Non-Profit \& Social Media (3) Social Media is an ever-changing field and non-profits are embracing the media platformsforvarious reasons. Fromtelling yourstorythrough blogging, crowd funding, branding your non-profit, ensuring privacy, and creatingapps;thisclasswillmaneuverthevast world ofsocial media. We will use various platforms and speakers to discuss the tools of the tradeandhownon-profitorganizations canbestbenefitfrom them.
LDR 550 Critical Issues in Higher Education (3) This course will explore the academic, political, legal, governmental, financial, and otherinfluencersthathighereducationleadersareforcedtoconsider as they lead their institutions into the future. This course will build upon the content from the Policy and Historical Trends in Higher Education course, as well as the core leadership courses.
LDR 551 Student Services Support (3) This course focuses on the theoretical basis and bestpracticesinstudentservices inhighereducation with particular emphasis on financial aid, retention, recruitment,studentactivities,supportservicesandresidencelife.Students will develop an understanding of the changing demographics and characteristicsofcollegestudentsinrelationtoacademic,social,and physical needs.
LDR 552 Policy \& Historical Trends in Higher Ed (3) This course is designed to help you think about colleges and universities and the historical and social forces thathave affected their development (including policy decision) in the United States. Formal education, including post-secondary education, has been integral to the social andeconomic developmentoftheAmericanfreeenterprise system. The aim of the course is to provide a sound framework for using historical analysis to interpret problems, shape policy, and develop sound decision making.
LDR 554 Legal Aspects of Higher Education (3) This course investigatesthelegislationandlitigationwhichformsthebasisofeducation atthenational,state, andlocallevels.Studentswillexaminehistorical and current cases rendered by federal and state courts concerning procedural and substantive due process, civil rights, special populations, parent and student rights, and contractual legalities to help professionalshaveasoundknowledgeofthepertinentlegallandscape for leadership and decision making.
LDR 560 Health Systems \& Policy (3) The aim of this course is to provide students with an overview of the U.S. health care system, its components, and the policy challenges created by its organization. The course will focus on the major health policy institutions and importantissuesthatcutacrossinstitutions, including privateinsurers andthefederal/statefinancing programs. Attention willalsobegiven to disparities in access to care, the role of pharmaceuticals in health care and the pricing and regulation of the pharmaceutical industry, the quality ofacre, the challenges oflong-term care, and the aging of the population, and the drivers of cost growth. Spring.
LDR 561 Leading Creative Problem Solving (3) This course will explorehowleaderscanutilizeappliedcreativityandcreativeproblem solving within organizations. Systems thinking will be introduced to helpstudentsunderstandhowtocreatechangewithinanorganization or team. Students will examine creative problem solving styles and thewaystheyinfluencecreativeproblemsolving processes.Students will learn creative problem solving processes and facilitation skills necessarytodefinecomplexproblems,ideate,developsolutions,and create action plans in collaborative settings. Divergent and convergent thinking skills will be applied to enhance creativity and drive innovation.

LDR 562 Transforming Organizations to an Innovation Culture (3) In this course, leaders will learn how to put in place a reliable system throughwhichanentireorganization canengageseamlesslyininnovation.Leaders willlearnhowtoleveragetheinnovativecapacities of employeestogenerategrowth,seizeopportunities,driveefficiencies, and position their organizations well for the future.
LDR 570 Population-Based Health (3) This course presents selected information, concepts, and methods from the field of public health. Topics concerning the history, organization, financing, and services of the public health system are discussed. All topics are presented from a population-based perspective. Summer.
LDR 580 Programs, Problems, \& Policies (3) This course examines the myriad of programs and policies in public health via a developmental approach to learning about health problems. The course will cover a variety of topics, including state programs and policies, maternalandinfanthealth, programplanning, research,monitoring, and advocacy. Spring.
LDR 590 Decision Making (3) Examines decision making in leadership roles by extensive use of case studies. Material from other LDR courses is integrated into the study of decisions facing all types of organizations committed to leading and serving.
LDR 599 Capstone Project (3) This is an experiential learning course in which students complete real-world consulting projects for start-upsorexistingorganizations(business,non-for-profit,civic,oreducational).Allteamsareguidedbyacoach.Competenciesaredeveloped and refined in leading consulting projects, project management, teamwork, professionalinteraction,andcommunicationpresentation skills.Studentsdrawupondiverseteammemberstrengthstodeliver value on their projects. The Graduate Capstone course provides the studentwiththeopportunitytoapplytheskillsetsdevelopedthroughout the course of the program. The student will work in cross-disciplinaryteamstodeveloprecommendationsforclientson real-world issues. This experience will allow the student to enhance his or her critical thinking, leadership, teamwork, and communication skills. The Capstone projects vary in focus and are based upon the specific needs ofclientandtheprofessionaldevelopmentneeds ofthestudent. This experience is designed to excite, challenge, and exhilarate the studentwithaviewofhowtoenhancehisorherskillsforprofessional effectiveness.

## Physical Therapy (PT)

Enrollment is limited to students admitted to the Doctor of Physical Therapy program. All summer semester courses in the second and third years of the professional program are prerequisites for courses offered in the fall semester of that year. Fall courses are prerequisites for spring offerings.
PT 505: Human Physiology (4) This course focuses on the aspects of human physiology that are most important to build a basic science foundation for future clinical practice. The focus is that all disease and injury to the human body is a deviation from normal anatomy and physiolgy. Material will focus on normal physiology (and some anatomy) and clinically relevant pathophysiology to set a foundation for future clincial courses. Instruction will introduce how clinicians use breaks in homeostasis to diagnosis and treat disease.
PT 510 Foundations in PT (2) This course introduces the foundational proficiencies necessaryforpracticeintheprofessionofphysical therapy.Topicsincludebodymechanics, elementsofdocumentation (initial encounter, daily note, re-examination, discharge summary),
effects of inactivity, foundations of therapeutic exercise, infection control, mobility training, patient/client equipment, patient/client stress, positioning andturning, posturepreparationforpatient/client care, proprioceptive neuromuscular facilitation trunk and extremity patterns, range of motion exercise, stretching exercise, transfer training,vitalsigns,wheelchairs,andwoundmanagement.Principles from the Guide to Physical Therapist Practice are incorporated into the courseand written documentation, as suggested bytheguide, is utilized for specific lab activities. Students participate in initial field experiences in an acute care, inpatient rehabilitation, and pediatric facility. Prerequisite: PT 541.
PT 510L Foundations in PT Lab (0) Lab that accompanies PT 510, Foundations of Physical Therapy.
PT 512 Physical Interventions (2) This lecture/lab course provides the student with an introduction to the therapeutic modality and otherphysicalinterventionskillscommonlyencounteredinphysical therapy practice.Thecoursecoversthehealing process, painmechanisms,indications/contraindication, and physiologicaleffectsofeach intervention in a lab/lecture experience. The primary interventions coveredincludeelectricalstimulation, hydrotherapy,softtissuemassage, cryotherapy,thermal modalities, electromagnetic modalities, ultrasound, traction, and compression. Prerequisite: PT 541.
PT 512L Physical Interventions Lab (0) Lab that accompanies PT 512, Physical Interventions.
PT514Foundations of Therapeutic Exercise (2) This course provides thestudentwithanintroductiontocommonlyprescribedtherapeutic exerciseinterventions.Anemphasiswillbeplacedonunderstanding therapeuticexercisefromamotorcontrol perspective and how pain affects motor control and patterns of movement. Progression of fundamentalexercisesthroughtheneurodevelopmental posturesas theyrelatetocommonimpairmentsfoundintheoutpatientphysical therapy setting will be covered. Students will learn the purpose of eachtherapeuticexercisetechniqueanddemonstrateapplicationand critical thinking skills through practical experiences in preparation for future patient management courses. Prerequisite: PT 541.
PT 514L Foundations of Therapeutic Exercise Lab (0) Lab that accompanies PT 514, Foundations of Therapeutic Exercise.
PT 517 Test \& Measurements (2) Introduces the basic procedures for objective assessment of the musculo-skeletal system through measurement of joint range of motion (ROM) and muscle strength. Laboratory sessions willallow practice in thetechniques of goniometry and manual muscle testing (MMT). Inclinometers, hand held dynamometers and isokinetic testing are introduced. Prerequisite: PT 541. Spring.
PT 517L Tests \& Measurements Lab (0) Lab that accompanies PT-517, Test \& Measurements
PT 521 Patient Management I: Musculoskeletal (8) Initiates patient management sequence. Expands upon the anatomical, kinesiological, and therapeutic exercise principles presented in previous courses. Emphasis on examination and assessment of the musculoskeletal system. Common conditions and impairments are presented and reinforced through use of case examples. Appropriate interventions are addressed conceptually and performed in the laboratory. Addresses concepts and techniques related to proprioceptive neuromuscular facilitation. Medical documentation integrated into laboratory activities and assignments. Experiential opportunities included. Prerequisite: PT 541. Spring.
PT 521L Patient Management I Lab (0) Lab that accompanies

PT-521, Patient Management I: Musculoskeletal
PT 523 Wellness in Physical Therapy (2) This course address issues related to wellness and overall health and fitness promotion from a physicaltherapyperspective.Areas oflearningwillincludeintroductiontocommonfitnessandwellnessprograms,nutrition,balanceand movementscreening, andapplicationoftransitionfromrehabilitation to encouraging behavior change promoting lifelong wellness. This course, when completed in addition to PT 451/551 and PT 452/552, meetsthecriteriaforthegeneraleducationcapstoneoutcomeaswell as one writing-intensive course. Prerequisite: PT 541.
PT 531 Gross Anatomy (5) For students in the physical therapy program. Emphasis on gross anatomy of the human skeleton, muscular, vascular,andnervoussystems.Knowledgeofgrossanatomyprovides students with a sound foundation upon which other courses in the physical therapy curriculum can directly or indirectly be related. Content presented in a regional approach, and includes anatomical concepts such as proper terminology, surface anatomy, and joint function. Gross anatomy is best learned in the laboratory through dissection ofthe human body.Course is primarily a laboratory experience. Prerequisite: PT 541.
PT 531L Gross Anatomy Lab (0) Lab that accompanies PT-531, Gross Anatomy
PT 532 Kinesiology (3) Introduces the elements and principles basic to the study of human movement. It combines the disciplines of biomechanics, physiology, and anatomy to analyze functional movements, balance, and gait. Discusses concepts of kinetics, kinematics, length-tension relationships, and the functional significance of the structure of biological tissues. Emphasizes clinical application of mechanical concepts. Prerequisite: Acceptance into the DPT program. Summer.
PT 533 Human Growth \& Development (3) Presents typical human development from conception to death including functional changes in posture and movement. Presents processes of growth, maturation, adaptation, motor control, and motor learning. Discusses concepts of critical period, health risk, physiologic reserve, and senescence. The relationship of physical, cognitive, and social theories of human development and age-related system changes are given. Views motor behavior across life span within a social and psychological context. Prerequisite: Acceptance into the DPT program. Summer.
PT534 Medical Pathology I(2) Explores consequences of disruption in normal physiological and developmental processes. Common diseases and disorders involving all major body systems addressed, aswellasselectedsystemicdiseases. Topicsincludediseases ofinfectious,immunesystem, traumatic, degenerative,andcongenitalorigin. Focuses on pathogenesis, clinical presentation, laboratory findings, prognosis, medicalinterventionincluding pharmacologicalagents, and implications related to physical therapy practice. Prerequisite: PT 541. Fall.
PT 536 Medical Pathology II (2) This course explores the consequences of disruption in normal physiological and developmental processes.Commondiseases,disordersandsyndromesinvolvingthe neurologicalbodysystemsareaddressed,aswellasselectedsystemic diseases. Topics include diseases of an infectious nature, immune systemdeficiencyanddegenerativeorigin.Thecoursefocusesonthe pathogenesis, clinical presentation, laboratoryfindings, prognosis, medical intervention including pharmacologic agents and implications relatedtophysicaltherapypracticeinregardstotheneurological body system. Prerequisite: PT 541. Spring.

PT 541 Clinical \& Professional Issues I: Introduction (2) First in seriesofclinicaland professionalissuescourses.Providesintroduction toprofessionalpracticeexpectationsofphysicaltherapy.Providesorientationandstrategiesforsuccessintheprofessional program.IntroductiontoAmericanPhysicalTherapyAssociation.Studentsexplore the practice of physical therapy utilizing the Guide to Physical Therapist Practice and the core values of the profession. Introduction to professionalethicsandcommunication requiredin professionalrelationships. Prerequisite: Acceptance into the DPT program. Summer.
PT 542 Clinical \& Professional Issues II: Adult Learning Principles (1) Second in series of four clinical and professional issues courses. Focuses on physical therapist's role as an educator and developing one'sowncultural competence.Providesintroductiontofederal programs, including Medicare and Medicaid. Prerequisite: PT 541. Fall.
PT 551 Scientific Inquiry I: Stats \& Research (2) This is the first in a series offivecoursesdesignedtopreparethegraduatetopracticeinan evidence-basedmannerandtobeanastuteconsumerandjudgeofscientificresearch.Topicsincludefundamentalsofclinicalrehabilitation researchincludingevidence-based practice,searchingtheliterature, and research ethics. Fundamentals of clinical research approaches includevariablerecognition, research validity,measurementtheory, reliability, responsiveness, and validity.Basicstatistical proceduresto assess mean differences as wellas inferencetesting are covered. This course, when completed in addition to PT 452/552 and PT 423/523, meetsthecriteriaforthegeneraleducationcapstoneoutcomeaswell as one writing-intensive course. Prerequisites: PT 541. Fall.
PT 552 Scientific Inquiry II: Critical Appraisal (3) This is the third in a series of four courses designed to prepare the graduate to practice in an evidence-based manner and to be an astute consumer and judge of scientific research. Topics include experimental research design (single subject design, group designs) data analysis (statistical reasoning, basic and advanced statistical analysis of relationships, basic and advanced statistical analysis of differences), non-experimental research (introduction to non-experimental research, clinical reports, qualitative research, outcomes research, survey research), and evaluation, synthesis, and implementation of research. Prerequisite: PT 541. Spring.
PT 622 Patient Management II: Cardiovascular and Pulmonary (3) Applies principles ofrehabilitationscienceto patientswith disorders of the cardiovascular or pulmonary systems. Topics include pathophysiology, patient assessment, medical and surgical management of disease, and safety aspects. The course emphasizes the design, implementation, and administration of a team-based approach to cardiovascularandpulmonaryrehabilitationanddiseaseprevention. Prerequisite: PT 441 or 541. Spring.
PT 622L Patient Management II: Cardiovascular and Pulmonary Lab (0) Applies principles of rehabilitation science to patients with disordersofthecardiovascularorpulmonarysystems.Topicsinclude pathophysiology, patientassessment,medicalandsurgicalmanagementofdisease,andsafetyaspects.Thecourseemphasizesthedesign, implementation, and administration of a team-based approach to cardiovascularandpulmonaryrehabilitationanddiseaseprevention. Prerequisite: PT 441 or 541 . Fall.
PT 623 Patient Management III: Multiple Systems (4) Studies physicaltherapymanagementofpatientswithamputations,integumentary and oncologic disorders, as well as acute and chronic disorders seen in theolder adult. Student expected to discuss the medical, surgical, and pharmacologicalmanagementoftheseconditions.Emphasison problem solving with material presented in module format. Labo-
ratoryactivitiesincludebalanceassessment, woundassessmentand management,lymphedemainterventionsincludingbandaging, geriatric screening, functional assessments, and exercise for the elderly. Concepts associated with limb amputations and prosthetic devices addressed in laboratory setting. Students participate in an observational experience in a prosthetic clinic, as well as at a health care facility specializing in wound care. Prerequisite: PT 441 or 541. Fall.

PT 623L Patient Management III: Multiple Systems Lab (0) Studies physicaltherapymanagementofpatientswithamputations, integumentary and oncologic disorders, as well as acute and chronic disordersseenintheolderadult.Studentexpectedtodiscussthemedical, surgical, and pharmacological management of these conditions. Emphasis on problem solving with material presented in module format. Laboratory activities include balance assessment, wound assessmentandmanagement,lymphedemainterventionsincluding bandaging, geriatricscreening,functionalassessments, andexercise fortheelderly.Conceptsassociated withlimbamputations and prosthetic devices addressed in laboratory setting. Students participate in an observational experience in a prosthetic clinic, as well as at a health care facility specializing in wound care. Prerequisite: PT 441 or 541. Fall.

PT 626 Patient Management V Neuromuscular (7) Studies physical therapy management of the patient with neurologic dysfunction, including stroke, traumatic brain injury, spinal cord injury, and multipleprogressiveneurologicconditions.Pathology,etiology, and natural history of these disorders are presented intandem with their medical, surgical, and pharmacological management. Students are expectedtobeabletoexamineandevaluatepatientswithneurological dysfunctionbyselectingappropriatetestsandmeasures, developing efficaciousplansofcare,implementingtherapeuticinterventions, and documentingusingthebestevidence. Studentsarealsoexpectedto provide a rationale for all decisions made as part of this patient management process, including selection of appropriate outcomemeasures. Experiential opportunities, clinical simulations, role playing, small group learning activities, and video demonstrations are used with problem-solving exercises to reinforce mastery of the material. Prerequisite: PT 441 or 541. Spring.
PT 626L Patient Management V Lab (0) Studies physical therapy management of the patient with neurologic dysfunction, including stroke, traumatic brain injury, spinal cord injury, and multiple progressive neurologic conditions. Pathology, etiology, and natural historyofthesedisordersarepresentedintandem withtheirmedical, surgical, and pharmacologicalmanagement.Studentsareexpected to be able to examine and evaluate patients with neurological dysfunction by selecting appropriate tests and measures, developing efficaciousplansofcare,implementingtherapeuticinterventions, and documentingusingthebestevidence. Studentsarealsoexpectedto provide a rationale for all decisions made as part of this patient management process, including selection of appropriate outcomemeasures. Experiential opportunities, clinical simulations, role playing, small group learning activities, and video demonstrations are used with problem-solving exercises to reinforce mastery of the material. Prerequisite: PT 441 or 541. Spring.
PT630Rehabilitation Pharmacology (2) Presents basicaspects ofthe mechanism of action of drugs commonly employed in the practice ofrehabilitation.Fundamental principlesofdrugactionarefollowed by an in-depth discussion of specific drugs used. Topics include pharmacokinetics, pharmacodynamics, pharmacoeconomics,drug interactions, polypharmacy, andadversedrugreactions. Prerequisite: PT 441 or 541.

PT 631 Neurobiology (3) Lecture-lab. Normal development of the brainandspinalcordandthegrossanatomyofthesestructuresexamined. Laboratory provides opportunity to study human specimens andmodelstogainathree-dimensionalunderstandingofthecentral nervous system during first part of course. Subsequently, pathways andassociated structures thatmediategeneral sensory, special sensory, autonomic, andsomaticmotorfunctions aredescribedandthe consequencesoflesionsofthesepathwaysdiscussed.Prerequisite:PT 441 or 541 . Fall.
PT 631L Neurobiology Lab (0) Lecture-lab. Normal development of the brain and spinal cord and the gross anatomy of these structures examined.Laboratory provides opportunity to study human specimens and models to gain a three-dimensional understanding of the centralnervoussystemduringfirstpartofcourse.Subsequently,pathways andassociatedstructuresthatmediategeneralsensory,special sensory, autonomic, and somaticmotorfunctionsaredescribedand theconsequences oflesionsofthesepathwaysdiscussed. Prerequisite: PT 441 or 541. Fall.

PT 632 Medical Imaging (2) Covers basic principles of diagnostic imaging pertinenttoclinical practice.Familiarizesstudentwithmagneticresonanceimaging, computedtomography, ultrasonography, and plainfilmstudiesofthespineandextremities.Studentsviewand interpretnormalandabnormalimagesforthesemodalities.Student examines research relatedtodiagnosticimaging with regardtosensitivity, specificity, and correlation with clinical findings. Prerequisite: PT 441 or 541. Corequisite: PT 626. Fall.
PT 641 Clinical \& Professional Issues II: Ethics (1) Continuation of clinical and professional issues course sequence which encourages value clarification and ethical decision making and its relationship to health care. Various situations, dilemmas, and individuals utilized to represent topics discussed. Topics intended to develop and heighten awareness of dilemmas faced by health care providers and their patients. Lecture. Prerequisite: PT 441 or 541. Fall.

PT 642 Clinical \& Professional Issues IV: Advocacy and Cultural Competency (2) Designed to promote importance of political and socialadvocacy.Contentrelatedto professionaleducation,outcomes assessment,andconsultationaddressed.Studentsexploreprofession's core value of social responsibility and provide evidence of their own involvement in the community and political arena. Prerequisite: PT 441 or 541. Spring.
PT 643 Leadership \& Administration (3) Examines leadership and administration theories and practice that are specific to physical therapy and rehabilitation. Practical implementation of this information is emphasized with the students actively involved in the processes ofstrategic planning, marketing, supervising, budgeting, effectivedocumentation, and balancinghumanandfiscalresources within health care environments. Additional leadership concepts of motivation, communication, groupdynamics, managingchange,and organizational development are explored in depth. Prerequisite:PT 441 or 541. Spring.
PT 644 Behavioral Psychology (3) Draws together theoretical constructsofpsychology, neuropsychological, and behavioralmedicine to help explain the etiology of expected behavioral and emotional responses to compromised motor function and neurologic impairment typically experienced by patients in physical therapy rehabilitation and to provide guidance in management of these patients. Prerequisite: PT 441 or 541. Spring.
PT 651 Scientific Inquiry III (2) This course is the third in a series
of five courses designed to prepare the graduate to practice in an evidence-based manner and to be an astute consumer and judge of scientificresearch.Topicsincludeexperimental researchdesignsuch as single-subject and group designs, sampling theories, descriptive and survey research, clinical case reports, qualitative research and outcomes research. Prerequisite: PT 441 or 541. Fall.
PT 652 Scientific Inquiry IV (2) This course is the fourth in a series of five courses designed to prepare the graduate to practice in an evidence-based manner and to be an astute consumer and judge of scientific research. Topics include critical appraisal of research relatedinjuryrisk,harm, prognosisstudiesandsystematicreviewsare emphasized.Studentcompletecriticalappraisalsofpublishedresearch in a written format and present their appraisals orally. Prerequisite: PT 441 or 541. Spring.
PT 661 Clinical I (5) Active participation in this full-time clinical courseemphasizesdevelopmentofprofessionalbehavior,writtenand verbal communicationskills, and evaluation, examination, andinterventions previously addressed in didactic course work. Emphasizes physicaltherapymanagementofmusculoskeletalconditions.Prerequisite: PT 441 or 541. Summer.

PT 670 Special Topics in Physical Therapy (1) This course provides students who have a special interest in furthering their skills in the orthopedic physical therapy setting with advanced diagnostic and treatment interventions. An emphasis will be placed on identifying meaningful impairments hindering functional movement patterns andutilizing appropriatemanualtherapyandmotorcontrolexercise interventionstoimprovemovementquality.Throughlectureandlaboratoryexperiencesthestudentswillbeabletodiagnosismovement patternlimitationsandcreateappropriatetreatmentprogressionsasit relates to their physical therapy evaluation.
PT 724 Patient Management IV: Pediatrics (3) Studies the physical therapy management of children with developmental disabilities. Presentsexaminationandevaluationofinfantsandchildren withspecificcongenitalandacquireddisorders.Topicscoveredincludefamily centered care, service delivery models, and service delivery settings including but not limited to early intervention, schools, acute care andrehabilitation.Laboratoryactivitiesincludemovementanalysis, handling and positioning, developmental activities, use of adaptive equipment, and use of orthoses. Actual patient and video demonstrationsareused when possiblealong with experiential and service learning, casestudies, andtreatmentplanningactivities. Prerequisite: PT 441 or 541. Spring.
PT 724L Patient Management IV: Pediatrics Lab (0) Studies the physicaltherapymanagementofchildren withdevelopmentaldisabilities. Presentsexaminationandevaluationofinfants andchildren withspecificcongenitalandacquireddisorders.Topicscoveredincludefamily centered care, service delivery models, and service delivery settings including but not limited to early intervention, schools, acute care andrehabilitation.Laboratoryactivitiesincludemovementanalysis, handling and positioning, developmental activities, use of adaptive equipment, and use of orthoses. Actual patient and video demonstrations are used when possiblealong with experiential and service learning, casestudies, andtreatmentplanningactivities. Prerequisite: PT 441 or 541. Spring.
PT 726 Patient Management VI: Integrated Musculoskeletal (5) Builds on previously acquired examination and intervention skills relatedtomusculoskeletalpatientmanagement.Emphasisonexamination and subsequent evaluation leading to the physical therapy diagnosis for the adult and athletic population. Covers, in detail, evi-
dence-basedinterventionsemphasizingmanualtherapyandtherapeutic exercise in lecture and laboratory sessions. Includes examination and intervention models utilized in contemporary clinical practice such as functional movement training, and McKenzie. Specific techniques include muscle energy, neural mobilization, trigger points, jointmobilization/manipulation, andsegmentalstabilizationforthe spine.Therapeuticexerciseandsport-specific progressionsaddressed in relation to commonly encountered physical impairments. Master clinicians and physicians share expertise through classroom and laboratorypresentations relatedtoeachtopiccovered.Studentslearn to utilize these concepts and techniques to develop comprehensive patientmanagement programs.Students may participate in an athletic event coverage observational experience. Prerequisite:PT441 or 541. Fall.
PT 726L Patient Management VI: Integrated Musculoskeletal Lab (0) Buildson previouslyacquired examination and interventionskills relatedtomusculoskeletal patientmanagement.Emphasisonexamination and subsequent evaluation leading to the physical therapy diagnosis for the adult and athletic population. Covers, in detail, evi-dence-basedinterventionsemphasizingmanualtherapyandtherapeutic exercise in lecture and laboratory sessions. Includes examination and intervention models utilized in contemporary clinical practice such as functional movement training, and McKenzie. Specific techniques include muscle energy, neural mobilization, trigger points, jointmobilization/manipulation, andsegmentalstabilizationforthe spine.Therapeuticexerciseandsport-specific progressionsaddressed in relation to commonly encountered physical impairments. Master clinicians and physicians share expertise through classroom and laboratorypresentationsrelatedtoeachtopiccovered.Studentslearn to utilize these concepts and techniques to develop comprehensive patientmanagement programs.Students may participate in anathletic event coverage observational experience. Prerequisite: PT441 or 541. Fall.
PT 727 Community Health (2) Expands the students' knowledge and experiences in the areas of health pro- motion, wellness, and autonomous care. Students will analyze and identify health needs anddevelopandimplementacommunity-basedhealth promotion, prevention, or wellness program. Areas of learning include physical therapist's role in developing and marketing community wellness pro-grams. Additionally,students examinehealth-relatedissuesfor individuals of varying races and ethnicities, national origin, and sexual orientation. Prerequisite: PT 441 or 541 . Fall
PT728 Advanced Screening and Differential (3) Enables students to functionasindependenthealthcareproviderswiththeabilitytoidentifysignsandsymptomsthatfalloutsidethescopeofphysicaltherapy practiceandtoreferclients appropriatelytoadditional medical care. Addressesstrategiestoidentifysourceofvarioussignsandsymptoms. Tools used in course include questionnaires based on presenting symptoms.Questionnairestobeusedasaguideinhistory-takingand inter-practitioner communication. Prerequisite: PT 441 or 541. Fall.
PT 730 Management of the Patient with Complex Diagnoses (3) This course is designed to enhance the diagnosis and management skills of physical therapy students within the multi-disciplinary healthcare environment for individuals with complex diagnoses. This includes deepening the students knowledge of pathology, precautions, and clinical application for patients with complex diagnoses requiring advanced treatment strategies and clinical reasoning. An emphasis will be on patients with primary diagnoses of neurological, musculoskeletal, cardiopulmonary, and integumentary conditions that may occur due to trauma and/
or multiple diagnoses. Through lecture and laboratory experiences the students will be able to evaluate patients with multiple systems diagnoses and create appropriate treatment progressions as it relates to their physical therapy plan of care.
PT 742 Clinical \& Professional Issues III: Transition to Practice (2) This course is the culmination of the series of clinical and professional issues courses. The course is focused on the processes involved in the transition from student to new professional. Content includes career planning topics such as interviewing, résumé building, and professional licensure as well as opportunities and responsibilities of the new professional. The importance of becoming a high-performance, well-balanced professional will be emphasized. Prerequisite: PT 441 or 541. Fall.
PT 751 Scientific Inquiry IV (2) This is the last in a series of courses designed to prepare the graduate to practice in an evi-dence-based manner and to be an astute consumer and judge of scientific research. This course is completed concurrently with Physical Therapy 762, Clinical III and Physical Therapy 763, Clinical IV. Students pose answerable clinical questions germane to their current clinical environment related to diagnosis, prognosis, and intervention; search the literature for the current best evidence; and complete a critical appraisal of the evidence. Prerequisite: PT 441 or 541 Corequisites: PT 762, 763.
PT 761 Clinical II (5) Full-time clinical experience emphasizes examination, evaluation, and management of patients with neurologic, neuromuscular, cardiopulmonary, or integumentary disorders. Further development of professional interaction skills and written and verbal communication addressed. Prerequisite: PT 441 or 541. Summer.
PT 762 Clinical III (5) Full-time clinical experience assists student in achieving clinical competence as an entry-level physical therapist. Student examines and evaluates patients, and designs, implements, and analyzes a physical therapy plan of care. Includes documentation of test results and patient progress. Can occur in an outpatient, acute care, or rehabilitation setting. Student can manage musculoskeletal, neuromuscular, neurologic, and geriatric pathologies, as well as developmental disabilities and cardiopulmonary dysfunction. Prerequisite: PT 441 or 541. Corequisites: PT 751, 763. Spring.
PT 763 Clinical IV (5) Full-time clinical experience completes achievement of clinical competence as an entry-level physical therapist. Student examines and evaluates patients, and designs, implements, and analyzes a physical therapy plan of care as an entry-level practitioner. Professional communication and socialization further developed. Clinical experience can occur in an outpatient, acute care, rehabilitation, or specialized setting. Prerequisites: PT 441 or 541. Corequisites: PT 751, 762. Spring.

## Physician Assistant (PA)

Enrollment is limited to students admitted to the Physician Assistant program. All previous semester courses are prerequisites for courses offered in the following semester.
PA 511 Human Physiology (4) This course focuses on the aspects of human physiology that are most important to build a basic science foundation for future clinical practice. The focus is that all disease and injury to the human body is a deviation from normal anatomy and physiology. Material will focus on normal physiology (and some anatomy) and clinically relevant pathophysiology to set a foundation for future clinical courses. Instruction will introduce how clinicians use "breaks" in homeostasis to diagnosis and treat disease. This course material is linked to PA 530 Diagnostic tests and PA 531 Medical Imaging.

PA 512 Anatomy (5) This course is a lecture and laboratory based course which introduces the graduate level health profession student to the external and internal macroscopic anatomy of the human body. This course includes a virtual dissection lab component with particular interest in clinical correlations and implications as well as clinical imaging studies. Spatial relationships of structures and how these relationships relate to clinical presentation and basic pathology will also be explored.
PA 520 Pharmacology (4) The goal of pharmacology is to appreciate the principles of drug absorption, distribution, metabolism, excretion and the mechanisms of drugs to enable the rational use of effective agents in the diagnosis and treatment of disease. Major emphasis is placed on mechanism of action, indications, adverse effects, drug interactions.
PA 530 Diagnostic Tests (3) This course focuses on common medical diagnostic tests used to help diagnose a variety of medical conditions. Students will learn normal values and abnormal values to interpret basic primary care diagnostic tests. Students will begin foundational work on using laboratory findings to build differential diagnosis, and monitoring of disorders commonly found in clinical practice. The course sequence is paired with PA 510 (Human Physiology).
PA 531 Medical Imaging (1) This course focuses on exploring the methodologies of common medical imaging modalities used in clinical practice such as radiographs, computed tomography, magnetic resonance imagining and ultrasound. Emphasis will be placed on determining when to use each of these modalities, identifying anatomical structures on each of the modalities, and basic interpretation skills.
PA 532 12-Lead EKG (1) This course will provide the physician assistant student with the basic understanding of electrocardiography and how it is measured. Students will learn how to interpret a 12-lead electrocardiogram (EKG) for heart rates, rhythms, blocks, injury, ischemia and infarction. Students will also learn how to identify effects of drugs, electrolytes disorders, pacemakers or other systemic disease processes.
PA 540 The PA Profession (3) This course will introduce the physician assistant student to topics related to the physician assistant profession as well as health care delivery systems and health policy. Instruction will cover the role of the PA and relationship with other healthcare providers, historical aspects of the PA profession, professional organizations, and policy, laws and regulations regarding professional practice and conduct. Instruction will also cover professional wellness, patient advocacy and safety, and professional conduct.
PA 541 Medical Ethics (1) This course covers the instruction in principles and practice of medical ethics. It will provide a method and examples for identifying, analyzing, and resolving ethical issues in clinical medicine. Additionally, in-depth discussions will examine a wide variety of ethical dilemmas encountered in health and medicine. These will be used to help students apply a structured approach.
PA 544 Cultural Competence and IPE (2) This course covers the core cultural competencies for physician assistant students within the domains of knowledge, professional attitude and skills. Culture competence in health care combines the tenets of patient/family-centered care with an understanding of the social and cultural influences that affect the quality of medical services and treatment provided. This course also focuses on interprofessional education (IPE). It provides the knowledge and skills that foster professional development and team participation in the
interdisciplinary healthcare environment.
PA 545 Introduction to Clinical Practice (2) This course will provide early exposures to the healthcare system, patients and professional communication. The primary tenet of this course is to prepare students for future transition into clinical thinking and clinical exposures. In addition, this course will introduce students to medical documentation and history taking skills.
PA 610 Medical Literature and EBM (3) This course is designed to expose students to some of the most common study designs found in the medical literature (Review/meta-analysis, correlational, case series, cross-sectional, case-control, cohort, experimental, qualitative) and the associated statistical analysis within the clinical environment. A focus is to prepare students to develop and apply the principles of research design within populations to enable an independent critical appraisal of the medical literature. The second part of the class focuses on Evidence-Based Medicine and its application in clinical practice and with patients. Research skills developed in this course emphasize a systematic and scientific approach to problem solving.
PA 621 Behavioral Health (3) This course examines the various social and behavioral sciences domains. A focus is on diagnosis, treatment and prevention of psychiatric/behavioral conditions using the DSM-V as a guide. Additionally, normal and abnormal development across the life span is covered. This includes detection and treatment of substance abuse, human sexuality, issues in death, dying and loss; response to illness, injury and stress; principles of violence identification and prevention.
PA 622 Clinical Medicine I (4) This course is the first of a threepart series covering clinical medical care across the life span from prenatal through elderly to include preventive, emergent, acute, chronic, rehabilitative, palliative and end-of-life care. The course focuses on the general findings, disease etiology, clinical findings (signs and symptoms, tests, etc.), differential diagnosis and non-pharmacologic management of specific disease states.

PA 623 Therapeutics I (4) This course is the first of a two part series covering therapeutic interventions on the clinical disease topics covered in the Clinical Medicine Course Series. This course is specifically paired with the disease topics covered in PA 622 (Clinical Medicine 1). These interventions will cover therapeutic care across the life span from prenatal through elderly to include preventive, emergent, acute, chronic, rehabilitative, palliative and end-of-life care. Focus will be on drug class, indication, contraindications, dosing, adverse reactions, drug interactions, safety/ monitoring, pharmacology, cost, compliance, and alternatives. These course topics will be paired with PA 624 (Clinical Medicine II) for pharmacologic interventions.

PA 624 Clinical Medicine II (5) This course is the second of a threepart series covering clinical medical care across the life span from prenatal through elderly to include preventive, emergent, acute, chronic, rehabilitative, palliative and end-of-life care. The course focuses on the general findings, disease etiology, clinical findings (signs and symptoms, tests, etc.), differential diagnosis and non-pharmacologic management of specific disease states. These course topics will be paired with PA 623 (Therapeutics 1), for pharmacologic interventions.
PA 625 Therapeutics II (3) This course is the second of a two part series covering therapeutic interventions on the clinical disease topics covered in the Clinical Medicine Course Series. This course is specifically paired with the disease topics covered in PA 624 (Clinical Medicine 2). These interventions will cover therapeutic care across the life span from prenatal through elderly to include
preventive, emergent, acute, chronic, rehabilitative, palliative and end-of-life care. Focus will be on drug class, indication, contraindications, dosing, adverse reactions, drug interactions, safety/ monitoring, pharmacology, cost, compliance, and alternatives. These course topics will be paired with PA 626 (therapeutic II) for pharmacologic interventions.
PA 626 Clinical Medicine III (5) This course is the third of a three-part series covering clinical medical care across the life span from prenatal through elderly to include preventive, emergent, acute, chronic, rehabilitative, palliative, and end-of-life. The course focuses on teh general finding, disease etioogy, clinical findings (signs and symptons, tests, ect.), differential diagnosis and non-pharmacologic mangaement of specific disease states. These course topics will be paired with PA 625 (therapeutic II) for pharmacologic interventions.
PA 632 History and Physical Exam I (3) This course is the first of a two part series teaching physician assistant students how to perform an accurate and thorough history and physical exam to be able to make diagnostic and therapeutic decisions. Students will learn medical documentation for a full H\&P and incorporate this knowledge to develop diagnosis, differential diagnosis and treatment plans. Interpersonal communication skills and professionalism will be emphasized in the instruction of all patient encounters. Students will also learn about patient instruction, education and treatment plans.
PA 633 History and Physical Exam II (3) This course is the second of a two part series teaching physician assistant students how to perform an accurate and thorough history and physical exam to be able to make diagnostic and therapeutic decisions. This course
PA 706 Supervised Clinical Practice 6 (4) This course series is designed to provide students with an exposure and experiences in a specific clinical setting. The goal is for students to gain exposure to the approach to patients in a wide variety of clinical settings. The clinical year supervised clinical practice encounters (SCPE) are designed to expose professional phase PA students to a variety of patients across the lifespan (infant, children, adolescent, adult, elderly) in a variety of levels of care (emergent, acute, chronic, preventive). There are nine required SCPEs that are a part of this course series (family medicine, internal medicine, pediatrics, women's health, community mental health, emergency medicine, general surgery and an elective). With the guidance of the clinical preceptor, students will perform history and physical exams, obtain diagnostic testing and develop differential diagnosis/treatment plans. Students will learn to communicate effectively with medical providers, preceptor, patients and family members. Student may perform procedures at the discretion of the preceptor.
PA 707 Supervised Clinical Practice 7 (4) This course series is designed to provide students with an exposure and experiences in a specific clinical setting. The goal is for students to gain exposure to the approach to patients in a wide variety of clinical settings. The clinical year supervised clinical practice encounters (SCPE) are designed to expose professional phase PA students to a variety of patients across the lifespan (infant, children, adolescent, adult, elderly) in a variety of levels of care (emergent, acute, chronic, preventive). There are nine required SCPEs that are a part of this course series (family medicine, internal medicine, pediatrics, women's health, community mental health, emergency medicine, general surgery and an elective). With the guidance of the clinical preceptor, students will perform history and physical exams, obtain diagnostic testing and develop differential diagnosis/treatment plans. Students will learn to communicate
effectively with medical providers, preceptor, patients and family members. Student may perform procedures at the discretion of the preceptor.
PA 708 Supervised Clinical Practice 8 (4) This course series is designed to provide students with an exposure and experiences in a specific clinical setting. The goal is for students to gain exposure to the approach to patients in a wide variety of clinical settings. The clinical year supervised clinical practice encounters (SCPE) are designed to expose professional phase PA students to a variety of patients across the lifespan (infant, children, adolescent, adult, elderly) in a variety of levels of care (emergent, acute, chronic, preventive). There are nine required SCPEs that are a part of this course series (family medicine, internal medicine, pediatrics, women's health, community mental health, emergency medicine, general surgery and an elective). With the guidance of the clinical preceptor, students will perform history and physical exams, obtain diagnostic testing and develop differential diagnosis/treatment plans. Students will learn to communicate effectively with medical providers, preceptor, patients and family members. Student may perform procedures at the discretion of the preceptor.
PA 709 Supervised Clinical Practice 9 (4) This course series is designed to provide students with an exposure and experiences in a specific clinical setting. The goal is for students to gain exposure to the approach to patients in a wide variety of clinical settings. The clinical year supervised clinical practice encounters (SCPE) are designed to expose professional phase PA students to a variety of patients across the lifespan (infant, children, adolescent, adult, elderly) in a variety of levels of care (emergent, acute, chronic, preventive). There are nine required SCPEs that are a part of this course series (family medicine, internal medicine, pediatrics, women's health, community mental health, emergency medicine, general surgery and an elective). With the guidance of the clinical preceptor, students will perform history and physical exams, obtain diagnostic testing and develop differential diagnosis/treatment plans. Students will learn to communicate effectively with medical providers, preceptor, patients and family members. Student may perform procedures at the discretion of the preceptor.
PA 710 Supervised Clinical Practice Experience (2) This course series is designed to provide students with exposure and experiences in a specific clinical setting. The goal is for students to gain exposure to the approach to patients in a wide variety of clinical settings. The clinical year supervised clinical practice encounters (SCPE) are designed to expose professional phase PA students to a variety of patients across the lifespan (infant, children, adolescent, adult, elderly) in a variety of levels of care (emergent, acute, chronic, preventive). There are nine required SCPEs that are a part of this course series (family medicine, internal medicine, pediatrics, women's health, community mental health, emergency medicine, general surgery and an elective). With the guidance of the clinical preceptor, students will perform history and physical exams, obtain diagnostic testing and develop differential diagnosis/treatment plans. Students will learn to communicate effectively with medical providers, preceptor, patients and family members. Student may perform procedures at the discretion of the preceptor.
PA 711 Global Healthcare Experience (2) This course is designed to provide students with a study abroad experience that offers exposure and experience to the global health field. This course will focus on comparison of health care systems in Great Britain and the United States. Both historical and modern health sites will be visited.

PA 770 Core Review I (2) This course is a three part course series designed to provide students with broad based clinical knowledge that may not be found within the supervised clinical practice encounters (SCPEs), but is needed for successful clinical practice. It also serves to review material previously taught within the curriculum that is required for physician assistant practice. Finally, this course series serves to evaluate students on the PA Program competencies and prepare students for the Physician Assistant National Certifying Exam (PANCE).
PA 771 Core Review II (2) This course is a three part course series designed to provide students with broad based clinical knowledge that may not be found within the supervised clinical practice encounters (SCPEs), but is needed for successful clinical practice. It also serves to review material previously taught within the curriculum that is required for physician assistant practice. Finally, this course series serves to evaluate students on the PA Program competencies and prepare students for the Physician Assistant National Certifying Exam (PANCE).
PA 772 Core Review III (2) This course is a three part course series designed to provide students with broad based clinical knowledge that may not be found within the supervised clinical practice encounters (SCPEs), but is needed for successful clinical practice. It also serves to review material previously taught within the curriculum that is required for physician assistant practice. Finally, this course series serves to evaluate students on the PA Program competencies and prepare students for the Physician Assistant National Certifying Exam (PANCE).
PA 774 Summative Experience (2) This course is designed to assess the student's integration of the PA Program's curriculum, competencies and preparedness to sit for the National Boards and enter clinical practice. Students must show a minimum entry level competency in primary care medicine knowledge, primary medicine clinical skills, and professionalism to pass this course. This course is an accreditation requirement for program endorsement of students, and must be passed to be eligible to sit for the PANCE exam.

## Public Health (PH)

PH 501 Epidemiology (3) This course covers applications of epidemiologic methods and procedures and the study of the distribution and determinants of health and diseases, morbidity, injuries, and mortality in populations. Epidemiologic methods for the control of conditions such as infectious and chronic diseases, mental disorders, community and environmental health hazards, and unintentional injuries are discussed. Other topics include quantitative aspects of epidemiology, for example, data sources, measures or morbidity and mortality, evaluation of association and causality, and study design. Spring.
PH 509 Environmental Health (3) Environmental health is concerned with the biological chemical, and physical influences on human health. The course will examine topics such as environmental health determinants, general mechanisms of toxicity, genetic, physiologic, and psychosocial factors related to environmental health, environmental risk assessment methods, federal and state regulatory guidelines and programs, environmental justice, risk communication, and prevention and management of environmental hazards. Fall.
PH 515 Health Behavior (3) Health Behavior is an overview of the health behaviors contributing most dramatically to increased morbidity and mortality in the United States. The course emphasizes public health interventions, theoretical models, and strategies to promote health behaviors and discourage unhealthy
behaviors. The course examines consequences, patterns, risk factors, and change/interventions for each behavior or problem. Behaviors are examined from multiple perspectives (e.g. individual, social, environmental) and with a systems perspective in mind, illuminating the interconnecting influences on behaviors. Health behavior and behavior change interventions are presented in the context of current research and theory. The course also examines the role of health disparities, public health policy, current debate, health behavior theory, and emerging research. Fall.

PH 525 Biostatistics (3) This course will cover biostatistical methods and applications related to public health. Topics will include descriptive statistics, probability theory, and a wide variety of inferential statistical techniques that can be used to make practical conclusions about empirical data. Learned statistical knowledge will be applied to understanding and designing research studies. Fall and Spring.
PH 530 Health Economics (3) The course is designed to introduce students to the field of Health Economics. The provision and production of health care have different characteristics and incentives from other consumer goods making health related markets a unique topic for study. Topics that will be examined include economic concepts, why health is different from other goods, aspects of the U.S. health care market, health care in other countries, health care reform, and economic evaluation techniques. Fall.
PH 535 Public Health Law \& Ethics (3) The course is focused on the use of law and policy tools to promote access to healthy living conditions as an important determinant of population health and community well-being. Priorities and opportunities will be identified for public health law and policy interventions that seek to characterize, prevent, and ameliorate risks to population health. Legal powers and duties of the state will be discussed. We will also discuss individual rights as limitations on the power of the state to act in furtherance of the common good. Through case studies and simulations on topics such as sexually transmitted infections, tobacco control, obesity, exposure to environmental hazards, and public health emergencies, students will engage in an experiential and problem-based study of law as a tool for promotion of population health, well-being, and equity. Fall
PH 540 Strategic Mngt in Health Prog (3) The course is designed to provide students with the tools they need to take their place as leaders of public health or healthcare organizations. The course introduces concepts of governance, strategic thinking, systems thinking, and implementation science. Students will learn the principle tenets of governance, strategy, and financial leadership. Spring.
PH 542 Health Systems \& Policy (3) The aim of this course is to provide students with an overview of the U.S. health care system, its components, and the policy challenges created by its organization. The course will focus on the major health policy institutions and important issues that cut across institutions, including private insurers and the federal/state financing programs. Attention will also be given to disparities in access to care, the role of pharmaceuticals in health care and the pricing and regulation of the pharmaceutical industry, the quality of acre, the challenges of long-term care, and the aging of the population, and the drivers of cost growth. Spring.
PH 543 Population-Based Health (3) This course presents selected information, concepts, and methods from the field of public health. Topics concerning the history, organization, financing, and services of the public health system are discussed. All topics
are presented from a population-based perspective. Summer.
PH 547 Survey Research Methods (3) The course provides an introduction to population surveys typical in descriptive and analytic epidemiologic research. The course has a strong emphasis on telephone questionnaire methods, but also includes other data collection modes and their relative advantages and disadvantages. Survey sampling, survey planning and data collection, computer interviewing and data management techniques for research surveys are emphasized. The course includes generalized methods and didactic materials as well as case studies. Spring.
PH 580 Programs, Problems, \& Policies in Public Health (3) This course examines the myriad of programs and policies in public health via a developmental approach to learning about health problems. The course will cover a variety of topics, including state programs and policies, maternal and infant health, program planning, research, monitoring, and advocacy. Spring.

PH 590 Integrative Experience (3) This class serves as the capstone course for public health students. It provides an opportunity for students to work on public health practice projects that are of particular interest to them. The goal is for students to synthesize, integrate, and apply the skills and competencies they have acquired to a public health problem that approximates a professional practice experience. Spring.
PH 598 Public Health Internship (3) A comprehensive and integrated application of the curriculum required by the MPH program which allows students to demonstrate professional competency in public health within a practice setting. The internship is an integral part of the MPH curriculum. It is intended to broaden the student's public health perspectives and provide experience in applying the theory and content learned in didactic courses in public health practice. It is therefore expected that through the internship experience the student will have the opportunity to interact with public health professionals and participate in activities that constitute public health. It is further expected that the student will be exposed to various paradigms and ways to solve public health problems, with experiences that reinforce communication principles, use of relevant information technology, sensitivity to diversity and cultural issues, and enhance a student's leadership, program planning, and systems thinking skills. Fall, Spring and Summer.
PH 599 Special Topics in Public Health (1-3) Provides students the opportunity to study topics of special interest not covered in regular course offerings. The course will be structured as an independent study. This allows the student to explore a topic of interest under the close supervision of a faculty member who has agreed to direct the students work. The course may include directed readings, applied work, or assisting the faculty member with a research project. Course may be repeated.

## Psychology (PSYC)

PSYC 506 Gender, Psychology, and Law (3) This course reviews the interaction between gender and the legal system. Major topics in the area include feminist-legal perspectives, rights, policing, title IX, title VII, discrimination, trafficking, and sexual violence. Principles of psychology, the study of law, and attempts to control human behavior will be discussed. Prerequisite: Admission to the PsyD program
PSYC 521 History \& Systems of Psychology (3) This class provides a comprehensive and in-depth overview of the antecedents and development of the scientific study of psychology. There is
a critical analysis of the historical underpinnings of the field. It includes commentary on the philosophy of science and scientific paradigms that have informed the generation of knowledge. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 526 Seminar: Child and Adolescent Psychology (3) Examines developmental stages from conception through adolescence, giving special emphasis to physical, cognitive, social, and emotional aspects related to maturational as well as learning processes. As a graduate seminar, this course adopts a discussion-based format to explore primary research into child and adolescent psychology to help each student gain a greater appreciation for and understanding of the concepts and processes involved in the development of children and adolescents.
PSYC 528 Psychology of Religion (3) This course will examine how religion informs psychology and how psychology informs religion. Theoretical perspectives on the psychology of religion will be covered as well as empirical research regarding religious experiences, behaviors, feelings, and cognitions. Clinical applications, including how to incorporate religion/spirituality into clinical practice based on client preferences, will be reviewed. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 564 Psycholinguistics (3) This course focuses on the psychological analysis of language. Theoretical models and empirical findings will be explored, especially as they relate to applied developmental psychology. Influences on language abilities and language processing will be considered. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 610 Foundations of Personality and Psychotherapy(3) This course reviews the foundational elements of psychotherapy and discusses important theories, concepts, and perspectives from the field of personality psychology that inform our understanding of the major approaches to psychotherapy. Professional development as a PsyD student will begin as you develop ethical and multicultural competence for conducting clinical intake interviews and providing psychotherapy. As a graduate level class in personality theory, this course will also include an in-depth study of various paradigms or frameworks (e.g., psychoanalytic, humanistic) for understanding personality. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 622 Clinical Health Psychology (3) Key topic areas (e.g., health promotion and disease prevention, health behavior change, stress, psychosocial factors influencing physical health) in the field of health psychology will be covered. Students will develop a greater understanding of the biopsychosocial model as it relates to health and disease. Clinical and professional issues in the delivery of psychosocial services in medical settings will be considered.
PSYC 623 Personality Assessment(3) This is a graduate course in objective personality assessment. Students will apply what they have learned about personality theory as they practice the administration, scoring, and interpretation of prominently-used personality tests. Integrative report writing as well as providing feedback to clients will be covered.Prerequisite: Admission to the PsyD program or instructor approval.
PSYC-629 Advanced Social Psychology (3) This course provides Psy.D. students with advanced knowledge in social aspects of behavior. Classic and contemporary theories related to the social influence of individual and group behavior will be reviewed. Research findings related to topics such as attitudes and persuasion, social cognition, and attribution processes will be covered. Prerequisite: Admission to the PsyD program or instructor
approval.
PSYC-601 Cognitive assessment (4) This course provides the theoretical background and conceptual foundation of the construct of intelligence. It provides PsyD students with direct instruction in intelligence test administration, scoring, interpretation, report writing, and feedback. This course reviews concepts such as psychometrics, test development, and the science of measurement. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 625 Advanced Lifespan Developmental Psychology (3) This course focuses on developmental aspects of behavior. It provides an in-depth overview of the physical, cognitive, emotional, and social development of children, adolescents, and across the years of adulthood and old age. Theories and research findings on topics such as attachment and life transitions will be covered. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 630 Seminar: Severe Mental Illness (3) This course provides an advanced understanding of the etiology, maintenance, and treatment of severe mental illnesses such as bipolar disorder and schizophrenia. Students will learn the context in which severe mental illness manifests itself, how society understands it, and the role that culture plays in shaping the lived experience of those affected by it.
PSYC 635 Advanced Psychopathology across the Lifespan (4) This course provides an advanced coverage of diagnostic, descriptive, and research bases of the major disorders making up psychopathology. A developmental perspective is taken to consider the context in which disorders emerge as well as comorbidity and recurrence across the lifespan. The emphasis will be on theoretical conceptualizations and issues of diagnosis, etiology, and the developmental course of illness. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 645 Advanced Statistics (3) This course examines statistical concepts such as hypothesis testing and teaches statistical analysis techniques such as regression and ANOVA. It provides an overview of the critical thinking process and how to interpret statistical results in a theoretically informed way. Statistical packages such as SPSS will be used to conduct analyses. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 646 Research Methods in Clinical Psychology (3) This course provides Psy.D. students with advanced knowledge in research methods. It covers the methods of science as they apply to clinical psychology. Experimental, correlational, and other scientific designs in psychological research will be reviewed. This course includes an applied component in which you will learn how to design and conduct a study of your own. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 648 Ethics and Professional Issues (3) This course reviews the APA ethical principles and standards for the practice of psychology. It will enhance one's professional identity as a psy-chologist-in-training who is sensitive to diversity-related issues. This course also reviews models of ethical decision-making and how they are integrated into the context of practice. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 652 Cognitive Behavior Therapy(3) This course covers cognitive behavioral conceptualizations of emotions, functioning, and psychopathology. Practice of cognitive behavioral skills and interventions is emphasized. This course also provides instruction on case conceptualization and how it informs treatment. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 665 Advanced Professional Development (2) Continued
professional development is emphasized in this class as students begin the application process for their clinical internship year. Practical assignments will include writing one's internship essays and developing a professional curriculum vitae. Self-evaluation strategies will be used to maximize one's strengths and identify areas of continued improvement.
PSYC 675 Culture and Diversity in Clinical Psychology (3) Students will learn about their own cultural background, attitudes, and biases and better understand how these personal considerations may affect how they interact with people different from themselves. Students will develop a theoretically informed framework for approaching their work with diverse individuals. Ultimately, students will apply course knowledge to their work with clients. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 680 Interpersonal Psychotherapy (3) This class introduces students to interpersonal theory and its conceptualization of personality and psychopathology. Students will learn about the fundamental concepts of interpersonal psychotherapy and will practice utilizing tools and techniques associated with this form of therapy. This class also helps students distinguish between forms of interpersonal therapy and psychodynamic forms of therapy. Prerequisite: Admission to the PsyD program or instructor approval.

PSYC 685 Advanced Assessment and Treatment (3) This course focuses on advanced assessment and treatment modalities for a variety of psychological conditions. The overall purpose is to further develop students' clinical skills learned in earlier classes (e.g., cognitive behavior therapy). Students will perform a psychological evaluation and discuss empirically supported treatments consistent with evidence-based practice. Students will learn how to give feedback to clients based on assessment results. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 688 Affective Neuroscience (3) From philosophical and early psychological theories of emotion to modern neurobiological studies, this course uses an integrative approach towards building an understanding of emotion in human and non-human animals. Emotion will be considered from evolutionary, developmental, and systems perspectives based on work conducted in non-human animal as well as human models when possible. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 691 Clinical Supervision and Consultation (3) Students will learn about models of supervision and consultation. They will acquire practical experiences providing supervision to more novice clinicians. Students will also develop a conceptual foundation of consultation and how to use it in their professional roles. They will continue to hone their professional development and confidence in what they can offer to allied health care providers.Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 692a Seminar: Psychological Sciences I (1) This course provides an overview and orientation to the PsyD program at the University of Evansville. Ethical principles of psychologists and code of conduct will be introduced. There will be discussion about self-care and self-reflection in the process of clinical training. Prerequisite: Admission to the PsyD program
PSYC 692b Seminar: Psychological Sciences II (3) This course builds on the first seminar in psychological Sciences as it continues to facilitate students' professional development and their professional identity. There will be continued practice of self-care. The process of continuing education will be discussed. Self-assessment will be utilized to apply principles of ongoing profes-
sional development to a particular topic area in psychology (i.e., psychotropic medications). Prerequisite: Admission to the PsyD program
PSYC 693 Clinical Practicum (1-3) This course involves individual and group supervision for seeing clients in the UE psychology clinic. Group supervision includes didactics, case presentations, and shared feedback on one's clinical skills. Individual supervision will focus on each student's clients in detail to address treatment progress, clinically-indicated therapeutic interventions, and the role that culture plays in the manifestation of strengths, problems, and psychopathology. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 694 Neurodevelopmental Disabilities (3) This course provides an advanced coverage of learning disabilities and developmental disorders. Diagnostic criteria and etiological factors are reviewed in detail. Students will learn the relationship between these disorders and brain processes, language, thinking, emotions, and behavioral disturbances. Areas of applied developmental psychology including the role of culture will be explored.
PSYC 695 External Practicum (1) In consultation with the director of clinical training, students will be placed in external practica sites to acquire clinical experiences in increasingly complex settings working with a clinical supervisor and other allied health care professionals. Students will apply what they have learned in the PsyD program in the external practicum site where they are placed. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 696 Research in Clinical Psychology(3) This course provides PsyD students with the knowledge and skills to conduct a dissertation project. This includes increased familiarity with statistics, research methods, psychometrics, and scientific writing. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 698 Developmental Cognitive Neuroscience (3) This course provides PsyD students with advanced knowledge in developmental, cognitive, and biological aspects of behavior. Topics include memory, attention, perception, language, and problem solving skills. Important concepts, theories, and experimental findings related to brain development and associated cognitive abilities are discussed. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 699a Clinical Internship (1) The PsyD program at the University of Evansville requires the completion of a one year (full time) or two year (half time) clinical internship. This course addresses common issues and challenges that arise during this important stage of professional development. Self-care and the business of psychology is discussed. Prerequisite: Admission to the PsyD program or instructor approval.
PSYC 790 Dissertation (1-4) This course occurs in conjunction with your dissertation project. Your dissertation project can be an empirical study, literature review, program evaluation, case study, qualitative study, or theoretical analysis. You will produce a scholarly project that contributes to scientific advancement in the local context, especially as it relates to clinical practice. Prerequisite: Admission to the PsyD program and approval of dissertation proposal.

## Sociology (SOC)

SOC 560 Aging and Society (3) Recommended for any student desiring a thorough introduction to gerontology. Examines the social response to aging in American society and in other countries. Emphasis on the roles of elders in the familial, religious,
political, and economic institutions. Prrequisites: SOC 105 or 230 and junior/senior standing; or permission of instructor.
SOC 586 Death, Dying, Bereavement (3) This graduate course explores thanatology - the study of death - using a sociological lens. Examines attitudes and behaviors toward dying, death, and bereavement from a variety of theoretical and comparative perspectives. Topics of study include: cultural traditions, rituals, practices, and attitudes toward death; self-awareness and value identification concerning death and dying; grief and bereavement; the impact of death and dying across the life span; and end-of-life planning.

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Additional information may be obtained from the appropriate offices at the University. All correspondence should be addressed to the University of Evansville, 1800 Lincoln Avenue, Evansville, Indiana 47722. The University's main telephone number is 812-4882000.

## Admission and Prospective Student Information

Visitors are welcome at the University of Evansville. The Office of Admission is located in Room 104, Olmsted Administration Hall. Advance appointments are recommended for campus visits. For appointments, call 812-488-2468 or 800-423-8633, ext. 2468.
Office of the President - 812-488-2151
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2625

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    CS 101: Intro to Computer Science (3 hrs)
    CS 210: Fundamentals of Programming I (3 hrs)
    CS 215: Fundamentals of Programming II (3 hrs)
    CS 220: Logic Design \& Machine Organization (3 hrs)
    CS Concentration Requirements (27 hrs)
    CS 320 - Computer Architecture (3 hrs)
    CS 380 - Programming Languages (3 hrs)
    CS 381 - Formal Languages (3 hrs)
    This checklist is informational only. The University reserves the right to modify regulations and curriculum at any time. Please see the automated degree audit on Student Planning for the most up-to-date program information.

