

EEB & Biology Major Electives

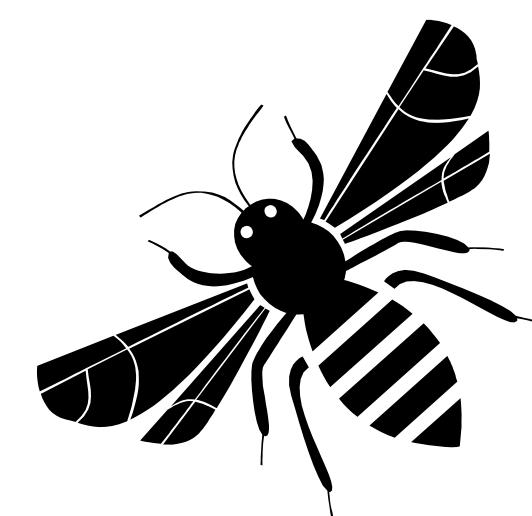
Spring 2025



Organismal

Macro-

- ACBS 400 B- Animal Anatomy & Physiology
- ACBS 443- Research Animal Methods *
- ECOL 404 R- Biology of the Oceans**
- ECOL 407- Insect Discovery
- ECOL 437- Vertebrate Physiology***
- ECOL 480- Math Models in Biology
- ECOL 483—Herpetology *
- ECOL 484- Ornithology***
- ENTO 457- Medical & Veterinary Entomology
- PLS 360- Plant Growth and Physiology

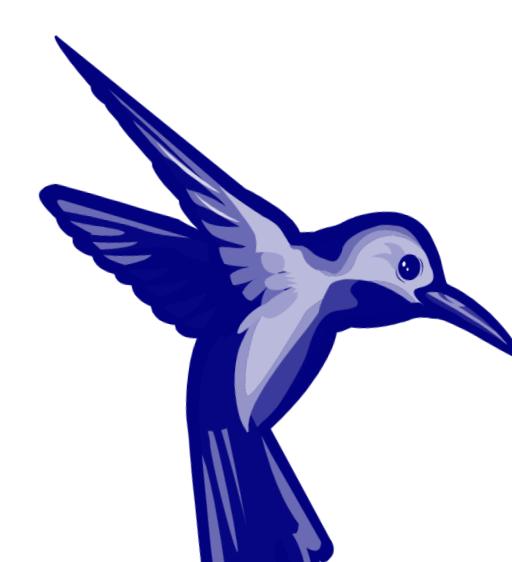


Micro-

- ACBS 403 R- Biology of Animal Parasites
- ACBS 406- Diseases of Companion Animals
- ECOL 409- Evolution of Infectious Disease
- ENTO 457—Medical-Veterinary Entomology
- MIC 328 R – Microbial Physiology
- MIC 425—Environmental Microbiology
- PLP 320—Microbiomes
- PLP 428R—Microbial Genetics**
- PLP 428L—Microbial Genetics Lab*

Ecology, Evolution & Behavior

- ANTH 495D— Special Topics in Biology Anthropology
- ECOL 346— Bioinformatics*
- ECOL 360— Marine Ecology and Conservation
- ECOL 404 R- Biology of Oceans**
- ECOL 406 R— Conservation Biology
- ECOL 409— Evolution of Infectious Disease
- ECOL 412 A- Ocean Science
- ECOL 412 B— Ocean Science Field Course
- ECOL 426— Population Genetics
- ECOL 427—Ecology and Evolution of the Mammalian Microbiome
- ECOL 454—Water Harvesting
- ECOL 473— Topics in Behavioral
- ECOL 480— Mathematical Models in Biology
- ECOL 496 G— Complex Systems: Networks & Self Organization in Biology
- ECOL 484— Ornithology***
- ENTO 407—Insect Discovery
- ENVS 477— Ecotoxicology**
- ENVS 475— Freshwater and Marine Algae**
- GEOS 330— Introduction to Remote Sensing
- RNR 316— Natural Resource Ecology
- RNR 355— Introduction to Wildland Fire
- WFSC 445— Population Ecology
- WFSC 447— Wildlife Conservation Behavior
- WFSC 454— Water Harvesting



BOLD is writing emphasis, ITALICS are field, * is lab

While some courses are listed in multiple elective categories above, you may only use a course once within your major electives.

For example if you take ACBS 400B, it will apply for either an organismal **OR** physiology elective—**NOT BOTH**.

Physiology

- ACBS 400 B- Animal Anatomy & Physiology
- ECOL 437— Vertebrate Physiology***
- MCB 360— Plant Growth and Physiology
- MIC 328 R – Microbial Physiology
- NROS 307—Cellular Neurophysiology
- PSIO 380— Fundamentals of Human Psio
- PLS 360— Plant Growth & Physiology



PSIO 201 and 202 when taken together can count for this requirement and a lab requirement. Be sure to still complete 42 upper division units when using this option.

Science & Society

- ECOL 360— Marine Ecology and Conservation
- ECOL 406 R— Conservation Biology
- ECOL 409—Evolution of Infectious Disease
- ENTO 457—Medical— Veterinary Entomology
- EPID 309— Intro to Epidemiology
- HPS 387— Health Disparities/ Minority Health
- LAW 459— Public International Environmental Law
- MCB 404— Bioethics**
- PHIL 321— Medical Ethics
- PHIL 347— Neuroethics
- PHP 305— Population Health in Digital Age
- PHP 308— Community Health Ed/Disease Outbreaks
- PCOL 320— What's Your Poison? Toxicology

Cell & Molecular Biology

- ENVS 477— Exotoxicology**
- MCB 411— Molecular Biology
- MCB 416 A— Stats Bioinformatics & Genomic Analysis
- MCB 433— Medical and Molecular Virology
- MCB 473— Recombinant DNA Methods & Applications***
- NROS 310— Molecular and Cellular Biology of Neurons
- NROS 412— Molecular Mechanisms of Learning and Memory
- NROS 430—Neurogenetics
- PLP 428R—Microbial Genetics**

Genetics

- ECOL 346— Bioinformatics*
- ECOL 426— Population Genetics
- ECOL 427 - Ecology and Evolution of the Mammalian Microbiome
- ECOL 428 R— Microbial Genetics
- ECOL 496 G— Complex Systems: Networks & Self Organization in Biology
- MCB 416 A— Stats Bioinformatics & Genomic Analysis
- MCB 473— Recombinant DNA Methods & Applications ***
- MIC 340— Introduction to Biotechnology
- NROS 430—Neurogenetics
- PLP 428 R – Microbial Genetics**
- PLS 312—Plant & Animal Genetics
- PLS 340 L— Biotechnology Laboratory *
- PLS 449 A— Plant Genetics and Genomics

