Ecology and Evolutionary Biology Course Guide

Here is the suggested sequence of biology classes for students with primary interests in the fields of Ecology and Evolutionary Biology.

The Biology major requirements consist of at least 65 credits, with a minimum grade of C required in all courses counted toward the major requirements.

SECTION 1: All Biology majors must fulfill the following requirements for a total of 40 credits. Suggested semesters for taking the courses are listed in parentheses.

1. Required courses in the Biology department
   Biol 151 and Biol 152/153 (Freshman year)
   Biol 312 (Junior year)

2. Chemistry requirement
   Chem 111 and 112 (Freshman year)
   Chem 261, 262, and 269 (Sophomore year)

3. Statistics requirement
   Statistics 240 or Res Econ 211 (Freshman year)

4. Mathematics requirement
   Math 127 or Math 128 (Freshman year)

5. Physics requirement
   Physics 131 and 132 (Sophomore year)

SECTION II: Suggested Course Sequence for Ecology and Evolutionary Biology

25 credits must be taken; 13 of these credits must be at the 300 level or above. These elective credits must include 2 courses with a laboratory or field component and at least one course related to plant biology and one course related to animal biology.

Sophomore Year (strongly recommended courses)
   Biol 280 Evolution
   Biol 287 Introductory Ecology
   Biol 283 Genetics

Junior and Senior Year
   Biol 285 Cell & Molecular Biology or Biol 288 Intro Physiology

   Biology Electives: we suggest that students take at least 2 classes within each of the following 3 clusters (at least 2 classes must have lab/field experience.)
1) Ecology Cluster (choose 2)
   Biol 421 Plant Ecology [lab]
   Biol 487H Tropical Field Biology [lab]
   Biol 550 Animal Behavior [lab]
   Biol 597AC Animal Communication

2) Evolutionary process and Genetics Cluster (choose 2)
   Biol 514 Populations Genetics
   Biol 528 Principles of Evolution
   Biol 531 Principles of Molecular Evolution [lab]
   Biol 583 Genetics II
   Biol 597G Environmental Evolution

3) Organismal Approaches Cluster (choose 2)
   Biol 461 Vertebrate Collections Management
   Biol 521 Comparative Anatomy [lab]
   Biol 540 Herpetology [lab]
   Biol 542 Ichthyology [lab]
   Biol 544 Ornithology [lab]
   Biol 548 Mammalogy [lab]
   Biol 566 Comparative Physiology
   Biol 597AM How Organisms Move