BIOL-117: WILDLIFE BIOLOGY

Effective Term
Fall 2026

CC Approval
12/05/2025

AS Approval
12/11/2025

BOT Approval
12/18/2025

COCI Approval
02/26/2026

SECTION A - Course Data Elements

CB04 Credit Status
Credit - Degree Applicable

Discipline

Minimum Qualifications	And/Or
Biological Sciences (Master's Degree)	

Subject Code
BIOL - Biology
Course Number
117

Department
Biology

Division
Science and Engineering (SE)

Full Course Title
Wildlife Biology

Short Title
Wildlife Biology

CB03 TOP Code
0401.00 - Biology, General

CB08 Basic Skills Status
NBS - Not Basic Skills

CB09 SAM Code
E - Non-Occupational

Rationale
Update dating and DEI.

SECTION B - Course Description

Catalog Course Description
An introduction to the biology, ecology, and management of terrestrial wildlife, with emphasis on California fauna. Includes one Saturday field trip to a wildlife refuge.

SECTION C - Conditions on Enrollment

Open Entry/Open Exit
No

Repeatability
Not Repeatable

Grading Options
Letter Grade or Pass/No Pass

Allow Audit
Yes

Requisites

SECTION D - Course Standards

Is this course variable unit?
No

Units
3.00000

Lecture Hours
54

Outside of Class Hours
108

Total Contact Hours
54

Total Student Hours
162

Distance Education Approval

Is this course offered through Distance Education?
Yes

Online Delivery Methods

DE Modalities	Permanent or Emergency Only?
Entirely Online	Permanent
Hybrid	Permanent
Online with Proctored Exams	Permanent

SECTION E - Course Content

Student Learning Outcomes

	Upon satisfactory completion of the course, students will be able to:
1.	Identify common, local species of California wildlife from photographs or laboratory specimens.
2.	Describe important life history characteristics of various California wildlife species.
3.	Describe basic principles and methods of wildlife management.

Course Objectives

	Upon satisfactory completion of the course, students will be able to:
1.	Identify (by photograph and description) common species of California mammals, birds, reptiles, and amphibians that might be found locally.

2.	Differentiate between major taxonomic groups of birds and mammals.
3.	Explain the scientific method and its application to the study of wildlife.
4.	Discuss the structure and dynamics of animal populations, including population size, growth, age structure, and variability.
5.	Discuss basic principles of genetics and evolution as they pertain to wildlife populations.
6.	Identify different reproductive strategies used by wildlife.
7.	Discuss migration of birds.
8.	Differentiate between different biomes and habitat types, with a focus on those found in North America.
9.	Explain how the distribution of wildlife is related to habitat structure and the process of succession.
10.	Describe ecosystem processes of energy flow and material cycling in relation to wildlife populations.
11.	Describe methods of sampling wildlife such as trapping and remote sensing; identify what types of data are gathered from wildlife; and discuss how these data are analyzed and used.
12.	Discuss how wildlife habitats are assessed, effects of habitat degradation on wildlife, and how habitats can be managed to benefit wildlife.
13.	Understand the major federal and state legislation that protects wildlife species, including endangered and threatened species and migratory birds.
14.	Discuss some ways in which human users affect wildlife and how human uses of wildlife can be managed.

Course Content

1. Wildlife Basics
   a. Defining wildlife
   b. Ecological concepts
   c. Evolution and natural selection
2. Wildlife Taxonomy and Identification
   a. Mammals
   b. Birds
   c. Reptiles and amphibians
3. Sampling and Studying Wildlife
   a. Wildlife sampling methods
   b. Data collection
   c. Data analysis
4. Habitat
   a. Habitat assessment
   b. Habitat management
   c. Habitat degradation
5. Human Uses and Interactions
   a. Wildlife protection legislation
   b. Hunting
   c. Endangered and threatened species

Methods of Instruction

Methods of Instruction

Types	Examples of learning activities
Activity	
Discussion	Group discussion of relevant research and topics
Field Trips	
Lecture	Lecture covering topics in course ontent with images

Online Adaptation

Types	Examples of learning activities
Activity	
Directed Study	
Group Work	
Individualized Instruction	

Journal
Lecture

Instructor-Initiated Online Contact Types

Announcements/Bulletin Boards
Chat Rooms
Discussion Boards
E-mail Communication
Telephone Conversations
Video or Teleconferencing

Student-Initiated Online Contact Types

Chat Rooms
Discussions
Group Work

Course design is accessible

Yes

Methods of Evaluation

Methods of Evaluation

Types	Examples of classroom assessments
Exams/Tests	1. Examinations - Lecture examinations will consist of objective questions in a variety of formats including short answer, multiple choice, and essay questions. Example of exams: Exam 1 topics include definitions, key concepts in ecology and evolution. Exam 2 topics include the identification of local wildlife from specimens and photographs.
Quizzes	Quizzes are short examinations dealing with lecture material.
Homework	Examples of Homework Assignments: Analyzing population models Discuss issues that arise from wildlife populations living in agricultural areas.
Other	Class Work

Assignments

Reading Assignments

Students will read assigned materials from their textbook and supplemental readings placed on reserve in the college library.

Example 1: Read chapter 4 to prepare for lecture on genetics in wildlife and fisheries.

Example 2: Read journal article from "The Journal of Wildlife Management" concerning mountain lion population management in the Western states.

Example 3: Read handout: Background information on the federal Endangered Species Act.

Example 4: Read handout: Natural history of wildlife seen on the field trip.

Writing Assignments

Written homework assignments will be used to supplement the instruction, allowing students to investigate topics in greater depth than the lecture material.

Example 1: Describe the natural history of a local wildlife species.

Example 2: Summarize the key points of the Endangered Species Act.

Outside-of-Class Assignments

Problem sets will be given as homework assignments allowing students to problem solve and to independently investigate topics.

Example 1: Solve population level genetic problem set.

SECTION F - Textbooks and Instructional Materials

Material Type

Textbook

Author
Mahoney,S., Geist, V.

Title
The North American Model of Wildlife Conservation (Wildlife Management and Conservation)

Publisher
Johns Hopkins University Press

Year
2019

Material Type
Textbook

Author
Fryxell, J., A. Sinclair,G. Caughley

Title
Wildlife Ecology, Conservation, and Management

Edition/Version
3rd

Publisher
Wildlife Ecology, Conservation, and Management

Year
2014

SECTION G - Diversity, Equity and Inclusivity

How does your course and/or course outline of record reflect strategies for accommodating and engaging diverse student populations, advancing equitable outcomes, and fostering inclusion for all students?

This course supports diverse student populations through the use of multiple representations of concepts, varied applications, and technology. Strategies may also include collaborative learning, transparent assessment practices, low-cost resources, and opportunities for students to connect course material to their own experiences, fostering equitable outcomes and an inclusive classroom environment.

Course Codes (Admin Only)

CB00 State ID
CCC000255118

CB10 Cooperative Work Experience Status
N - Is Not Part of a Cooperative Work Experience Education Program

CB11 Course Classification Status
Y - Credit Course

CB13 Special Class Status
N - The Course is Not an Approved Special Class

CB23 Funding Agency Category
Y - Not Applicable (Funding Not Used)

CB24 Program Course Status
Program Applicable

Allow Pass/No Pass
Yes

Only Pass/No Pass
No