BIO 3052 – Conservation Biology – Spring 2024

Course objectives

This is a classroom course for Biology majors and other students interested in the science of biodiversity conservation. Conservation Biology is a diverse subject that requires coverage of information from biology, ecology, economics, politics, and law (among others) to understand all of the factors involved in preserving biodiversity (the primary goal of conservation biology). This version of the course will focus primarily on the science of conservation biology. We will cover forms of biological diversity, population decline and extinction, how to maintain biodiversity, human factors, and a variety of conservation case studies. This is a 3 credit course primarily for Biology majors, so I expect students to be fully involved and actively participate in the class.

Course times and locations

Days and times: MW(F) 12:30-1:20pm Class location: NSC Room 0110 Office hours: M and W 11am – 12:20p in Biology 309 and by appointment (Zoom).

<u>NOTE</u>: Please take note of the class schedule, below. The class will always meet in-person on Monday and Wednesday but most Fridays we will not be meeting in-person and there will be online assignments for those days.

Instructor:

Dr. Joshua King Biology Building, Room 309C Email: <u>joshua.king@ucf.edu</u>

Communication with the class

All communications from me will be posted in the Webcourses announcements and/or sent to your UCF email account. You are responsible for checking your UCF email on a regular basis.

I always respond to email from students, however occasionally an email message may be lost. Please follow up if you do not hear back from me in 24 hours or so. Response time may be slower on weekends. As a matter of courtesy I expect you to identify yourself in any email you send.

<u>Textbook</u>

Hunter et al. 2021. *Fundamentals of Conservation Biology*, 4th edition. John Wiley & Sons Ltd.

<u>Modality</u>

This is an IN PERSON course with online enhancements. Thus, you will need to come to class with some regularity to have success in the course.

<u>Schedule</u>

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Jan	8	М	What is Conservation Biology? (Ch 1)	IN PERSON
	10	W	Reading scientific literature: a primer (Lit)	IN PERSON
	12	F	Peer review literature examples	ONLINE
	15	Μ	MLK HOLIDAY	NO CLASS
	17	W	Forms of Biological Diversity (Ch 2-5)	IN PERSON
	19	F	Current events: Biodiversity	ONLINE
	22	М	Forms of Biological Diversity (Ch 2-5)	IN PERSON
	24	W	Forms of Biological Diversity (Ch 2-5)	IN PERSON
	26	F	Current events: Human attention	ONLINE
	29	Μ	Population Decline and Extinction (Ch 6-10)	IN PERSON
	31	W	Population Decline and Extinction (Ch 6-10)	IN PERSON
Feb	2	F	Current events: Small victories	ONLINE
	5	Μ	Population Decline and Extinction (Ch 6-10)	IN PERSON
	7	W	EXAM 1	IN PERSON
	9	F	Current events: Pesticides, pesticides	ONLINE
	12	Μ	Population Decline and Extinction (Ch 6-10)	IN PERSON
	14	W	Maintaining Biodiversity (Ch 11-14)	IN PERSON
	16	F	Current events: Restoration ecology?	ONLINE
	19	Μ	Maintaining Biodiversity (Ch 11-14)	IN PERSON
	21	W	Maintaining Biodiversity (Ch 11-14)	IN PERSON
	23	F	Current events: TBD	ONLINE
	26	Μ	Maintaining Biodiversity (Ch 11-14)	IN PERSON
	28	W	Maintaining Biodiversity (Ch 11-14)	IN PERSON
Mar	1	F	Current events: Agriculture	ONLINE
	4	Μ	Maintaining Biodiversity (Ch 11-14)	IN PERSON
	6	W	Fire Ant Wars	IN PERSON
	8	F	Current events: Insect invaders	ONLINE
	11	Μ	Ecosystem services of insects	IN PERSON
	13	W	EXAM 2	IN PERSON
	15	F	Current events: Ecosystem function	ONLINE
	18	Μ	Spring Break	NO CLASS
	20	W	Spring Break	NO CLASS
	22	F	Spring Break	NO CLASS
	25	М	Ecosystem services of insects	IN PERSON
	27	W	Gopher tortoises	IN PERSON
	29	F	Current events: Insect Services	NO CLASS
Apr	1	Μ	Overfishing	IN PERSON
	3	W	Overfishing	IN PERSON
	5	F	Current events: Adapting	ONLINE
	8	М	Florida Grasshopper Sparrow	IN PERSON
	10	W	Climate change	IN PERSON
	12	F	Current events: TBD	ONLINE
	15	Μ	Climate change	IN PERSON
	17	W	TBD	IN PERSON
	19	F	Current events: TBD	ONLINE

Final exam period: Friday, April 26, 2024 from 10:00 AM – 12:50 PM; IN-PERSON and in the SAME ROOM where class is normally held (NSC 0110).

Current events: These will be posted online on Webcourses before the Friday that they are scheduled for (I will usually try to post them by Sunday night when I post online quizzes). They may be readings or videos. You are responsible for the content in these posts as content from them will appear in quizzes and exams.

Exams: EXAMS ARE IN PERSON, paper-based, multiple choice and scantrons will be provided. See the Schedule, above for dates. Verifiable, qualifying, documented excuses (e.g. doctor verified illness, jury duty, military duties, court dates, etc.) will be the only excuses accepted for missing exams. If you know you will have to miss an exam ahead of time, please let me know as soon as possible.

Quizzes: There will be weekly ONLINE quizzes. They will be 5 questions, open book, open note, single attempt, with a time limit administered through Webcourses. Quizzes will open at the beginning of the week and remain open through the weekend of the week they are due. You will only have ONE ATTEMPT so do not open it and then try to return later.

Grading

The grading for each individual in the course breaks down as follows: Includes:

- 1. **3 Exams** @ 100 points each (total 300 points). Exams will be drawn primarily from the book, videos, and lecture notes. EXAMS ARE IN PERSON ON SPECIFIC DATES (see Schedule, above).
- 2. **Quizzes** (100 points). Quizzes will be administered weekly except for the first week of class and the week of Thanksgiving. Your quiz score will based upon the average of all quizzes. I strongly advise against getting zeros on quizzes. QUIZZES ARE ONLINE, ADMINISTERED WEEKLY.

Grade Scale

 Grade Range
 Grade GPA

 90 - 100
 A

 80 - 89
 B

 70 - 79
 C

 60 - 69
 D

 Below 60
 F

Grade Rounding Policy: The overall semester grade will not be rounded. <u>There will be</u> <u>no exceptions to this policy and no other adjustments will be made</u>. There is no "secret" extra credit, either.