THE UNIVERSITY OF TEXAS AT EL PASO  
COLLEGE OF SCIENCE  
DEPARTMENT OF BIOLOGICAL SCIENCES

Course No.: ZOOL 4476  
Course Title: Fish, Amphibians, Reptiles  
Credit Hrs: 4 credit hours, upper division  
Term: Fall, 2017 (CRN 16767)  
Course Meetings & Location:  
Lecture: TR Noon-1:20 PM CRBL C-201  
Laboratory: TR 1:30-2:50 BIOL B-206

Prerequisite Courses: BIOL 1306-1108 or ZOOL 2406. Students should have completed all coursework up to the senior level of experience in their major.

Instructor: Dr. Carl S. Lieb  
Office Location: [old] Biology Building B-204  
Contact Information: 747-6987 (preferred), email: clieb@utep.edu  
N.B.: The telephone is the most reliable means for time sensitive communication. If you do not receive a reply to an email within a few days, send it again (… and again).

Office Hours: 10:30-11:30 AM MW, 3:30-4:30PM T, and by appointment

Textbook: No textbook is required. However, students need to have access to an appropriate general biology or zoology textbook, such as they used when taking BIOL 1306 and/or ZOOL 2406. Accessory materials, including field guides and published keys, may be optionally acquired as needed by the individual learner.

Course Objectives/  
Learning Outcomes: Students should emerge from the class with a basic understanding of the natural history and diversity of three divergent groups of vertebrates: fishes, amphibians, and reptiles. Students will also acquire the ability to recognize representative taxonomic groups and a variety of local species, as well as become familiar with the tools utilized to identify species.

Course Activities/  
Assignments: ZOOL 4476 is organized around approximately three hours of lecture two days a week coupled with approximately three hours of laboratory per week. The laboratory room (B-206) will also be available at other times upon request, as long as the lab room is not in use by others.

A brief quiz will be given promptly at Noon on Thursday lecture sessions. Students must be on time to class (i.e., cutoff arrival will be 12:02 PM) in order to take this quiz.

The overall lecture plan, subject to modification as the semester deteriorates, is to spend five weeks on fishes, four weeks on amphibians, and five weeks on reptiles. An entire semester or more could easily be spent on each of these groups, but the lecture material will primarily focus upon such topics as biodiversity, evolutionary trends, ecology, and interactions with human beings for each group separately.
Graduate students enrolled in this class have additional expectations of them that do not apply to the undergraduates. See the section on assessment of course objectives, below.

**Attendance:** The lack of an appropriate textbook has consequences. **Attendance at all lecture sessions is absolutely required.** Students are responsible for all materials presented, discussed, or assigned during this lecture time. Blackboard postings are not intended to substitute for in-class note-taking and assiduous study of those notes. Moreover, as the laboratory practical exams take considerable time to set up and take down, they are performe not ordinarily subject to make-ups.

Attendance will be randomly checked through the semester, usually towards the end of the lecture session. Woe to the student who appears in class on Thursday only to take the quiz at the beginning of the session and then sneak out immediately afterwards!

Laboratory time is more flexible, but **students must not make work or other outside time commitments during either the lecture periods or their assigned laboratory periods.**

**Laboratory:** The overall laboratory objectives are that each student will:
- learn to recognize a major subset of the regional species.
- learn to recognize a small subset of taxa representing worldwide diversity
- learn how to use standard identification tools
- examine structures and view examples described in lectures

The laboratory room where the materials to be mastered are accessible in Biology Building Room B-206. Mastery of these materials is largely self-paced, and thus there is flexibility in how and when each student approaches learning what is required of them. The TR afternoon laboratory sessions will include the services of Dr. Lieb and/or the teaching assistant.

Other time for study of lab materials in B-206 may also present itself, but the room is subject to use for other classes and meetings; students may not use B-206 when it is reserved for meetings or other classes, and the room **MUST BE LOCKED** when not occupied. Students should not procrastinate in mastering lab material; such material may appear on Thursday quizzes after the first two weeks of lab sessions on each group. Also, B-206 will be closed to students on the Practical Examination days.

Safety goggles (provided by the student) must be worn in the laboratory when specimens are removed or returned to specimen jars by not only the person performing the operation, but also every other person within 12 feet. Specimen jars are to be kept closed when specimens are not being removed or replaced. Protective gloves are highly recommended when handling preserved specimens; disposable gloves will be provided in the lab. Specimens and other provided materials may not be removed from the lab room. **APPROPRIATE CLOTHING, INCLUDING CLOSED-TOED SHOES, MUST BE WORN IN B-206. NO FOOD OR DRINK ARE ALLOWED IN B-206. NO MINOR CHILDREN ARE PERMITTED IN B-206, EITHER, EXCEPT BY PRIOR ARRANGEMENT WITH THE EHS OFFICE.**

Please refrain from bringing live animals into B-206 without permission of Dr. Lieb; venomous or other toxic vertebrates are especially unwelcome.
Assessment of Learning: Evaluation will be through four lecture-content examinations (including a final examination), three practical laboratory examinations, and the weekly Thursday quizzes. Graduate students (only) are additionally required to each deliver one classroom lecture and to assist Dr. Lieb and the teaching assistant in one third of the laboratory sessions.

Grading: Grades will be calculated from the following:

15% Examination I (Thursday, 21 September)
15% Examination II (Thursday, 19 October)
15% Examination III (Thursday, 16 November)
15% from quizzes given Thursdays (some quiz grades will be dropped, hence the no-make up policy)
25% laboratory examinations (3 @ 9-7-9%)
15% Final examination on Tuesday, 6 December @ 1:00-3:45 PM.

There is no “extra credit” whatsoever.

Missed Examination Policy:

Drop Policy: The student drop date is 3 November 2017. The results of the first two lecture examinations, one lab practical exams, and a handful of quizzes will be known by that time. Students are thus expected to act in wise and timely fashion in their own interests. The instructor will not drop any student who has taken any quizzes or any examination; withdrawal action must be taken by the student’s own initiative by this 3 November deadline. Students who find themselves in academic trouble anytime during the semester should promptly consult with Dr. Lieb so that their options can be explored (that is, don’t wait until the end of the semester!).

Academic Integrity Policy: Despite his outward cynicism, Dr. Lieb more-or-less believes in the general goodness and honesty of his fellow human beings. Nevertheless, those who try to shatter his illusions and betray the norms of academic integrity will be turned in to the Dean of Students for disciplinary action. You may review UTEP policy in these matters at http://academics.utep.edu/Default.aspx?tabid=23785.

Civility Policy: Civility between the members of the class, and between the instructor and the students, is expected. Please use polite and temperate language at all times. Silence your cell phone before entering the classroom; please do not take calls during class time. Avoid all noisy endeavors not related to the matter at hand (talking, eating, snapping chewing
gum, and, of course, snoring). Your instructor will do his best to be there by the start of class/lab. Please emulate him with timely appearances as well.

**Disability Policy:** If a student has or suspects he/she has a disability and needs an accommodation, he/she should contact the Center for Accommodations and Support at 747-5148, or at cass@utep.edu, or go to Room 106 Union East Building. The student is responsible for presenting to the instructor any CASS accommodation letters and instructions.

**Military Call-up** The instructor understands that military deployment affects not only soldiers but also their families. Please consult with Dr. Lieb as necessary when such matters arise.

**ZOOL 4476 COURSE CALENDAR FALL 2017**

29-30 August: Course introduction, review of basic chordate structure and function; begin fish biology; **Attendance at both lab sessions this week is required!** Lab material begins with fishes

5 September– 19 September: Continue Fishes

**21 September** – Examination I

26 September – Wrap up fishes

**28 September:** Laboratory Practical No. 1 (Fishes) @ 1:45 PM in Biology B-206

3 October: Begin Amphibians. **Attendance at the lab session is required today.**

5 October-17 October: Continue Amphibians

**19 October** – Examination II

24 October – More amphibians

**26 October** – Laboratory Practical No. 2 (Amphibians) @ 1:45 PM in Biology B-206

31 October – Wrap-up of amphibians

1 November – 2 November – Begin Reptiles, lecture and lab; **Attendance at Tuesday lab session required**

3 – Last date for student-initiated withdrawal from courses with a “W”

7 November – 14 November – Continue Reptiles

**16 November** – Examination III

21 November – 5 December – Conitinue and finish Reptiles

**7 December** – Laboratory Practical No. 3 (Reptiles) @ 1:45 PM in Biology B-206

12 December (Tuesday) – Final examination period (1:00 -3:45 PM) over lecture materials presented after 16 November

Version 2017/08/16