

Zoology 2235: Human Physiology

Fall 2018

Instructor: Brian Sardella, Ph.D., Email: bsardella@csustan.edu

Office: N270, Hours: M 1:00-3:00

Lecture 001: TR 12:30-1:45

Labs: 002: T 2:00-4:50*

003: M 9:00-11:50

004: W 9:00-11:50*

* Instructed by Sandra Lehmann Vierra

Prerequisites: Zoology 2250 with a C or better; Chemistry 1000, 1100, or 2100 with a C or better. ****ZOOL 2235 is taught with the understanding that students know the material from the prerequisites! Needed Material from Anatomy and Chemistry will NOT be covered.**

Textbook: *Anatomy and Physiology* is an open source (AKA FREE!) book available to view online or download as a PDF here: <https://openstax.org/details/books/anatomy-and-physiology> You may also pick up a copy in the bookstore or order a hard copy online. Publisher: OpenStax College; 1st edition (January 1, 2013) ISBN-10: 1938168135 ISBN-13: 978-1938168130

Attendance: Students are expected to attend all lectures and lab sessions. Please arrive on time! Attendance is not taken in lecture, but poor attendance is highly correlated poor final grade.

**Missing class during week one may result in your being dropped from the course to make room for anyone on the waiting list that is present.

Blackboard: We will use Blackboard heavily in this course, if you are not experienced with this site, please take some time to familiarize yourself with how it functions.

- 1) Lab Safety Course: You will be assigned the BioLab safety course on Blackboard (2018-2019-BioLabSafety: BioLabSafety). **This must be completed with a 100% score by Aug 31st or you will be dropped from the course!**
- 2) All lab activities for sec 003 will be facilitated by BlackBoard. Lab exercises and reports can be downloaded under 'Documents and Content' on the lab page.
- 3) Lecture slides will be posted as a pdf file FOLLOWING each lecture session.

Exams: There will be 700 points available via exams in two formats:

- 1) Lecture Exams: Five lecture exams will be given representing sections of the course that are highly related (eg; cardiovascular and pulmonary sections). These exams are multiple choice and will consist of 50 multiple choice questions.
- 2) Lab Exams: Two lab exams will cover critical concepts from the lab activities and be based on problem solving and critical thinking regarding physiological concepts.

*****NO MAKEUP EXAMS WILL BE GIVEN*****

(Exams cont.) You must have a serious and compelling reason that can be documented in order to miss an exam, should this occur, the student and instructor will develop a plan of action that best suits the circumstances of the absence.

Lab: Lab will meet once a week and attendance will be taken. There are 10 lab activities during the course and two lab exams. Lab is an opportunity for hands on experience to supplement the concepts learned in lecture. The lab exams will be an amalgam of the critical materials from the lab exercises.

Evaluation:

Lecture Exams (100 x 5)	500
<u>Lab Exams (100 x 2)</u>	<u>200</u>
Total Cumulative Points:	700

Grading: A percentage of total points will be calculated, and the following scale used:

A: 100-93; **A-:** 92-90; **B+:** 89-87; **B:** 86-83; **B-:** 82-80; **C+:** 79-77; **C:** 76-73; **C-:** 72-70; **D+:** 69-67; **D:** 66-60; **F:** 59-0

- These cut offs are absolute, please do not ask to be bumped up, or for extra credit points, after the course because you are close to the line.
- The CR/NC grading option is not approved for this course; only letter grades can be earned.

Course Drop and Withdrawal Policy: Withdraw after the census date can only be done with a documented serious and compelling reason. The Department of Biological Sciences chair will not sign a withdrawal form otherwise, regardless of the instructor's view. It is highly recommended that if you wish to drop the class, you do so by the census date! A grade of "incomplete" will not be considered under any circumstance, you may petition for a withdrawal if a serious and compelling reason is given.

Academic Dishonesty: There will be a zero-tolerance policy for academic dishonesty, this includes, but is not limited to, cheating, plagiarism, and use of course materials in an inappropriate manner such as posting online. Violating this policy will result in a failing grade for the course and referral to the Student Judicial Affairs Office. See University code of conduct for more info: <http://www.csustan.edu/judicial-affairs/student-responsibilities>

Tentative Schedule

Date	Day	Lecture Topic	Lab (Week)
23-Aug	R	Course Intro and Prerequisites	<i>No Labs</i>
28-Aug	T	Homeostasis/Macromolecules	Lab Orientation
30-Aug	R	Cells and Tissues	Physiological Data Collection
4-Sep	T	Energy and Enzymes	<i>Labor Day-No Labs</i>
6-Sep	R	Membrane Transport	
11-Sep	T	Metabolism	Membrane Transport
13-Sep	R	Exam I	
18-Sep	T	Nerves and Neurons	Senses and Reflexes
20-Sep	R	Synaptic Transmission and PSPs	
25-Sep	T	The Nervous System	Integrated Nerve Pathways
27-Sep	R	Muscle contraction	
2-Oct	T	Muscle metabolism	The Electromyogram
4-Oct	R	Muscle metabolism	
9-Oct	T	EXAM II	<i>Columbus Day-No labs</i>
11-Oct	R	Blood and the Cardiovascular System	
16-Oct	T	Hearts and Circulation	Lab Exam I
18-Oct	R	Blood Pressure and Fluid Exchange	
23-Oct	T	Cardiovascular Reflexes	Cardiovascular Reflexes and the EKG
25-Oct	R	Pulmonary System	
30-Oct	T	Gas Exchange	Pulmonary Volumes and Capacities
1-Nov	R	EXAM III	
6-Nov	T	Renal Physiology	Renal Salt and Water Balance
8-Nov	R	Renal Homeostasis	
13-Nov	T	Digestion	<i>Veterans Day-No Labs</i>
15-Nov	R	Digestion	
20-Nov	T	Exam IV	The Electrogastrogram
22-Nov	R	No Class- Thanksgiving	
27-Nov	T	Metabolism	Exercise Physiology
29-Nov	R	Metabolism	
4-Dec	T	Endocrine	Lab Exam II
6-Dec	R	Endocrine	
		Exam V during Finals Week	

Don't Fall Behind! This is a difficult course due to the material, and it builds one day after the next. Skipping lectures, or putting off studying will result in you getting lost very quickly. If you keep up with the material, you will do much better and enjoy the course much more!!

YOU are responsible for YOUR education, but do not hesitate to get help when needed... Good Luck!