

**PRINCIPLES OF BIOLOGY (BIOL 1010-001) SYLLABUS**  
**MWF 1:00 – 1:50 pm; Room P167**

**Instructor: Dr. Katherine M. Schroeder**

Email: [kschroeder@csustan.edu](mailto:kschroeder@csustan.edu)

Office hours: Tuesdays: 11:30-1:30 am or by appointment, room N252

Office phone: 667-3838

**Scope of course:**

This course satisfies the B2 (biological science) lower division general education requirement. We will explore basic biological phenomena as they relate to all living organisms, specifically (1) molecules and cells, (2) genetics, (3) evolution and (4) ecology.

**Course objectives:**

After completing this course you should be able to (1) demonstrate your ability to think like a biologist, (2) speak & write coherently about biology with biologists and non-biologists alike, (3) apply biological knowledge to make informed decisions in your life.

**Required text and other materials:**

- Text: *Campbell Essential Biology CSUS Custom Edition* by Simon, Reese and Dickey OR *Campbell Essential Biology, 5<sup>th</sup> edition*. (Custom edition has fewer chapters but is otherwise the same as the regular version).
- Online access to Mastering Biology. Go to [masteringbiology.com](http://masteringbiology.com) and “register now”. You will need an access code, included with the purchase of a new textbook. If you have a used textbook, you will have to buy the access code separately. Once you access, you’ll need course ID MBSCHROEDER02164.
- Online access to BlackBoard
- Six Scantron 882-E sheets, and no. 2 pencil for exams

**Grading**

	Points	% of final grade
Midterm 1	100	20
Midterm 2	100	20
Midterm 3	100	20
Final exam	100	20
Homework	100	20
Total	500	100

**Midterm exams**

- five exams; two lowest scores dropped; multiple choice, matching, true or false

**Final exam**

- comprehensive

**Assignments: Mastering Biology**

- one assignment per chapter; due by 6pm on day after I finish lecturing on chapter.

**Final grade**

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

## Other

- Please check syllabus first if any questions; if still in doubt, then ask me
- No makeup exams
- Please make use of the many learning resources available to you, including MasteringBiology.com, and my office hours. In addition, free on-campus tutoring is available at 1) The Central Valley Math & Science Alliance (Naraghi Hall 124), and 2) Tutoring Services (CSUS Library 112).

<b>Tentative Course Outline</b>			
<b>Week</b>	<b>Date</b>	<b>Chapter Title</b>	<b>Chapter (begin)</b>
1	1/27	Overview	
	1/29	Introduction: Biology Today	1
	1/31		
2	2/3	Essential Chemistry for Biology	2
	2/5	The Molecules of Live	3
	2/7		
3	2/10	A Tour of the Cell	4
	2/12		
	2/14	Catch up; review	
4	<b>2/17</b>	<b>Exam 1</b>	
	2/19	The Working Cell	5
	2/21	Cellular Respiration: Obtaining Energy from Food	6
5	2/24		
	2/26	Photosynthesis: Using Light to Make Food	7
	2/28	Cellular Reproduction: Cells from Cells	8
6	3/3		
	3/5	Catch up; review	
	<b>3/7</b>	<b>Exam 2</b>	
7	3/10	Patterns of Inheritance	9
	3/12	The Structure and Function of DNA	10
	3/14		
8	3/17	How Genes are Controlled	11
	3/19	DNA Technology	12
	3/21		
9	3/24	Catch up; review	
	<b>3/26</b>	<b>Exam 3</b>	
	3/28	How Populations Evolve	13
10	3/31	How Biological Diversity Evolves	14
	4/2		
	4/4	The Evolution of Microbial Life	15
11	4/7	Plants, Fungi, and the Move onto Land	16
	4/9		
	4/11	Catch up; review	
12	<b>4/14</b>	<b>Exam 4</b>	
	4/16	The Evolution of Animals	17
	4/18	An Introduction to Ecology and the Biosphere	18
13	4/21	<b>Spring Break! (no classes all week)</b>	
	4/23		
	4/25		
14	4/28		
	4/30	Population Ecology	19
	5/2	Communities and Ecosystems	20
15	5/5		
	5/7	Catch up; review	
	5/9	<b>Warrior Day! (no classes after noon)</b>	
16	<b>5/12</b>	<b>Exam 5</b>	
	5/14	Movie day	
	5/16	Review for Final Exam; go over movie	
17	<b>5/23</b>	<b>Comprehensive Final Exam 11:15-1:15</b>	