

BIOL102: Foundations in Cell Biology—Fall 2014

MW 11:35 a.m.-12:50 p.m., **SSS 114**

PROFESSORS:

VALERIE HORSLEY (Assoc. Professor, in charge, gives lectures), valerie.horsley@yale.edu

KATHRYN GARDNER (Course coordinator for BIOL 101-104), kathryn.gardner@yale.edu

TEACHING FELLOWS/POSTDOCTORAL TEACHING SCHOLARS:

Lead TA: Becky Carlyle
Priya Date, Karina Vargas, SoRi Jang, William Gray, Gyong Ju (Liz) Min, Elise Jeffrey, Danielle Lyons, Wen (Elizabeth) Sun

Wednesday/Thursday/Friday discussion sections.

TEXT: “Life: The Science of Biology” 10th edition ([textbook or](#) ebook). All other assigned readings can be downloaded via the Classes*v2 web site.

LECTURES, READINGS, STUDY GUIDES: Lectures will usually be held Mondays and Wednesdays, 11:35 a.m.-12:50 p.m. Prior to each lecture, a reading assignment, study guide, and PDF of the slides to be used in lecture will be posted on the course web site on Classes*v2. It is recommended that you print out the lecture slides, bring them to lecture, and take notes on this paper printout.

WEBSITES: The Yale [Classes*v2](#) site for the course will post problem sets, answer keys, announcements, etc. The [Piazza](#) web site for the class allows you to post questions and have the instructors and other students post responses.

WEEKLY QUIZZES: Five lecture periods will start with a 15-minute quiz focused on material presented during the preceding two lectures. No information in the assigned readings that is not discussed in lectures will be on the quizzes or exam. You are responsible for information in lectures that is not covered in the textbook. We will drop your lowest quiz score in calculating your final grade. If you miss more than one quiz, you must have a Dean’s excuse for all quiz absences to avoid getting a score of zero for the second missed quiz. Your four top scores from the five quizzes will make up **35%** of your final grade.

HOMEWORK: Posted on the Classes*v2 website during the week, and submit your work via the site under “Assignments” by 11:35 a.m. the assigned days. The best four scores from your five homework assignments make up **25%** of your final grade. You may discuss the assigned exercises with classmates but must compose and write the answers independently. If you miss more than one homework, you must have a Dean’s excuse for each instance to avoid getting a score of zero for the second missed homework.

FINAL EXAM: Held during Exam Period on **TBD**, and will count for **30%** of your grade.

DISCUSSION SECTIONS: Five discussion sections will be held over the course of the module. Sections will be held on Wednesday, Thursday, or Friday and information regarding section registration will be posted soon. You must attend the section for which you are registered unless a special circumstance arises. In that case, you may go to another section with advance permission of its leader. Sections will begin **TBD**. You will receive a score worth **10%** of your grade for participation in exercises and discussions in section, so come prepared and participate.

GRADING: Your quizzes, homework, discussion section performance, and final exam generate a combined score for the course that will determine your grade. We will post on the course web site the distribution of scores for each graded exercise as the scores become available so you can see how you are doing relative to your classmates throughout the semester.

ENRICHMENT SECTIONS: Students who feel underprepared: may request to attend an optional one hour weekly enrichment section, led by Professor Kate Gardner. Space is limited and preference will be given to students who would benefit most. Signing up commits you to attend all the sessions. If you are interested, please fill out [this form](#). This meeting will catch you up on basic material that some of your classmates learned in advanced placement courses. Optional “Enrichment I” readings are included in the reading assignments posted on classes*v2. These provide an alternative presentation of the same material in the required readings from the Sadava textbook, and may clarify concepts students are having a hard time understanding.

BIOLOGY 102: FOUNDATIONS IN CELL BIOLOGY, FALL 2014

Lectures by Valerie Horsley

Mon., October 13	Lecture 1: Cells: Overview
Wed., October 15	Lecture 2: Cells: Organelles
Mon., October 20	Quiz 1 (on lectures 1,2)
	Lecture 3: Lipid bilayers: Function, Composition and Dynamics
<i>Fall Break October 21-October 26</i>	
Mon., October 27	Homework 1 (on lectures 1-3)
	Lecture 4: Nucleus
Wed., October 29	Quiz 2 (on lectures 3,4)
	Lecture 5: Targeting proteins in cells
October 29-31	Discussion 1
Mon., November 3	Homework 2 (on lectures 4,5)
	Lecture 6: Targeting proteins in cells II
Wed., November 5	Quiz 3 (on lectures 5,6)
	Lecture 7: Cellular signaling I
November 5-7	Discussion 2
Mon., November 10	Homework 3 (on lectures 6,7)
	Lecture 8: Cellular signaling II
Wed., November 12	Quiz 4 (on lectures 7,8)
	Lecture 9: Cell cycle and division
November 12-14	Discussion 3 (on lectures 8,9)
Mon., November 17	Homework 4 (on lectures 8,9)
	Lecture 10: Cellular scaffolding
Wed., November 19	Quiz 5 (on lectures 9,10)
	Lecture 11: Cellular adhesion
November 19-20	Discussion 4
<i>Thanksgiving break November 21-November 30</i>	
Mon., December 1	Homework 5 (on lectures 11-12)
	Lecture 12: Putting it all together: Immunology
Wed., December 3	Lecture 13: Immunology II
December 3-5	Discussion 5 (on lectures 12,13)
TBD	Final exam