

## **BILD 1—The Cell**

**Instructor:** Andrew Cooper (he/him/his)

**Office:** HSS 1145B (not super applicable now)

**E-mail:** a5cooper@ucsd.edu (Include BILD 1 in the subject line)

**Scheduled Lecture Time:** MWF 4:00-4:50p

**Office Hours:** MWF 4:00-5:00p (except exam days 2:30-4:00p)

### **Course Learning Objectives:**

By the end of this course, you should be able to:

- Compare and contrast how the structures of prokaryotic cells & eukaryotic cells impact how they function.
- Explain the relationship between chemical structures and functions of macromolecules.
- Predict how and when molecules may enter or exit cells.
- Analyze how energy is produced and used by cells, including cellular respiration and photosynthesis.
- Analyze how genotypes and environment interact to produce phenotypes.
- Explain mechanisms that lead to genetic diversity including mutation and meiotic recombination.
- Explain patterns and mechanisms of how inheritance and gene expression is regulated.
- Apply the central dogma to explain how traits and proteins arise from genes.

**Lecture Structure:** For every lecture day a video will be posted on Canvas. You need to watch the lecture video by the end of that lecture day. You will be required to complete some activity/reflection after watching the lecture video for participation credit (see below). Generally, the video will be posted the at noon the day before, however if there is a delay in video posting, I will extend the time and make an announcement on Canvas.

**Contacting Me:** Please ensure that all e-mails include BILD1 in the subject line and if the matter requires immediate attention include URGENT in the subject line as well. If I do not respond to an e-mail within 24-48 hours please send it again. I regularly check my e-mail during normal business time (Weekdays 9:00 am-6:00 pm).

**Optional Text:** *Campbell Biology, 11<sup>th</sup> Edition* by Urry, Cain, Wasserman, Minorsky and Reese (Pearson 2016) ISBN 9780134093413. On the class schedule there will be parts of chapters from the text indicated that match with the lecture topics. These readings are not required but can be a good resource if you are confused about certain terms/concepts.

**Canvas:** All course related information will be posted on our Canvas site. The lecture slides will be posted at the same time as the lecture video. Please check the Canvas site and your UCSD e-mail regularly for any announcements as these will contain essential information.

**Podcast:** Lectures will not be posted through the traditional podcast site. Instead, you will find videos of the lectures posted on Canvas along with the slides.

**iClickers:** Since this course will be online only, we will not be using clickers, however there will be other mechanisms for participation and engagement with the lectures.

### Instructional Assistants (IAs):

Name	Email
Bianca Parisi	<a href="mailto:biparisi@ucsd.edu">biparisi@ucsd.edu</a>
Anngely Leeds	<a href="mailto:acleeds@ucsd.edu">acleeds@ucsd.edu</a>
Kate Lin	<a href="mailto:k4lin@ucsd.edu">k4lin@ucsd.edu</a>
Noelia Lopez	<a href="mailto:nnl007@ucsd.edu">nnl007@ucsd.edu</a>
Daphne Pham	<a href="mailto:d1pham@ucsd.edu">d1pham@ucsd.edu</a>

**Discussion Sections:** Sections begin Monday, April 5<sup>th</sup>. The content will vary from meeting to meeting, however, active engagement with the material in each section is critical to developing your understanding of the lecture material. A portion of your grade will be based on attendance and active participation in section. Discussion sections will be done remotely through Zoom. You are required to attend/participate in your designated discussion time to ensure equal student:IA ratio among the sections. When you join the Zoom meeting room to participate in discussion sections your real name (as it appears on Canvas) must be set as your screenname so that you receive credit for attendance/participation. If you experience extenuating circumstances that prohibit you from attending section, please let me know as soon as possible. I will evaluate these instances on a case-by-case basis. If you predict an ongoing inability to attend scheduled discussion section, such as internet issues or time-zone challenges please speak with me as soon as possible to work out an alternative.

**Assignments:** There will be six assignments posted throughout the quarter that will allow you to work with the lecture material and prepare for the exams. These will be posted on Friday afternoon (1:00 pm) and will be due Monday evening (8:00 pm). You are welcome to work with each other but the words submitted for your assignment should be your own. These assignments will be submitted by uploading to Gradescope and will be checked for plagiarism.

Assignment #1 – Topics 1	Posted 4/2	Due 4/5
Assignment #2 – Topics 2-3	Posted 4/9	Due 4/12
Assignment #3 – Topic 5-6	Posted 4/22	Due 4/25
Assignment #4 – Topics 9	Posted 5/7	Due 5/10
Assignment #5 – Topics 10-11	Posted 5/14	Due 5/17
Assignment #6 – Topics 13-14	Posted 5/28	Due 5/31

**Exams:** The exams dates are set and will not be changed so plan your semester accordingly. Exam 1 is scheduled for Friday, April 16<sup>th</sup> and will cover material on Topics 1-4. Exam 2 is scheduled for Monday, May 3<sup>rd</sup> and will cover material on Topics 5-8. Exam 3 is scheduled for Friday, May 21<sup>st</sup> and will cover material on Topics 9-12. The Final Exam is scheduled for Thursday, June 10<sup>th</sup> from 3:00-5:00p and will be cumulative (1/3 focused on Topics 1-12 and 2/3 focused on Topics 13-16). If you do better on the Final than one (or all of the exams) then your Final score will replace the lowest Exam score (more details below). All exams will be done online during the regularly scheduled lecture time (4:00-5:00p). The exam will be given through Gradescope and will be checked for plagiarism. While taking the exam you will be logged into Zoom with either myself or an IA so that any issues or questions about the exam can be readily answered. You should have your student ID (or other photo ID) with you and be able to turn on your camera during the exam so that your identity can be verified if asked.

**Regrades:** Any issues or concerns with grading on an assignment or an exam must be addressed/submitted within one week of grades/feedback being posted. The exact protocol will be explained in more detail once the first assignment is graded. I reserve the right to make changes to the regrades policy if I find that students are abusing the option.

**Lecture Participation Points:** Lectures will be delivered through pre-recorded videos that will be posted to canvas for each lecture day. For each lecture there will be associated participation quiz that must be completed. These quizzes will consist of 3 or 4 multiple-choice or true/false questions. You will get two attempts for each participation quiz. These activities will be available once the video is posted and need to be completed and submitted by the end of the day

**Grading:** Grading in this course is not curved, so in theory every person could earn an A! You are not competing with each other for grades, so work together!

	Option 1	Option 2	Option 3	Option 4	Letter grades are assigned as follows: 90-100: A 80-89: B 70-79: C 60-69: D Below 60: F
Lecture Participation	5%	5%	5%	5%	
Discussion Section	10%	10%	10%	10%	
Assignments	10%	10%	10%	10%	
Exam 1	15%	0%	15%	15%	
Exam 2	15%	15%	0%	15%	
Exam 3	15%	15%	15%	0%	
Final	30%	45%	45%	45%	
Total	100%	100%	100%	100%	

Your final grade will be calculated using each of these possible point distributions and the one that results in the highest grade will be used.

**Late Work Policy:** Post-Lecture activities for participation will close at the end of the day. Late submissions will not be accepted. For all assignments, those turned in within 24 hours of the due date will be accepted but with a deduction of 20% of the possible

points. Assignments submitted more than 24 hours after the due date will not be accepted.

If you experience extenuating circumstances (e.g., you are hospitalized) that prohibit you from submitting your assignments on time, please let me know. I will evaluate these instances on a case-by-case basis.

**Disability Access:** Students requesting accommodations for this course due to a disability must provide a current Authorization for Accommodation (AFA) letter (paper or electronic) issued by the Office for Students with Disabilities (link to OSD website.) Students are required to discuss accommodation arrangements with instructors and OSD liaisons in the department in advance of any exams or assignments.

Contact the OSD for further information:

858.534.4382

[osd@ucsd.edu](mailto:osd@ucsd.edu)

<http://disabilities.ucsd.edu>

**Inclusion:** It is our goal to create a learning environment that supports diversity of thought, perspective, experience, and identities. We encourage all of you to participate in discussion and contribute to the field from your perspective. If you have feedback on how to make the class more inclusive, please get in touch!

Office of Equity, Diversity, and Inclusion:

858.822.3542

[diversity@ucsd.edu](mailto:diversity@ucsd.edu)

<https://diversity.ucsd.edu>

<https://students.ucsd.edu/student-life/diversity/index.html>

<https://regents.universityofcalifornia.edu/governance/policies/4400.html>

**Title IX Compliance:** The University recognizes the inherent dignity of all individuals and promotes respect for all people. Sexual misconduct, physical and/or psychological abuse will NOT be tolerated. If you have been the victim of sexual misconduct, physical and/or psychological abuse, we encourage you to report this matter promptly. As a member of this community, I am interested in promoting a safe and healthy environment, and should I learn of any sexual misconduct, physical and/or psychological abuse, I must report the matter to the Title IX Coordinator. If you want to speak confidentially you may contact the Counseling Center.

The Office for the Prevention of Harassment & Discrimination (OPHD) provides assistance to students, faculty, and staff regarding reports of bias, harassment, and discrimination. OPHD is the UC San Diego Title IX office. Title IX of the Education Amendments of 1972 is the federal law that prohibits sex discrimination in educational institutions that are recipients of federal funds. Students have the right to an educational environment that is free from harassment and discrimination.

Students have options for reporting incidents of sexual violence and sexual harassment. Sexual violence includes sexual assault, dating violence, domestic violence, and stalking. Information about reporting options may be obtained at OPHD at:

858.534.8298      [ophd@ucsd.edu](mailto:ophd@ucsd.edu)      <http://ophd.ucsd.edu>

Students may receive confidential assistance at CARE at the Sexual Assault Resource Center at: 858.534.5793      [sarc@ucsd.edu](mailto:sarc@ucsd.edu)      <http://care.ucsd.edu>

Counseling and Psychological Services (CAPS) at: 858.534.3755      <http://caps.ucsd.edu>

Students may feel more comfortable discussing their particular concern with a trusted employee. This may be a student affairs staff member, a department Chair, a faculty member or other University official. These individuals have an obligation to report incidents of sexual violence and sexual harassment to OPHD. This does not necessarily mean that a formal complaint will be filed. If you find yourself in an uncomfortable situation, ask for help.

**Academic Integrity:** Students are expected to do their own work, as outlined in the UCSD Policy on Academic Integrity. Cheating and plagiarism will not be tolerated, and I will fail any student caught engaging in academic dishonesty. Any student caught cheating on an exam will receive a failing grade for the course. Plagiarism of any kind will not be tolerated and will result in a failing grade. If you are unsure of what constitutes plagiarism it is your responsibility to seek out clarifying information. The UCSD library website has a series of modules around plagiarism that can be found [here](#).

**Writing Center:** The Writing Center provides support for undergraduates working on course papers (i.e., laboratory reports and the research proposal) and independent writing projects. Writing mentors can help at any stage of the writing process, from brainstorming to final polishing.

The Writing Center offers: one-on-one appointments for undergraduates with peer writing mentors; group workshops addressing a variety of writing projects, genres, and issues; and Drop-In Zone for quick questions, targeted assistance, and a comfortable writing space.      <https://writingcenter.ucsd.edu/>

**Basic Needs:** Any student who has difficulty accessing sufficient food to eat every day, or who lacks a safe and stable place to live, and believes this may affect their performance in this course, is encouraged to contact:

858.246.2632      [foodpantry@ucsd.edu](mailto:foodpantry@ucsd.edu)      [basicneeds@ucsd.edu](mailto:basicneeds@ucsd.edu)

### **Technical Support:**

For help with accounts, network, and technical issues:  
<https://acms.ucsd.edu/contact/index.html>

For help connecting to electronic library resources such as eReserves and e-journals:

<https://library.ucsd.edu/computing-and-technology/connect-from-off-campus/>