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Office hours: By appointment
Class website: <https://canvas.ucsd.edu/>

Biology Instructional Assistant Manual: <https://biology.ucsd.edu/files/education/undergrad/resources/experience/Biology-IA-Manual-SP20.pdf>

Class schedule:

This is an in-person class. I encourage you to attend the section you registered for, because space can become limited. However, if an unavoidable situation arises please get in touch and attend another session.

Mondays 11:30am-12:50pm PST Pacific Hall 3500
Mondays 1:30pm-2:50pm Pacific Hall 3500
Tuesdays 4:00pm-5:20pm Pacific Hall 3500

We often do work online during our class sessions using Google Docs so it can be handy to have a tablet or laptop if you have one. Since we are often working in groups of 3-4, if one person has a device that is sufficient.

Course overview

These courses deal with learning and teaching of biology in the college classroom. Weekly seminars include interactive discussions on the science of learning and evidence of effective and inclusive teaching. We will explore issues such as constructivist learning and equity and inclusion as they apply to biology education. These courses also involve participation in apprentice teaching under mentorship of faculty.

Learning goals for this course:

- Recognize the value of diverse learning communities and how they influence student learning
- Apply strategies to establish learning communities comprising diverse groups of learners
- Engage in evidence-based teaching practices and explain how they can promote an inclusive classroom
- Reflect on our teaching practices and draw upon our own learning community to enhance our understanding of teaching and learning and our teaching practices

Course structure

In addition to apprentice teaching, BGGN 500 and BISP 195 are organized around weekly seminars. We will engage in interactive activities to explore issues in biology education while simultaneously learn different methodologies of teaching. We will also strive to develop a deeper understanding of learning and teaching. Everyone plays a critical role in learning from one another's knowledge and experiences. Active contribution is essential because many ideas that will be developed during discussions cannot be easily captured by make-up assignments. Contribution is different from attendance or participation. Attendance means being physically present. Participation means having completed the required activities. Contribution involves attendance, participation, and active mental engagement that ultimately

results in learning. We are expected to contribute fully in our interactive activities, which include active listening and respectful conversations. As part of our mutual responsibility, we will begin promptly each week.

Course Requirements

Apprentice teaching: A majority of the activities in BGGN 500 and BISP 195 is apprentice teaching. This involves collaborating and working with faculty and fellow instructional assistants in helping students learn and succeed in courses. Specific responsibilities will vary in individual courses.

Class participation and Reflections: Each week we will do two brief reflections. 1. At the end of each class (what you plan to implement), and 2. At the end of the week. The end of week reflection will focus on what teaching practices you implemented in your discussion or laboratory sections in the preceding week, how the section went, and how you might improve in the future. End of class reflections will be administered in class, and end of week reflections are on Canvas. Please check the Canvas site for due dates and add them to your calendar. The graduate teaching mentors will summarize these reflections at the beginning of each seminar so we can learn about and learn from our reflective practices.

Journal club discussion (BGGN 500 only): The graduate component of this course is a journal-club meeting in week 6, as journal club is a signature pedagogy in biological sciences. We will examine major aspects of learning, cognitive and affective, through discussions of primary literature papers.

Grading

This course employs a mastery performance framework whereby course requirements are scored as target or unacceptable. Feedback can be requested for all work for improvement and learning. Each student will engage in the course requirements. Final grades will be based on the following guidelines:

S/P (Satisfactory/Pass) = Target or satisfactory performance on all of the following:

- 1) Satisfactory apprentice teaching
- 2) Active engagement in **all** weekly seminars (BGGN 500 also includes week 6 journal club)
- 3) On-time and target-level completion of all assigned reflections

U/NP (Unsatisfactory/No Pass) = Failure to complete any one of the criteria listed above

In general, we are unable to accept late or missing work. However, we acknowledge that emergencies do occur. If you have an illness or serious emergency, please contact your instructor as soon as possible or reasonable to do so. We are here to help you be successful!

Course schedule

Week	Seminar Topic	Assignments Due
1	Introductions	- Pre-class survey - End of class survey (released in class)
2	Equity, diversity, and inclusion in the classroom	- Reflection #1, Sunday Apr 9, 11:59pm

		- End of class survey (released in class)
3	Effective and inclusive collaborative learning	- Reflection #2, Sunday, Apr 16, 11:59pm - End of class survey (released in class)
4	Science of learning and learning outcomes	- Reflection #3, Sunday, Apr 23, 11:59pm - End of class survey (released in class)
5	Metacognition and learning	- Reflection #4, Sunday, Apr 30, 11:59pm - End of class survey (released in class)
6	Journal article review (BGGN 500 only)	- Reflection #5, Sunday, May 7, 11:59pm

Detailed Weekly Schedule

Week	Seminar Topic	Learning Goals
1	Introduction to the college classroom	<ul style="list-style-type: none"> Identify common conceptions of learning, and describe how they influence our practices Describe strategies we can implement to promote students to acquire their own knowledge (a learning-focused classroom)
2	Equity, diversity, and inclusion in the classroom	<ul style="list-style-type: none"> Recognize that both internal and external identities contribute to diversity in your class Discuss and predict how stereotypes can affect the performance of your students Identify how instructor and student mindset can affect student learning
3	Effective and inclusive collaborative learning	<ul style="list-style-type: none"> Describe what we can do to promote productive small-group discussions and collaborative learning Describe how teacher conceptions of learning may influence practices, and thus student outcomes. Explain the role of growth mindset in learning
4	Science of learning and learning outcomes	<ul style="list-style-type: none"> Explain the differences between constructivist and transmissionist frameworks of learning Identify how experts and novices may differ in their approach to solving problems

		<ul style="list-style-type: none"> ● Identify knowledge and cognitive actions required for students to achieve course goals ● Align activities with course goals (knowledge and cognitive actions)
5	Metacognition and learning	<ul style="list-style-type: none"> ● Describe how metacognition can influence learning ● Explain teaching practices that can promote metacognition ● Explain the 5E learning cycle and how it can be used to facilitate student learning
6	Science identity and mentoring in research	<ul style="list-style-type: none"> ● Identify the research questions from a selected education article ● Discuss conclusions and implications for teaching, learning, and mentoring

Principles of community | Website: <https://ucsd.edu/about/principles.html>

Our campus is dedicated to learning, teaching, and serving society through education, research, and public service. Our international reputation for excellence is due in large part to the cooperative and entrepreneurial nature of the UC San Diego community. Faculty, staff, and students are encouraged to be creative and are rewarded for individual as well as collaborative achievements.

To foster the best possible working and learning environment, we strive to maintain a climate of fairness, cooperation, and professionalism. These principles of community are vital to the success of the University and the well-being of its constituents. Faculty, staff, and students are expected to practice these basic principles as individuals and in groups.

ACCESSIBILITY

<http://disabilities.ucsd.edu> | osd@ucsd.edu | 858-534-4382

Any student with a disability is welcome to contact us early in the quarter to work out reasonable accommodations to support their success in this course. Students requesting accommodations for this course due to a disability must provide a current Authorization for Accommodation (AFA) letter issued by the Office for Students with Disabilities (OSD). Students are required to present their AFA letters to faculty and to the OSD Liaison in the Division of Biological Sciences in advance so that accommodations may be arranged. Whenever possible, we will use universal designs that are inclusive. If you have feedback on how to make the class more accessible, please get in touch!

INCLUSION

It is my goal to create a learning environment that supports diversity of thought, perspective, experience, and identities. I 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 | <https://diversity.ucsd.edu/>
<https://students.ucsd.edu/student-life/diversity/index.html>

ACADEMIC INTEGRITY

<https://students.ucsd.edu/academics/academic-integrity/index.html> | aio@ucsd.edu | 858-822-2163

Integrity of scholarship is essential for an academic community. The university expects that both students and faculty will honor this principle and in so doing protect the validity of intellectual work. For students, this means that all academic work will be done by the individual(s) to whom it is assigned, without unauthorized aid of any kind. In our course, we need to establish a set of shared values.

Following are values adopted* from the International Center for Academic Integrity (<http://www.academicintegrity.org/icai/home.php>), which are open to discussion and possible alteration. These values include: honesty, responsibility, respect, fairness, and trustworthiness.

	As students we will.....	As the teaching team we will.....
Honesty	<ul style="list-style-type: none"> Honestly demonstrate your knowledge and abilities according to expectations listed in the syllabus or in relation to specific assignments and exams Communicate openly without using deception, including citing appropriate sources 	<ul style="list-style-type: none"> Give you honest feedback on your demonstration of knowledge and abilities on assignments and exams Communicate openly and honestly about the expectations and standards of the course through the syllabus and in relation to assignments and exams
Responsibility	<ul style="list-style-type: none"> Complete assignments on time and in full preparation for class Show up to class on time and be mentally and physically present Participate fully and contribute to team learning and activities 	<ul style="list-style-type: none"> Give you timely feedback on your assignments and exams Show up to class on time and be mentally and physically present Create relevant assessments and class activities
Respect	<ul style="list-style-type: none"> Speak openly with one another while respecting diverse viewpoints and perspectives Provide sufficient space for others to voice their ideas 	<ul style="list-style-type: none"> Respect your perspectives even while we challenge you to think more deeply and critically Help facilitate respectful exchange of ideas
Fairness	<ul style="list-style-type: none"> Contribute fully and equally to collaborative work, so that we are not freeloading off of others on our teams Not seek unfair advantage over fellow students in the course 	<ul style="list-style-type: none"> Create fair assignments and exams and grade them in a fair and timely manner Treat all students and collaborative teams equally
Trustworthiness	<ul style="list-style-type: none"> Not engage in personal affairs while on class time Be open and transparent about what we are doing in class Not distribute course materials to others in an unauthorized fashion 	<ul style="list-style-type: none"> Be available to all students when we say we will be Follow through on our promises Not modify the expectations or standards without communicating with everyone in the course
Courage	<ul style="list-style-type: none"> Say or do something when we see actions that undermine any of the above values Accept the consequences of upholding and protecting the above values 	<ul style="list-style-type: none"> Say or do something when we see actions that undermine any of the above values Accept the consequences of upholding and protecting the above values

* This class statement of values is adapted with permission from Tricia Bertram Gallant, Ph.D.

All course materials are the property of the instructor, the course, and the University of California, San Diego and may not be posted online, submitted to private or public repositories, or distributed to unauthorized people outside of the course. Any suspected instances of a breach of academic integrity will be reported to the Academic Integrity Office.

DISCRIMINATION AND HARASSMENT

The University of California, in accordance with applicable federal and state laws and university policies, does not discriminate on the basis of race, color, national origin, religion, sex, gender, gender identity, gender expression, pregnancy (including pregnancy, childbirth, and medical conditions related to pregnancy or childbirth), physical or mental disability, medical condition, genetic information, ancestry, marital status, age, sexual orientation, citizenship, or service in the uniformed services (including membership, application for membership, performance of service, application for service, or obligation for service in the uniformed services). The university also prohibits harassment based on these protected categories, including sexual harassment, as well as sexual assault, domestic violence, dating violence, and stalking. The nondiscrimination policy covers admission, access, and treatment in university programs and activities.

If students have questions about student-related nondiscrimination policies or concerns about possible discrimination or harassment, they should contact the Office for the Prevention of Harassment & Discrimination (OPHD) at (858) 534-8298, <https://ophd.ucsd.edu/>, or <http://ophd.ucsd.edu/report-bias/index.html>

Campus policies provide for a prompt and effective response to student complaints. This response may include alternative resolution procedures or formal investigation. Students will be informed about complaint resolution options. A student who chooses not to report may still contact CARE at the Sexual Assault Resource Center for more information, emotional support, individual and group counseling, and/or assistance with obtaining a medical exam. For off-campus support services, a student may contact the Center for Community Solutions. Other confidential resources on campus include Counseling and Psychological Services, Office of the Ombuds, and Student Health Services.

CARE at the Sexual Assault Resource Center: 858.534.5793 | sarc@ucsd.edu | <https://care.ucsd.edu>
Counseling and Psychological Services (CAPS): 858.534.3755 | <https://caps.ucsd.edu>

CHILDREN IN CLASS

I understand that childcare situations can be complicated. You are welcome to have children with you during our class sessions. Please be prepared to step out if a child you bring to class is disruptive to student learning. Please get in touch with me if you have any questions or concerns.

General Resources

Teaching remotely

If you are teaching online this quarter it is highly recommended that you practice using Zoom in a teaching capacity and access the sessions offered by the Teaching and Learning Commons:

Getting started with Zoom: <https://edtech.ucsd.edu/education-continuity-tools-and-resources/zoom-guides.html>

Zoom tutorials: <https://support.zoom.us/hc/en-us/articles/206618765-Zoom-Video-Tutorials>

TLC Sessions: <https://commons.ucsd.edu/covid-19/educators/index.html>

Return to Learn | Website: <https://returntolearn.ucsd.edu/return-to-campus/fall-2020-plan/index.html>

Campus will continue to monitor the spread of COVID-19, working closely with local, state, and national officials. For the latest updates to the campus community, visit the Current Campus Status page:
<https://returntolearn.ucsd.edu/news-and-updates/status/index.html>

Virtual Campus | Website: <https://vcsa.ucsd.edu/student-success/virtual-resources.html>

- In need of access to laptop? Students may be able to request a loaner laptop:

<https://eforms.ucsd.edu/view.php?id=490887>

- Some computer labs are open: <https://lablookup.ucsd.edu/>

- Guidance on technology for students, including Canvas and Zoom, trouble-shooting, and resources for internet access: <https://digitallearning.ucsd.edu/learners/learning-remotely/tools.html>

ACADEMIC SUPPORT

Geisel Library	Research tools and eReserves
Content Tutoring with the Teaching + Learning Commons	Drop-in and online tutoring through the Academic Achievement Hub
Supplemental Instruction with the Teaching + Learning Commons	Peer-assisted study sessions through the Academic Achievement Hub to improve success in historically challenging courses
Writing Hub Services in the Teaching + Learning Commons	Improve writing skills and connect with a peer writing mentor
Learning Strategies Tutoring	Address learning challenges with a metacognitive approach
OASIS	Intellectual and personal development support
Student Success Coaching Program	Peer mentor program that provides students with information, resources, and support in meeting their goals
Academic Integrity	Policy on Academic Integrity of Scholarship and strategies to excel with integrity
Technical Support	Assistance with accounts, network, and technical issues
REAL Portal	Internships and other hands-on experiences

STUDENT RESOURCES

Basic Needs	Provides access to food, housing, and financial resources
Counseling and Psychological Services (CAPS)	Provides services like confidential counseling and consultations for psychiatric services and mental health programming
Community Centers	As part of the Office of Equity, Diversity, and Inclusion the campus community centers provide programs and resources for students and contribute toward the evolution of a socially just campus
Counseling and Psychological Services	Individual, group, couples, and family psychotherapy services for registered undergraduate and graduate students

Office for Students with Disabilities	Documents students disabilities, provides accessibility resources, and reasonable accommodations
Triton Concern Line	Report students of concern at (858) 246-1111