BIO 181: General Biology I

Term: Spring 2023 | Class Number: 11288

Course and Faculty Information

Instructor: Anna M. Cunningham, PhD (Dr. C)

Pronouns: She / her / hers

Contact Information: anna.m.cunningham@asu.edu

Scheduled Class Meeting Time

- Lecture: Tuesdays & Thursdays 9 – 10:15am in Sands Kiva (ASU West campus)
- Discussions (informal recitation): TBD during the first week of class (please fill in this survey to indicate your availability); Zoom

Office Hours

- Times
  - **Tuesdays & Thursdays 11:00 AM – 12:00 PM** (*subject to change)
  - Additional office hours available by request! ← ***the best option!!!***
- Location: **CLCC 274** or via Zoom

The best bet is to schedule office hours with me! To do this, e-mail me with three suggested dates/times that work for you, and I will make it work!

Note: Although I will do my best to respond to e-mails promptly, I cannot guarantee with certainty that I will be able to do so outside of working hours (M – F 8a – 5p). However, my goal is to always respond within two working days!

Course Description

Biology 181 lecture and laboratory is designed to give students a survey of the basic theories of the discipline and the relationship between structure and function in living organisms at the molecular, cellular, organismal, and population levels. This course is designed to be taken as the first of a two-semester series. The second semester (BIO 182) should be taken after this course.

Credits

4 (in combination with lab).

Student Work Expectations

For this 4-credit hour course, you should plan to spend the equivalent of 6 hours of direct instruction (3 hours lecture, 3 hours lab) and about 12 hours per out of class student work (studying, homework) for an estimated total of about 18 hours per week. Workload will vary depending on week – some weeks (*eg*: exam weeks or weeks when a lab report is due) may be more time consuming than others.

Final Exam Day & Time

Thursday, May 4 7:30am – 9:20am

Course Learning Outcomes – what you will learn!

At the completion of this course:

Lecture

1. Students will identify the characteristics of life and use them to evaluate living from nonliving organisms.
2. Students will understand the relationship of structure and function and regulation of biological systems via homeostatic mechanisms.
3. Students will describe the structure of atoms, molecules, and chemical bonds.
4. Students will explain the properties of water that contribute to life.
5. Students will identify the structure and function of the four major biological macromolecules: carbohydrates, lipids, proteins, and nucleic acids.
6. Students will describe the structure and function of biological membranes.
7. Students will interpret cellular permeability and compare and contrast passive and active transport mechanism.
8. Students will identify the components of cells and recognize their function.
9. Students will differentiate prokaryotic and eukaryotic cells.
10. Students will recognize the structures and processes that enable cellular connection and communication.
11. Students will grasp the importance of enzymes, their mode of action, and their regulation in relation to biological processes.
12. Students will review the major steps of integral metabolic pathways (cellular respiration and photosynthesis) and understand their central role in ecological energy and carbon cycling.
13. Students will be able to differentiate the processes aerobic cellular respiration, anaerobic cellular respiration, and fermentation.
14. Students will classify organisms into trophic levels based on their carbon and energy requirements for anabolism.
15. Students will predict protein sequence based on a provided DNA strand.
16. Students will extrapolate the type of mutation that has occurred based on the change in a DNA sequence.
17. Students will recognize how gene expression is regulated in prokaryotic and eukaryotic organisms.
18. Students will recall how DNA is stored in a cell.
19. Students will summarize the cell cycle, DNA replication, and the importance of the regulation of these processes.
20. Students will identify and contrast the processes of mitosis and meiosis.
21. Students will use Punnett Squares to predict the inheritance patterns of Mendelian and non-Mendelian traits.

Lab

1. Students will work effectively in a collaborative, group dynamic.
2. Students will operate and conduct experiments safely in a lab environment.
3. Students will be able to search, find, read, interpret, effectively use, and cite scientific literature.

4. Students will apply principles of the scientific method to plan, conduct, and analyze experiments.
5. Students will identify and use the metric system.
6. Students will operate a microscope.
7. Students will use pipettes and micropipettes.
8. Students will construct graphs that accurately portrays quantitative data.
9. Students will report data collected during experiments via written lab reports and oral presentations.

Textbook

We will use the following for this course:

ASU Custom Connect Access for Principles of Biology – 3rd edition by Brooker, et al. 9781264369515

This will cost approximately $60.

Students will automatically be enrolled in this program. If students wish to opt-out they must do so by the school's deadline. Students begin receiving e-mails at their ASU accounts with notification about the Inclusive Access "Opt-Out" deadline approximately three days prior to the start of class and will continue receiving periodic e-mail reminders through the add/drop deadline. Materials charges will be posted to participating students' ASU accounts approximately 2-3 days after the add/drop deadline. The charge will appear under the item type: **Bkstr Publisher Negotiate Rate.**

Watch this video to learn how to register for Connect.

To "Opt-In", students simply need to register for Connect through Canvas. **I will create an assignment called "Connect Opt-in & Orientation Assignment" – completing this assignment will require your registration, thus ensuring you have opted in to the program.** Approximately 2-3 days after the drop/add date (January 15, 2023), students will see the Bkstr Publisher Negotiate Rate charge on their ASU account.

It's important to know that while students may choose to opt-out, Connect is required for this course and will be more expensive if purchased elsewhere.

If you wish to opt-out, simply click on the Follett link in the e-mail which will open the opt-out portal. Note that this portal will open approximately 5 days before classes start.

Click "Create an Account" and enter your ASU e-mail address. Please note: ASU e-mail addresses are configured in two different ways: firstname.lastname@asu.edu and asurite@asu.edu. Our system will only recognize one, so if the first configuration doesn't work, please try the second configuration (Helpful Hint: the Follett system will match how the student's e-mail displays in the ASU Directory).

For questions and support, please reach out to the ASU Inclusive Access team using the e-mail asuinclusiveaccess@gmail.com.

If you accidentally opt-out, you can opt-in again through the portal link sent in the Follett e-mail. However, this must be done prior to the add/drop deadline (January 15, 2023)!

If you would like to purchase the loose-leaf textbook (not required), you can do so in two ways. First, the ASU Bookstore will offer the loose-leaf textbook for approximately $40 (ISBN: 9781264260836***). This print upgrade***

is available only for students participating in the Inclusive Access Program. Note: to ensure that only participating students are able to purchase, the book info for the upgrade will NOT appear in the course listing until the first day of classes. At that time, students may purchase either through the Bookstore website or in-person with ISBN 9781264260836. In-person customers will need to ask for the upgrade at the **Text Info** counter, as we need to verify enrollment in the program. Second, Connect sells a "loose-leaf print upgrade" for $42 (free shipping and handling). Learn how to make this purchase here.

Connect Support

Technical issues with Connect must be directed to McGraw Hill support. If you contact me, please reference your McGraw Hill Support Request number. **Deadlines will not be extended regardless of technical issues**.

- ASU designated Tech support: 855-423-9041 (M-Th 24hrs; F 12a – 9pm; Sat 10a – 8p; Sun 12p – 12a EST)
- McGraw Hill: 1-800-331-5094 (M – Th 24hrs; F 12am – 9pm; Sat 10am – 8pm; Sun 12pm – 12am EST)
- E-mail/chat: McGraw Hill Support website
- The McGraw Hill Contact Us website

iClicker Student Response System (Mobile)

During lectures, we will use the iClicker Reef App. This student response system is **FREE** to all ASU Students and can be access via the iClicker cloud app on your mobile device or through the Reef Education website. You will need to participate with the iClicker Reef app on a smartphone, tablet or laptop. **It is your responsibility to properly register your iClicker Reef account in a timely fashion**. It is also your responsibility to regularly check your iClicker records for any discrepancies and bring them to my attention within 48 hours. iClicker grade discrepancies cannot be contested after this time.

Please register for your iClicker class using this join code: https://join.iclicker.com/GHCV

When you are brought to the sign in page, be sure to scroll to "**Need to sign in through your campus portal?**" and use the drop-down menu to select **Arizona State University**. You will then be prompted to sign in using your **ASUrite**.

Student Success

To be successful:

- come to class! Participate!
- check the Canvas course daily
- read & respond to course announcements & e-mails
- complete assignments by the due dates specified
- communicate regularly with your instructor and peers
- create a study and/or assignment schedule to stay on track
- use STUDY HUB on Canvas
- access ASU Student Resources

Attendance

Please note that this class is delivered in-person. Attendance to and participation in class is an essential part of the learning process, and students are expected to attend class, in person, regularly. While attendance will not

be monitored strictly speaking, iClickers and other in-class activities will require attendance for participation and points. Some absences are, however, unavoidable! Excused absences for classes will be given without penalty to the grade in the case of

1. A university-sanctioned event [ACD 304-02]
2. Religious holidays [ACD 304-04]
3. Work performed in the line-of-duty according [SSM 201-18]

Anticipated absences for university-sanctioned events, religious holidays, or line-of-duty activity should be communicated to the instructor by ***email*** *(**anna.m.cunningham@asu.edu**)* at least ***one week*** before the expected absence.

If you are sick, please stay home for rest and recuperation! Lectures will be recorded. iClicker points per day will vary, but will not exceed 5 points on any individual day (and in total are only worth ~2% or less of your overall grade). In-class assignments will require attendance, but these will be minimal and announced in advance (we will not have pop quizzes). If you must miss an assignment due to illness, this will need to be formally excused through Student Advocacy and Assistance and/or documented by a health professional (i.e. Student Health Services or other medical providers) and communicated to the instructor as soon as possible by ***email*** *(**anna.m.cunningham@asu.edu**).*

Note: excused absences do not relieve students from responsibility for any part of the course work required during the period of absence. It is the student's responsibility to provide a plan/work with instructor on missed course material will be made up.

If there is a disagreement as to whether an absence should be accommodated, the instructor and student should can reach out to MNSGrievances@exchange.asu.edu.

Grading

Your BIO 181 grade will be based on a combination of your lecture (65%) and lab grade (35%)

Lecture (65%) + Lab (35%) = total (100%)

Lecture grade (65%)

- Unit Exams (32%)
- Final Exam (10%)
- Weekly Concept Checks (10%)
- Assignments (4%)
- LearnSmart Reading Assignments (3%)
- Muddiest Point Discussions (2%)
- Connect Reviews (2.5%)
- Topic Review Projects (1.5%)

Lab grade (35%)

This course will be graded on an A-E plus/minus scale.

Letter Grade	Percent Range
A+	96.45-100%
A	91.45-96.44%
A-	89.45-91.44%
B+	86.45-89.44%
B	82.45-86.44%

B-	79.45-82.44%
C+	76.45-79.44%
C	69.45-76.44%
D	59.45-69.44%
E	0-59.44%

You will receive a grade of E if you earn less than 59.44% or fail to complete the course by the established date or without the benefit of an official withdrawal.

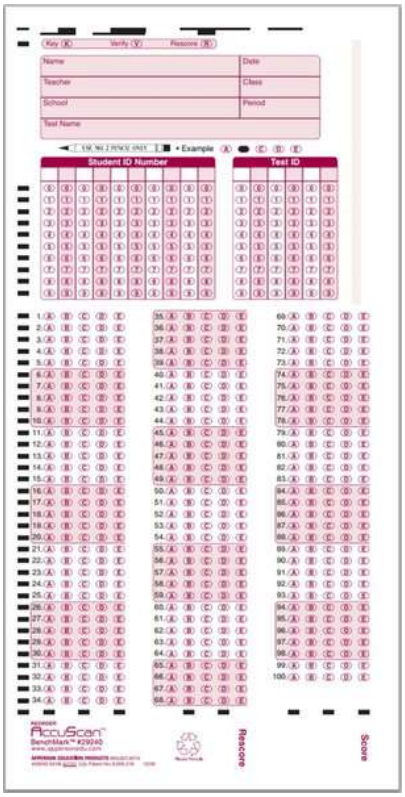
For ASU's grading scale, policies, and definitions visit the ASU Registrar's webpage detailing Grades and Grading Policies.

NOTE: I do not round up, offer additional work/bonus opportunities, or alter grades in any way following posting of the final grade.

Assignment Descriptions

Unit Exams

Three unit exams will be administered throughout the semester. These will be 50 questions in a format of multiple choice, true/false, or similar. Material covered will be cumulative. Unit exams will be administered during class time. Exams cannot be made up, although a unit exam score can be replaced with your score on the final exam (this does not mean that the final exam is dropped).



Unit exams (and the final exam) will be completed via Scantron (**maroon half-sheet, answer sheet 29240*; see image to right***). It is recommended that these are purchased at the ASU West campus Bookstore - the Tempe bookstore may not provide the correct form. You will need 4 Scantrons in total for the semester (3 unit exams + final exam). **Not bringing a Scantron, or bringing the incorrect Scantron form, will result in a 5-point reduction from your exam score.**

Note: the West campus bookstore opens at 10:00am (after our class starts!). So be sure to grab your Scantron BEFORE the day of the exam!

Reading Assignments (LearnSmart)

LearnSmart is an adaptive learning platform, accessed through McGraw Hill Connect, that is designed to guide you through assigned readings and check your understanding of what you read as you go. These are two be completed outside of class and will supplement and support course material. Some material will be covered exclusively in LearnSmart assignments and not in lecture. These assignments will range from 5 – 10 points and can typically take around 2 – 5 hours in total to complete. These assignments are able to be started and stopped (progress will be saved), thus they do not need to be completed in one sitting. It is recommended that these assignments are started early and completed progressively (e.g.: 30-45 minutes each day of the week) – *do not save these until the last minute to complete as they can be time consuming*!

Weekly Concept Checks

Most regular (non-exam) weeks, a concept check will open on Friday and close the following Monday (open/close days may vary). These are timed assessments and serve to assess your understanding of material covered the week prior in the LearnSmart reading and in-class lectures. **Concept Checks are meant to build your critical thinking skills and will require you to understand the material covered to the extent that you are able to apply it to challenging questions**. Thus, it is highly recommended that you study for these similar to how you would study for an exam. These will be in a variety of formats such as multiple choice, short answer, true/false, fill-in-the-blank, matching, identification, and etc. These will be in the form of Canvas Quizzes. Once the due date for quizzes passes, the answers will open up so that they can be used as study materials. **However, this also means that quizzes cannot be made up past the due date**.

Assignments

Various assignments will be administered in and out of class. These may take the form of an online discussion board post/reply, an in-class activity or worksheet, iClicker questions, or other. As these are typically participation-based, late submissions may not be accepted. Clicker questions will be awarded 50% participation, 50% correctness (1 point per question). Following exams, review sessions will be hosted in which iClickers will be used. For exam review sessions, points are awarded 100% based on correctness (1 point per question). Points earned on unit review sessions will serve as bonus points contributing to the corresponding exam.

Muddiest Point Discussions

Each week, you will be required to assess your understanding of the material covered so far via a class discussion. The following will be the format of the discussion.

- **Each student will create a post by Friday at 11:59pm containing**:
    1. **2 things you learned from the week's content and completely understand**. You will be required to explain your understanding of the concepts in detail.
    2. **1 thing you learned from the week's content and are unsure about**. You will need to explain your confusion or need for clarification. You will then make an effort to answer this question and provide citations (APA) for your answer (textbook & lectures are appropriate sources). For example: “I was confused about the difference between polar covalent bonds and nonpolar covalent bonds, but after watching this video (APA citation + link), I understand that the difference is how electrons are shared in the bond. In nonpolar covalent bonds, electrons are shared equivalently across the molecule, resulting in no polarity of charge across the molecule. However, when one molecule in a covalent bond is more electronegative than another, this may result in unequal sharing of electrons. If this results in the electrons spending more time near one atom than the other, this may result in a polar charge.”
    3. **1 question either out of confusion OR out of curiosity**. For example: "I understand that ___... so would this mean ___?" or "I am confused about ___. Can anyone clarify?" or “Can humans be bioengineered to perform photosynthesis?”
- **Each student will respond to TWO other students in an effort to address their final question from their post (confusion/curiosity) by Monday at 11:59pm**.
    - Responses must be constructive, not just "good job!" or "I agree" or "me too" or "me neither" etc.
    - Responses must be cited (APA; textbook & lectures are appropriate sources)
    - Responses must be kind-natured. As with everything else in this course, you are expected to be respectful of each other! Instances of disrespectful language or behavior will be considered violations of the Student Code of Conduct and will be grounds for dismissal from the course. While I appreciate sarcasm, it doesn't translate well via text. If you're not sure about how to interact via text well... why don't you familiarize yourself with netiquitte!

There is a discussion section associated with this course. This will meet 2 – 3x per week (dates/times to be determined during the first week of class; please fill out your weekly availability). Muddiest Point Discussions will be utilized to guide content in the discussion sections [time will also be allotted during the discussion sections for open questions (open office hours]. **Because the Muddiest Point Discussions guide content of the following week, these assignments are unable to be made up**.

Unit Reviews (Connect)

To help you review your understanding of the material covered prior to each exam, a Unit Review will be assigned. We will use Connect software for these reviews. These can vary in length and type of question, but will typically be composed of questions similar in format to the concept checks. You will have three attempts at these assignments and your recorded score will be the average of these three attempts. *You must take all three attempts*. Following the due date of these assignments, the assignment will open up for "study attempts." **Because of this, these assignments are unable to be made up.**

Topic Review Project

For each unit, you will choose a topic for the creation of a Topic Review. You will create a visual/interactive study guide covering that topic – more detailed instructions will be provided for each topic. These will be due prior to a Unit Exam and will be available to the entire class to use as a study tool. Topics include Macromolecules, Transport & tonicity, Protein Synthesis, Gene Regulation, Cell Division, Variations in Inheritance, Cellular Respiration, and Photosynthesis, although more may be added for inclusion. If you have a topic you would like to examine more in depth, feel free to suggest!

Final Exam

The final exam will be administered during finals week. You can find the final exam schedule HERE. The final exam will be similar in structure to unit exams, but will be 100 questions. The final exam will be cumulative. Per ASU, the final exam schedule listed in the Schedule of Classes will be strictly followed. Exceptions to the schedule and requests for make-up examinations can be granted only by the Director of the School of Mathematical and Natural Sciences for one of the following reasons:

1. Religious conflict
2. The student has more than three exams scheduled on the same day
3. Two finals are scheduled to occur at the same time

Make-up exams will NOT be given for reasons of non-refundable airline tickets, vacation plans, work schedules, weddings, family reunions, or other such activities. Students should consult the final exam schedule before making end-of-semester travel plans.

If there is a last-minute personal or medical emergency, the student may receive a grade of Incomplete and makeup the final within one calendar month. The student must provide written documentation and be passing the class at the time to receive an Incomplete. A signed Request for Grade of Incomplete must be submitted by the student and approved by the student's instructor and the Associate Director of the School of Mathematical and Natural Sciences.

Course Schedule

This schedule is subject to change. This is an IDEAL schedule, but in reality, our schedule will progress at the pace of our learning and dates may be moved back or ahead depending on our progress through the material. Because of this, ***Canvas should be your reference for the most up-to-date information.***

Week	Topics	Assessments/activities
Week 1 T Jan 10 Th Jan 12	Syllabus & introductions Overview of Cell Structure • Cell overview (prokaryotic v eukaryotic) • Cell overview (animal v plant)	• Reciprocal interview • Opt-in to Connect • Register iClicker • Introduce Yourself discussion board • Objective Pre-Assessment
Week 2 T Jan 17 Th Jan 19	Introduction to Biology • Homeostasis/denaturation • Levels of organization + taxonomy Chemical composition of life • Macromolecules • Phospholipid membranes	• LearnSmart: Chemistry • LearnSmart: Feedback Loops • Concept Check #1
Week 3 **we will not meet for lecture this week – all work is asynchronous*** T Jan 24 Th Jan 25	****PRE-RECORDED LECTURES**** Chemical composition of life • Properties of water Cells (1) • Membrane structure • Transport	• Properties of Water Assignment (PlayPosit) • Transport Assignment (PlayPosit) • LearnSmart: Chemistry cont. • Chemistry Connect Exam
Week 4 T Jan 21 Th Feb 2	Cells (2) • Transport continued • Organelles	• LearnSmart: Membranes & Transport • Concept Check #2
Week 5 T Feb 7 Th Feb 9	Cells (3) • Organelles • Cell junctions/tissues • Cell communication	• LearnSmart: Cell structures • Organelles activity • Connect: Unit 1 Review • Review Topic 1 Due (Fri Feb 3)
Week 6 T Feb 14 Th Feb 16		• **EXAM 1 (Feb 14)** • Exam 1 iClicker Review (Feb 16)
Week 7 T Feb 21 Th Feb 23	Genetics (1) • Structure of DNA • Protein Synthesis	• LearnSmart: Protein Synthesis • Concept Check #3
Week 8 T Feb 28 Th Mar 2	Genetics (2) • Genetic Mutation • Gene Regulation (transcription factors) • Genetic Manipulation (cloning, CRISPR)	Concept Check #4
Week 9 – March 7/9	*Spring Break! No class*	
Week 10 T Mar 14 Th Mar 16	Cell Reproduction (2) • DNA Replication • Mitosis & Meiosis	• LearnSmart: Cell Reproduction • Concept Check #5
Week 11 T Mar 21 Th Mar 23	Inheritance • Mendelian genetics + Punnett squares • Variations in Inheritance	• LearnSmart: Inheritance • Punnett Squares Activity • Connect: Exam 2 Review • Review Topic 2 due F Mar 24
Week 12 T Mar 28 Th Mar 30		• **EXAM 2 (Mar 28)** • Exam 2 iClicker review (Mar 30)
Week 13 T Apr 4 Th Apr 6	Energy & Metabolism (1) • Types of energy & overview • ATP generation	• LearnSmart: Energy & Metabolism • Concept Check #6
Week 14 T Apr 11 Th Apr 13	Energy & Metabolism (2) • Cellular Respiration • Anaerobic Respiration • Fermentation	• Concept Check #7
Week 15 T Apr 18 Th Apr 20	Energy & Metabolism • Photosynthesis	• Viruses: Alive or not? Class Activity • Review Topic 3 due F Apr 21 • Connect: Exam 3 Review
Week 16 T Apr 25 Th Apr 27		• **EXAM 3 (Apr 25)** • Exam 3 iClicker review (Apr 27) • Connect: Final Exam Review
Final: Thursday, April 4 - 7:30 – 9:20am		

Late or Missed Assignments

Notify the instructor **BEFORE** an assignment is due if an urgent situation arises and you are unable to submit the assignment on time.

It is the responsibility of the student to complete work by the assigned due date and time – due dates are nor flexible. Not all assignments qualify for late submissions. Late work will not be accepted and missed exams cannot be made up without prior approval of the instructor. If an assignment can be turned in post-due date, it is subject to a 10% drop in grade for each day it is late. Extensions will not be granted and late work will not be accepted after 5 days post-due date. Any assignments not turned in by the due date will be assigned a zero. Absolutely no work will be accepted after the last day of class. The instructor may add additional provisions to this policy as dictated by course requirements (*see above under "late or missed assignments"*).

I understand that technical issues do occur, but they do not excuse late/missing assignments. For help with course technology, contact the University Technology Office.

If you have extenuating circumstances such as severe illness or a death in your immediate family, please contact the Dean of Students Office (602) 543-8152 (UCB 301) with documentation of your emergency. The Dean will advise me of the appropriate accommodations.

Excused absences and conditions for making up work include Accommodation of Religious Practices and Missed Classes Due to University-Sanctioned Activities. Students must notify their instructors of these absences as early as possible in the semester.

Final Exam Make-up Policy

The final exam schedule listed in the Schedule of Classes will be strictly followed. Exceptions to the schedule and requests for make-up examinations can be granted only by the Associate Director of the School of Mathematical and Natural Sciences for one of the following reasons:

4. Religious conflict
5. The student has more than three exams scheduled on the same day
6. Two finals are scheduled to occur at the same time

Make-up exams will NOT be given for reasons of non-refundable airline tickets, vacation plans, work schedules, weddings, family reunions, or other such activities. Students should consult the final exam schedule before making end-of-semester travel plans.

If there is a last-minute personal or medical emergency, the student may receive a grade of Incomplete and makeup the final within one calendar month. The student must provide written documentation and be passing the class at the time to receive an Incomplete. A signed "Request for Grade of Incomplete" must be submitted by the student and approved by the student's instructor and the Associate Director of the School of Mathematical and Natural Sciences.

Communicating with your Instructor

ASU email is an official means of communication among students, faculty, and staff. Students are expected to read and act upon email in a timely fashion. Students bear the responsibility of missed messages and should

check their ASU-assigned email regularly. **E-mail correspondence should be conducted in a professional manner.**

Please note, a professional e-mail is in the following format:

> *Hello Professor X,*
>
> *Message should be in complete sentences, using correct grammar and punctuation. Include clear explanation of query, as well as any strategies that have been employed in problem solving previously. If applicable, include details regarding availability for scheduling office hours.*
>
> *Thank you,*
> *Your name + class section*

NOTE: All instructor correspondence will be sent to your ASU email account. Most correspondence will occur via Canvas message or Canvas announcement, so be sure your Canvas notifications are pushed to your e-mail (ideally ASU, but you can add a preferred).

Additional Course Policies

Withdrawal/Incomplete Policies

Withdrawals

Specifically, students should be aware that non-attendance will **NOT** automatically result in their being dropped from the course. Therefore, if a student does not attend class during the first week or for any extended period of time during the semester, they should not presume that they are no longer registered. ***It is the student's responsibility to be aware of their registration status.***

Any withdrawal transaction must be completed by the deadline date in accordance to the appropriate session at the registrar's office. If not, you will still be officially enrolled and you will receive a grade based on your work completed.

As part of a complete session withdrawal a student must withdraw from all classes in a session. Beginning the first day of classes, undergraduate students are required to work with a Student Retention Coordinator to facilitate the withdrawal process.

For additional information about ASU's withdrawal policy and the possible consequences of withdrawing from a class, contact Registration Services or your academic counselor.

Please note the following dates (**Session C**):

Some Calendar Reminders	Session C (15 Weeks)
Classes Begin	January 9
Drop/Add Deadline	January 15
Martin Luther King Jr. Holiday Observed – University Closed	January 16
Spring Break – Classes Excused	March 5 – 12
Course Withdrawal Deadline	April 2
Complete Session Withdrawal Deadline/Last Day of Classes *	April 28
Final Exams	May 1 – 6

ASU's Full Academic Calendar.

Incompletes

A grade of incomplete will be awarded only in the event that a documented emergency or illness prevents a student who is doing acceptable work from completing a small percentage of the course requirements at the end of the semester. The guidelines in the current general ASU catalog regarding a grade of incomplete will be strictly followed. **A grade of incomplete will NOT be awarded unless there is documented evidence of extreme personal or immediate family hardship**. Changes in work hours, child-care emergencies, or other similar personal problems will not be approved as reasons for awarding incompletes. A signed Request for Grade of Incomplete must be submitted by the student and approved by the student's instructor and the Associate Director of the School of Mathematical and Natural Sciences.

Professionalism

Per the Arizona State University Student Code of Conduct (5-308; F 11), "interfering with or disrupting university or university-sponsored activities, including but not limited to classroom related activities…" may result in disciplinary sanctions including removal of a student from the teaching environment. Please note that a faculty member can also submit a conduct report to the Dean of Students in severe instances.

ASU Student Code of Conduct

Students are expected to follow the Student Code of Conduct, especially when communicating with your peers and instructors. Violations of the student code of conduct may result in withdrawal from the class.

Attendance

Regular attendance to lecture will greatly increase your likelihood of success in this course. Attendance is required for in-class assignments (activities, iClicker, etc.).

Behavior

Respectful behavior is expected – both of the professor and of classmates. Incidences of disrespectful behavior may result in removal of a student form the learning environment. Continued propagation of a negative environment can result in expulsion from the course.

Punctuality

You are expected to arrive on time and prepared to class and student group meetings. Excessive tardiness will result in deductions of point values from overall grade.

Respectful Communications

As a beacon for critical thought and the advancement of knowledge, ASU values dissenting opinions. Acknowledging that someone else's opinion matters as much as our own is the first step to creating a respectful dialogue. However, we must also distinguish between opinion, fact, and policy. Valuing and respecting those opinions that are different from our own does not mandate acquiescence or violation of policy. We expect all communications, written, email, verbal, and otherwise to be conducted with a respectful tone and tenor, and in compliance with established protocols and the ASU Code of Conduct.

Community of Care Guidelines

ASU's response to COVID-19 and for the preservation and protection of every community member's health will continue to be dynamically adjusted to keep our community healthy and well. As the information on status, current risk, and appropriate response continues to evolve, please consult the Educational Outreach and Student Services website on Managing COVID-19 at ASU.

Vaccinations

The university **strongly recommends that** all students enrolled in an on-campus academic program be vaccinated.

COVID-19 vaccines currently available in the United States and in other countries are highly effective at preventing COVID-19 infection and reducing the spread of the virus. The vaccine is the greatest tool available to mitigate COVID-19 and its negative health outcomes, including death, and we believe it is imperative for the health and well-being of our community for all to be vaccinated.

The vaccine is currently widely available throughout the US. Students are **strongly recommended to be** fully vaccinated. Vaccine appointments are also available through the ASU Health Center.

Once vaccinated, students should upload proof of vaccination to their ASU Health Portal. ASU will accept all COVID-19 vaccines that are approved by the World Health Organization or a national regulatory agency.

If you have any questions about the COVID-19 vaccine, you can visit our vaccine FAQ page or contact ASU Health Services at 480-965-3349 or immunizations@asu.edu.

Title IX Violations & Policy on Sexual Discrimination

Is a federal law that provides that no person be excluded on the basis of sex from participation in, be denied benefits of, or be subjected to discrimination under any education program or activity. Both Title IX and university policy make clear that sexual violence and harassment based on sex is prohibited. An individual who believes they have been subjected to sexual violence or harassed on the basis of sex can seek support, including counseling and academic support, from the university. If you or someone you know has been harassed on the basis of sex or sexually assaulted, you can find information and resources at the ASU Sexual Violence Awareness, Prevention, and Response website.

Arizona State University is committed to providing an environment free of discrimination, harassment, or retaliation for the entire university community, including all students, faculty members, staff employees, and guests. ASU expressly prohibits discrimination, harassment, and retaliation by employees, students, contractors, or agents of the university based on any protected status: race, color, religion, sex, national origin, age, disability, veteran status, sexual orientation, gender identity, and genetic information.

As mandated reporters, faculty are obligated to report any information of which they become aware regarding alleged acts of sexual discrimination, including sexual violence and dating violence. ASU Counseling Services is available if you wish discuss any concerns confidentially and privately. **I would be happy to walk with you to our Counseling Center – no questions asked.**

Potentially Offensive Content

If you find any of the content of this class offensive, please bring your concerns to the instructor immediately.

Policy Against Threatening Behavior

In the classroom and out students are required to conduct themselves in a manner that promotes an environment that is safe and conducive to learning and conducting other university-related business. All incidents and allegations of violent or threatening conduct by an ASU student will be reported to the ASU Police Department (ASU PD) and the Office of the Dean of Students. Such incidents will be dealt with in accordance with the policies and procedures described in Section 104-02 of the Student Services Manual.

All incidents and allegations of violent or threatening conduct by an ASU student (whether on-or off campus) must be reported to the ASU Police Department (ASU PD) and the Office of the Dean of Students. If either office determines that the behavior poses or has posed a serious threat to personal safety or to the welfare of the campus, the student will not be permitted to return to campus or reside in any ASU residence hall until an appropriate threat assessment has been completed and, if necessary, conditions for return are imposed. ASU PD, the Office of the Dean of Students, and other appropriate offices will coordinate the assessment in light of the relevant circumstances. For more information please visit the Educational Outreach and Student Services website pages Policies and Procedures and Standards for Threatening Behavior.

Disability Resources

Student Accessibility and Inclusive Learning Services (SAILS) provides information and services to students with any documented disability who are attending ASU West. Individualized program strategies and recommendations are available for each student as well as current information regarding community resources. Students also may have access to specialized equipment and supportive services and should contact the instructor for accommodations that are necessary for course completion.
Students who feel they will need disability accommodations in this class but have not registered with the Disability Resource Center (DRC) should contact DRC immediately.

- **ASU Student Accessibility & Inclusive Learning Services (SAILS)** website
- **Phone**: 480-965-1234
- ASU West SAILS is located in the **University Center Building, Room 304**
- Monday – Friday 8am – 5pm

Academic Integrity

Academic honesty is expected of all students in all examinations, papers, and laboratory work, academic transactions and records. The possible sanctions include, but are not limited to, appropriate grade penalties, course failure (indicated on the transcript as a grade of E), course failure due to academic dishonesty (indicated on the transcript as a grade of XE), loss of registration privileges, disqualification and dismissal. For more information, see the Office of the University Provost's webpage regarding Academic Integrity.

Each student has an obligation to act with honesty and integrity, and to respect the rights of others in carrying out all academic assignments. Violations of the University Academic Integrity policy will not be ignored. Penalties include reduced or no credit for submitted work, a failing grade in the class, a note on your official transcript that shows you were punished for cheating, suspension, expulsion and revocation of already awarded degrees. The university requires that the implementation of any of these penalties for violations of the academic integrity policy be reported to the College's Academic Integrity Officer. The Academic Integrity Policy defines the process to be used if the student wishes to appeal this action.

A student may be found to have violated this obligation and to have engaged in academic dishonesty if during, or in connection with, any academic evaluation he or she:

- Engages in any form of academic deceit;
- Refers to materials or sources or employs devices (eg: audio recorders, crib sheets, calculators, solution manuals, or commercial research services) not authorized by the instructor for use during the academic evaluation;
- Possesses, buys, sells, obtains, or uses, without appropriate authorization, a copy of any materials intended to be used for academic evaluation in advance of its administration;
- Acts as a substitute in any academic evaluation;
- Depends on the aid of others to the extent that the work is not representative of the student's abilities, knowing or having good reason to believe that this aid is not authorized by the instructor;
- Provides inappropriate aid to another person, knowing or having good reason to believe the aid is not authorized by the instructor;
- Engages in plagiarism;
- Permits his or her work to be submitted by another person without the instructor's authorization; or
- Attempts to influence or change any academic evaluation or record for reasons having no relevance to class achievement.
- Students must not upload to any course shell, discussion board, or website used by the instructor or other course forum, material that is not the student's original work.

In BIO 181 you are expected to follow the ASU Student Code of Conduct especially when communicating with your peers, instructors, and teaching assistants. Violations of the student code of conduct may result in withdrawal from the class.

Power Outage or other Campus-related Emergency Announcements

In the event of a campus power outage or other event affecting the ability of the University to deliver classes, any decision to cancel classes will be announced using the ASU emergency notification system. For this reason, it is imperative that students register with the ASU emergency notification system at ASU's LiveSave app webpage. In cases in which a limited number of buildings are affected, students should check the university website and/or call the School office at (602) 543-6050.

Emergency Evacuation Plan

Students should be aware of the evacuation route posted on the exit door of each classroom. Students who cannot walk down stairs should notify the instructor as early in the course as possible so the instructor can provide information regarding the location of the designated meeting area on each upper floor of the building (marked with a blue sign that states Emergency Evacuation Response Area).

Course/Instructor Evaluation

The course/instructor evaluation for this course will be conducted online 7-10 days before the last official day of classes of each semester or summer session. Your response(s) to the course/instructor are anonymous and will not be returned to your instructor until after grades have been submitted. The use of a course/instructor evaluation is an important process that allows our college to (1) help faculty improve their instruction, (2) help administrators evaluate instructional quality, (3) ensure high standards of teaching, and (4) ultimately improve instruction and student learning over time. Completion of the evaluation is not required for you to pass this class and will not affect your grade, but your cooperation and participation in this process is critical. About two weeks before the class finishes, watch for an e-mail with "NCIAS Course/Instructor Evaluation" in the subject heading. The email will be sent to your official ASU e-mail address.

Please consider filling out this evaluation so I can continue to revise and improve my teaching and role in student support. In these evaluations, please provide constructive feedback – I do read them and take them seriously!

Assessments

Please be aware that student scores on exams or other graded work may be used for assessment of program goals of degrees offered by the School of Mathematical and Natural Sciences.

Copyrighted Materials

Students must refrain from uploading to any course shell, discussion board, or website used by the course instructor or other course forum, material that is not the student's original work, unless the students first comply with all applicable copyright laws; faculty members reserve the right to delete materials on the grounds of suspected copyright infringement. Lecture or lab recordings and course materials (PowerPoints, worksheets, etc.) are or should be treated as Copyrighted material. Downloading these materials and sharing them (e.g.: to an external website not linked to the class) will be treated as Copyright infringement and may be grounds for dismissal from the course as a violation of the Student Code of Conduct.

Course recording

Our aim is to create a learning environment where all feel free to contribute; thus any recording of class sessions is prohibited (with the exception of those who have a SAILS-approved accommodation), or the express consent of the instructor. No one should post any verbatim accounts of class discussion or say anything that could identify a class member on social media without the express permission of the class member.

Copyright Infringement

All course content and materials, including lectures (Zoom recorded lectures included), are copyrighted materials and students may not share outside the class, upload to online websites not approved by the instructor, sell, or distribute course content or notes taken during the conduct of the course (see ACD 304–06, "Commercial Note Taking Services" and ABOR Policy 5-308 F.14 for more information). Students must refrain from uploading to any course shell, discussion board, or website used by the course instructor or other course forum, material that is not the student's original work, unless the students first comply with all applicable copyright laws; faculty members reserve the right to delete materials on the grounds of suspected copyright infringement. **This right does not exempt posting to any site class notes, discussions, homework, exams, and any other course-related materials to include study materials without the instructor's permission**. Such posting explicitly violates copyright laws and the ASU academic integrity policy.

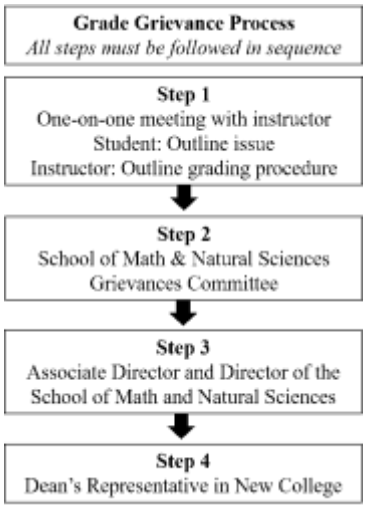
Grade Grievances

The following steps must be followed by any student seeking to appeal a grade. This process does not address academic integrity allegations or faculty misconduct. Student grade appeals must be processed in the regular semester immediately following the issuance of the grade in dispute (by commencement for Fall or Spring semesters), regardless of whether the student is enrolled at the University. There are two stages to the grievance process: the informal process and the formal process. Each process contains a series of steps which must be followed in order. The informal process, outlined below and facilitated by the School of Mathematical and Natural Sciences, must be followed prior to escalation to the formal process:

1. A one-on-one meeting must be scheduled with the instructor. During this meeting, a student must state the reason for questioning that the grade was not given properly/in good faith. The instructor must review the matter, explain the grading procedure, and explain how the grade was determined. The student and the instructor must work toward resolution and grade grievances should ideally be resolved at this level.
2. If the issue is not resolved, the student can appeal to the School of Math and Natural Sciences Grievances committee (MNSgrievances@asu.edu). The student must provide a written rationale and

evidence that the grade was not given properly as well as a summary of the instructor's response/the meeting with the instructor.

3. If the issue is not resolved by MNS Grievances, the student can appeal to the Associate Director and Director of the School of Math and Natural Sciences.
4. If the issue is not resolved at the level of the School of Math and Natural Sciences, the student can confer with the Dean's Representative in the New College of Interdisciplinary Arts and Sciences (Executive Director of Academic Services and Strategic Initiatives) who will review the case and explain the formal process to the student.



Syllabus Disclaimer

The syllabus is a statement of intent and serves as an implicit agreement between the instructor and the student. Every effort will be made to avoid changing the course schedule but the possibility exists that unforeseen events will make syllabus changes necessary. Remember to check your ASU email and the course site often. ***The instructor reserves the right to make changes to this syllabus as needed.***