University of Georgia MIBO 3500 (CRN 36799). INTRODUCTORY MICROBIOLOGY 3 credit hours

Spring Semester 2021

10:20-11:35 AM Mon/Wed, Room 116 – Student Learning Center

Instructor: Dr. Margie M. Paz <u>mpaz@uga.edu</u>

128 Flynt Building 770-229-3380

Office Hours: 2:30 - 3:30 PM Mon/Wed. Please e-mail me, so a Zoom meeting can be set up. To comply with the Family Educational Rights and Privacy Act (FERPA), all communication must be through a secure medium (UGAMail or eLC). Instructors are not allowed to respond to messages that refer to individual students or student progress in the course through non-UGA accounts.

Course Overview: This course provides an introduction to the study of microorganisms including: cell structure, function, diversity, metabolism and genetic evolution of bacteria; microbial diversity and the biotechnological application of microorganisms to solve environmental problems; viral structure, replication mechanisms, and influence on human health; human immunology and microbial disease. The syllabus is a general plan for the course; changes may be necessary and will be announced to the class by the instructor.

Prerequisite: (CHEM 2211 or CHEM 2311H or CHEM 2411) and (CHEM 2211L or CHEM 2311L or CHEM 2411L) and BIOL 1107 or BIOL 1107E or BIOL 2107H

Textbook: Microbiology, An Evolving Science, 4th ed by Joan L. Slonczewski and John W. Foster. W. W. Norton &

Company. ISBN-10: 0393614034

ISBN-13: 978-0393614039

Attendance: Students are expected to attend all lectures. Lecture slides will be available on the web via eLC to simplify note-taking. However, the lecture notes on eLC should not be regarded as a substitute for attending class. Students are responsible for having access to the eLC course content using a laptop computer/tablet or printing their own copies and should do so before class. Having the lecture slides with you will make note-taking easier, but additional material and examples are given in class. You should be prepared to take notes on blank sheets of paper (or slide handout or laptop) at any time. You will be responsible for all content and instructions given during the lecture and announcements made in class (including on days when you miss a class). Please turn off all cell phones and pagers.

e-LearningCommons (**eLC**): We will be using eLC throughout the semester. Class materials including the syllabus, slides of lecture notes, course announcements, etc. will be posted on the eLC course page. Students are responsible for printing their own copies of class materials, and should do so in advance of needing them. Having a problem downloading and printing a paper is usually not a good reason to be unprepared for class. I often communicate via *e*LC, which you should check regularly. To get to the course page, go to https://uga.view.usg.edu Login with your UGA MyID.

Grading: Your grade will be based on four exams, in-class activities/case studies, and assignments/quizzes. Exam material will consist of lecture notes and discussions, reading assignments (e.g., journal articles). Late submissions will not be accepted. All due dates and times are final – in-class activities/case studies, assignments/quizzes, or exams turned in after due date/time will be scored a zero. Make-up exams will come from a test bank and may not reflect the material emphasized in lecture. A WRITTEN EXCUSE is REQUIRED for all make-up exams. In the case of severe illness or family emergency, you must inform and email the instructor prior to the exam. In addition, present/show documentation from a medical facility that indicates you could not take the exam on the date in question. An unexcused absence will result in a grade of zero. An absence will be counted as unexcused if the instructor is not notified before the exam is given. If you believe there has been a grading error on your exam, questions about grading must be submitted in writing within one week of the return of the exam. To request a regrade, email the instructor a Word or pdf document that gives the question number and the answer with supporting evidence from textbook or lecture notes that proves your answer is correct. Be sure to include the exam number and your name in the file name.

Your lowest exam grade will be dropped. If you missed an exam, your score will be recorded as a zero and this exam will serve as your dropped test, and you will be required to take the final exam.

Grade Distribution:

Highest 3 Exam Grades (100 pts each)	300 points
Cumulative Final exam	100 points
In-Class Activities/Case Studies	50 points
Quizzes/Assignments	50 points
Total possible points to earn	500 points

If you have taken all 4 exams during the semester and are happy with your grade, you may use the final exam as your dropped grade. I will then use the grade distribution shown below:

4 Exam Grades (100 pts each)	400 points
In-Class Activities/Case Studies	50 points
Quizzes/Assignments	50 points
Total	500 points

Grading Scale: The letter grade will be determined according to the scale below.

A 93 to 100%, **A-** 90 to 92%, **B+** 87 to 89%, **B** 83 to 86%, **B-** 80 to 82%, **C+** 77 to 79%,

C 73 to 76%, **C-** 70 to 72%, **D** 60-69%, **F** below 60

Academic Honesty and the Honor Code: As a University of Georgia student, you have agreed to abide by the University's academic honesty policy, "A Culture of Honesty," and the Student Honor Code. All academic work must meet the standards described in "A Culture of Honesty" at www.uga.edu/honesty. Students are responsible for informing themselves about those standards before performing any academic work.

Mental Health and Wellness Resources:

If you or someone you know needs assistance, you are encouraged to contact Student Care and Outreach in the Division of Student Affairs at 706-542-7774 or visit https://sco.uga.edu. They will help you navigate any difficult circumstances you may be facing by connecting you with the appropriate resources or services.

- UGA has several resources for a student seeking mental health services (https://www.uhs.uga.edu/bewelluga/bewelluga) or crisis support (https://www.uhs.uga.edu/info/emergencies).
- If you need help managing stress anxiety, relationships, etc., please visit BeWellUGA (https://www.uhs.uga.edu/bewelluga/bewelluga) for a list of FREE workshops, classes, mentoring, and health coaching led by licensed clinicians and health educators in the University Health Center.
- Additional resources can be accessed through the UGA App.

UGA Griffin Campus Specific Resources

Mental Health and Wellness Resources:

- If you or someone you know needs assistance, you are encouraged to contact Student Affairs at 770-412-4096. They will help you navigate any difficult circumstances you may be facing by connecting you with the appropriate resources or services.
- UGA Griffin Campus Counseling Services serves as a resource for a student seeking mental health services, and can be contacted at 706-612-8792 or via email at griffincounseling@uga.edu.
- O Students can schedule an appointment, here: https://bit.ly/3dAWO9d
- If you need help managing stress anxiety, relationships, etc., you can also contact BeWellUGA (https://www.uhs.uga.edu/bewelluga/bewelluga) for a list of FREE workshops, classes, mentoring, and health coaching led by licensed clinicians and health educators in the University Health Center.

Documented Disability Statement for Griffin Campus: If you are a student with a documented disability, you must inform the instructor of this fact at the close of the first class meeting. You will be referred to the Office of Student Affairs in Room 105, Flynt Building, 770-412-4096, for consultation regarding evaluation, documentation of your disability, and a recommendation as to the accommodation to be provided.

Coronavirus Information for Students

Face Coverings:

Effective July 15, 2020, the University of Georgia—along with all University System of Georgia (USG) institutions—requires all faculty, staff, students and visitors to wear an appropriate face covering while inside campus facilities/buildings where six feet social distancing may not always be possible. Face covering use is in addition to and is not a substitute for social distancing. Anyone not using a face covering when required will be asked to wear one or must leave the area. Reasonable accommodations may be made for those who are unable to wear a face covering for documented health reasons. Students seeking an accommodation related to face coverings should contact Disability Services at https://drc.uga.edu/.

DawgCheck:

Please perform a quick symptom check each weekday on DawgCheck—on the UGA app or website—whether you feel sick or not. It will help health providers monitor the health situation on campus: https://dawgcheck.uga.edu/

What do I do if I am notified that I have been exposed?

Effective January 4, 2021, students who learn they have been directly exposed to COVID-19 but are not showing symptoms should self-quarantine for 10 days consistent with the updated Department of Public Health (DPH) and Centers for Disease Control and Prevention (CDC) guidelines. Please correspond with your instructor via email, with a cc: to Student Care & Outreach at sco@uga.edu, to coordinate continuing your coursework while self-quarantined. If you develop symptoms, you should contact the University Health Center to make an appointment to be tested. You should continue to monitor your symptoms daily on DawgCheck.

We strongly encourage students to voluntarily take a COVID-19 test within 48 hours of the end of the 10-day quarantine period (test to be administered between days 8 and 10).

If the test is negative, the individual may return to campus, but MUST continue to closely monitor for any new COVID-19 symptoms through 14 days. <u>DawgCheck</u> is the best method for monitoring these symptoms. If new symptoms occur, the individual must not come to campus and must seek further testing/evaluation.

If the test is positive at the end of the 10-day period, the individual must begin a 10-day isolation period from the date of the test.

What do I do if I test positive?

Any student with a positive COVID-19 test is <u>required</u> to report the test in DawgCheck and should self-isolate immediately. Students should not attend classes in-person until the isolation period is completed. Once you report the positive test through DawgCheck, UGA Student Care and Outreach will follow up with you.



Clean your hands often.



Avoid touching your eyes, nose and mouth.



Stay at home if you are sick.



Wear a cloth face covering to help slow the spread of COVID-19.



Clean and disinfect frequently touched surfaces daily.

STUDENTS: If you need healthcare assistance, the following community partner can help:
McIntosh Family Practice/McMed Urgent Care

McIntosh Family Practice/McMed Urgent Care 726 S 8th St., Griffin, GA 30224 I 770-450-8878.

ALL OTHERS: Consult your community healthcare provider.

For UGA updates and prevention, visit www.uga.edu/coronavirus.



Approximate schedule of topics for Spring 2021 (Face-to-Face Instruction)

-	Chapter
Unit 1	1 Microbial Life
	2 Observing the Microbial Cell
	3 Cell Structure & Function
	4 Bacterial Culture, Growth, & Development
	5 Environmental Influences & Control of Microbial Growth
	Case Study #1
	13 Energetics & Catabolism
	14 Electron Flow in Organotrophy, Lithotrophy, &
	Phototrophy
Wed, Feb. 3	EXAM 1
Unit 2	7 Genomes & Chromosomes
	8 Transcription, Translation, Bioinformatics
	9 Gene transfer, Mutation, Genome Evolution
	10 Molecular regulation
	Case Study #2
	18 Bacterial Diversity
Wed. March 3	EXAM 2
Unit 3	19, 20 Eukaryotic and Archaeal Diversity
	6 Viruses, Chapter 11: Viral Molecular Biology
	Case Study #3
	21 Microbial Ecology
	16 Food and Industrial Microbiology
	23 Human Microbiota & Innate Immunity
Wed, April 7	EXAM 3
Unit 4	24 The Adaptive Immune Response
	25 Microbial Pathogenesis
	26 Microbial Diseases
	Case Study #4
	27 Antimicrobials
	28 Epidemiology
Mon, April 26	Exam 4
Wed, May 5	Final Exam (Comprehensive) 8:00-11:00 AM