MIBO 4600L Syllabus
Experimental Microbiology Lab
2:00-4:45 Tues/Thurs

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Date	Experiments	Instructor (TA)
Tuesday, Aug 18	**Introduction**	Hoover
Thursday, Aug 20	**Module 1-LacZ Induction**	Hoover
Tuesday, Aug 25	**Module 2** **Bacterial Isolations** (begin)	Shimkets
Thursday, Aug 27	Module 2, continued	
Tuesday, Sept 1	**Module 3 – Bacterial Growth**	Hoover
Thursday, Sept 3	Module 3, continued	
Tuesday, Sept 8	**Module 4** **Dissemination of Antibiotic Resistance**	Shimkets
Thursday, Sept 10	Module 4, continued	
Tuesday, Sept 15	Module 4, continued	
Thursday, Sept 17	Module 4, continued	
Tuesday, Sept 22	Work day for isolations/Exam review	
Thursday, Sept 24	**EXAM I**	Hoover/Shimkets

Tuesday, Sept 29	**Module 5 – Phylogenetic Analysis of Isolates**	Hoover
Thursday, Oct 1	Module 5, continued	
Tuesday, Oct 6	Module 5, continued	
Thursday, Oct 8	**Module 6 Phenotype to Genotype: Mutagenesis, Cloning and Genomes**	Shimkets
Tuesday, Oct 13	Module 6, continued	Shimkets
Thursday, Oct 15	Module 6, continued	
Tuesday, Oct 20	Module 6, continued	
Thursday, Oct 22	Module 6, continued	
Tuesday, Oct 27	Module 6 wrap-up	
Thursday , Oct 29	Work day for isolations/Exam review	
Tuesday, Nov 3	**Exam II**	Hoover/Shimkets
Thursday, Nov 5	**Module 7 – Plasmid Isolation**	Hoover
Tuesday, Nov 10	Module 7, continued	
Thursday, Nov 12	Module 7 wrap up	
Tuesday, Nov 17	Work on characterization of isolates	
Thursday , Nov 19	Work on characterization of isolates	
Tuesday, Nov 24	**Thanksgiving Break**	No Class
Thursday, Nov 26	**Thanksgiving Break**	No Class
Tuesday, Dec 1	Work day for characterization of isolates and preparation of presentations	
Thursday, Dec 3	**In-Class Presentations**	
Tuesday, Dec 8		No Class – Friday schedule
Friday, Dec 11	**Final Comprehensive Exam 3:30 – 6:30 pm**	Hoover/Shimkets

Course Objectives

The objectives of the course are: (i) introduce students to modern genetic and molecular tools used to analyze microorganisms; (ii) train students in the proper method for recording scientific data; (iii) help students develop skills in the critical analysis of data and research literature; and (iv) acquaint students with aspects of experimental design.

Grading Policy

Grades will be assigned based on a standard grading scale (94-100, A; 90-93, A^-; 87-89, B+; 84-86, B; 80-83, B^-; etc.). Each exam is worth 15% of the final grade. The final exam is comprehensive. The lab exercises are worth 55% of the final grade. Modules 1, 3, and 7 are each worth 6%; Module 4 is worth 8%; Module 6 is worth 10%. Module 2 is worth 19% and is determined from the purification and characterization of environmental isolate (6%), phylogenetic analysis of isolates (Module 5; 3%) and final presentation (10%). Lab exercises will be graded based on the quality of the lab work (e.g, are results accurate, were experiments done thoroughly and are the results of the experiments precise and accurate), quality of lab notebook, as well as the completion of worksheets or lab write-ups for each exercise.

Class attendance is mandatory. **Each unexcused absence will result in the loss of 10 percentage points subtracted from your final grade.**

All academic work must meet the standards contained in "A Culture of Honesty." Students are responsible for informing themselves about those standards before performing any academic work. More detailed information about academic honesty can be found at: www.uga.edu/ovpi/honesty/acadhon.htm

The course syllabus is a general plan for the course; deviations announced to the class by the instructor may be necessary.

Principal Course Assignments:

Assignments will include lab exercises detailed in class handouts; maintenance of lab notebook; worksheets pertaining to the lab exercises and sample problems; primary research literature and reviews; collecting environmental samples for isolation of specific groups of bacteria; proposal describing experiments to be done with isolated bacterial species; and oral presentation on bacterium isolated. There is no text for the course. Specific course requirements for grading purposes are described in the Grading Policy.

Make-up Examinations:

Make-up exams will be allowed only for excused absences from the regularly scheduled exams and will be arranged for as close to the original exam time as possible and convenient.