<u>SCHEDULE OF TOPICS – Fall 2008</u> BIOL 1733: Principles of Biology I Laboratory, Honors

WEEK OF	TOPIC / ACTIVITY	<u>ASSESSMENT</u>
AUG 25	Orientation / Safety Introduction to Science and Research Methods Ex. 2 - MEASUREMENTS IN BIOLOGY	Summary 1
SEP 1	Ex. 6 – BIOLOGICALLY IMPORTANT MOLECULES	PL 1; Quiz 1
SEP 8	Ex. 3 – THE MICROSCOPE: Basic Skills of Microscopy	PL 2; Summary 2
SEP 15	Ex. 4 – THE CELL: Structure & Function	PL 3; Quiz 2
SEP 22	Ex. 9 - DIFFUSION AND OSMOSIS: Passive Movement of Molecules in Biological Systems	PL 4; Writing 1
SEP 29	Ex. 11 – ENZYMES: Factors affecting the Rate of Activity	PL 5; Present 1
OCT 6	Ex. 12 – RESPIRATION: Aerobic and Anaerobic Oxidation of Organic Molecules	PL 6; Summary 3
OCT 13	EXAM #1	Exam #1
OCT 20Ex. 13	5 – PHOTOSYNTHESIS: Pigment Separation, Starch Production & CO2 Uptake	PL 7; Summary 4
		PL 7; Summary 4 PL 8; Quiz 3
	Production & CO2 Uptake uction to Biotechnology, Part I	PL 8; Quiz 3
	Production & CO2 Uptake uction to Biotechnology, Part I Ex. 14 – MITOSIS: Replication of Eukaryotic Cells	PL 8; Quiz 3
OCT 27Introd	Production & CO2 Uptake uction to Biotechnology, Part I Ex. 14 – MITOSIS: Replication of Eukaryotic Cells ***LAST DAY TO DROP A CLASS – TUESDAY, 10/ Introduction to Biotechnology, Part II	PL 8; Quiz 3
OCT 27Introd	Production & CO2 Uptake uction to Biotechnology, Part I Ex. 14 – MITOSIS: Replication of Eukaryotic Cells ***LAST DAY TO DROP A CLASS – TUESDAY, 10/ Introduction to Biotechnology, Part II Ex. 15 – MEIOSIS: Reduction Division and Gametogenesis	PL 8; Quiz 3 28/08*** PL 9; Present 2
OCT 27Introd NOV 3 NOV 10	Production & CO2 Uptake uction to Biotechnology, Part I Ex. 14 – MITOSIS: Replication of Eukaryotic Cells ***LAST DAY TO DROP A CLASS – TUESDAY, 10/ Introduction to Biotechnology, Part II Ex. 15 – MEIOSIS: Reduction Division and Gametogenesis Ex. 17 – GENETICS: The Principles of Mendel	PL 8; Quiz 3 28/08*** PL 9; Present 2 PL 10; Writing 2
OCT 27Introd NOV 3 NOV 10 NOV 17	Production & CO2 Uptake uction to Biotechnology, Part I Ex. 14 – MITOSIS: Replication of Eukaryotic Cells ***LAST DAY TO DROP A CLASS – TUESDAY, 10/ Introduction to Biotechnology, Part II Ex. 15 – MEIOSIS: Reduction Division and Gametogenesis Ex. 17 – GENETICS: The Principles of Mendel Ex. 18 – EVOLUTION: Natural Selection	PL 8; Quiz 3 28/08*** PL 9; Present 2 PL 10; Writing 2 PL 11; Quiz 4

<u>Note:</u> Students are responsible for knowing all testing dates as well as the material to be tested. Students are furthermore responsible for coming to lab prepared to perform that week's activity.

SYLLABUS

BIOLOGY 1733 – Principles of Biology I Laboratory, Honors FALL 2008

Lab Manual & Supplies

<u>Biology Laboratory Manual</u>, 8th edition (customized), Vodopich and Moore **Please bring your lab manual to each lab session.**

Course Description and Objective

Biol 1733, Principles of Biology I, is the first course in a two-course freshman sequence for students seeking honors designation. *This course may be used to satisfy a portion of the Natural Sciences requirement of the University Core Curriculum*. The objective of this course is to provide students with laboratory techniques consistent with the principles taught in Biol 1711: cell and molecular biology with an emphasis on biological chemistry, cell structure and function, Mendelian genetics, evolutionary biology and introductory biotechnology applications. Prerequisite: Biol 1711, should be taken concurrently.

Expectations & Policies

Attendance

- Attendance in lab is <u>mandatory</u>. In the event of an absence, it is your responsibility to contact the lab instructor as soon as possible to obtain important information. <u>Note</u>: You are responsible for obtaining notes from a classmate, as your lab instructor will not provide copies of notes.
- > Students are expected to attend the lab section in which they are enrolled. All scheduling changes must be made during the schedule revision period.
- ➤ Because a successful laboratory experience is dependent upon regular attendance, your instructor reserves the right to drop you from the course with the grade of WF should you incur more than two (2) absences (regardless of the reason for the absence).
- > Students, whose attendance will be affected by observance of a religious holiday, are to notify their lab instructor in writing within the first 15 days of the semester so that alternate arrangements may be made.

Classroom Policies and Conduct

The laboratory environment is structured so that the lab instructor will provide background information necessary for experimental protocol, as well as safety information and other instructions. Students will then interact in groups to conduct experiments, discuss and review results. Finally, students are responsible for maintaining the workstations. To help ensure a positive lab experience for all class members, you are asked to observe the following class policies:

- Display respect for your instructor and fellow classmates by following the Student Code of Conduct as outlined in the University of North Texas Bulletin via words, actions and deeds.
- You are expected to arrive to class on time. Arriving late could result in a loss of points for that day.
- You are expected to remain in class for the duration of the lab period. Leaving class early will result in a loss of points.
- o Please limit personal conversations to times other than class time.

- Cell phones and all other electronic devices should be turned off before class. (The exceptions to this rule are electronic devices deemed necessary by the Office of Disability Accommodations.
 Please provide appropriate paperwork if such devices are required.)
- Unless otherwise indicated, you are expected to do your own work on all graded items, including, but not limited to, quizzes, pre-lab assignments, writing assignments, and exams.
- You are expected to fully participate in all lab activities and assist lab partners.
- You are expected to value differences of opinion.

Lab Rules – See "Safety Rules" for additional lab policies

No food or drink is allowed in the lab. NO EXCEPTIONS!

Students may not leave until their station is clean and they have checked out with the TA. Failure to do so will result in a loss of points.

Policy on Academic Misconduct

<u>No cheating will be tolerated</u>. Anyone cheating (all forms) or exhibiting behaviors consistent with cheating, including, but not limited to, assisting other students with cheating: talking during a testing event, sitting too closely to other students, leaving an answer sheet uncovered, etc., will receive <u>as a minimum punishment</u> a grade of zero for the graded item. More severe punishment will be taken depending upon the circumstances. *Any and all incidents of academic dishonesty will be reported to the appropriate authorities.*

Policy on Disability Accommodations

The Department of Biological Sciences, in cooperation with the Office of Disability Accommodation, complies with Section 504 the Americans with Disabilities Act in making reasonable accommodations for qualified students with disabilities. Please present your written request to your lab instructor before or on the 12th class day so that the necessary arrangements may be made.

ASSESSMENT & GRADING

BIOLOGY 1733 – Principles of Biology I Laboratory, Honors FALL 2008

ASSESSMENT

- A pre-lab assignment worth up to five (5) points is due at the **beginning** of each lab period. <u>Late pre-lab</u> assignments will not be accepted.
- A summary assignment worth up to 10 points is to be completed four times during the semester. At the lab instructor's discretion, the summary may be checked during the lab period or submitted for grading. Students must be present and have completed all lab activities in order to earn summary points. Summaries may not be made up.
- Two writing assignments worth up to 15 points each are to be completed during the semester. Work must
 meet guidelines as provided by the lab instructor and must be the original work of the student. <u>Late</u>
 writing assignments will not be accepted. Writing assignments may not be made up.
- Two presentations worth up to 15 points each are to be completed during the semester. Work must meet guidelines as provided by the lab instructor. Participation in the development and presentation of the topic are required in order to earn full credit.
- Four quizzes worth up to five (5) points each will be administered during the semester. Questions will include a variety of formats including, but not limited to, short answer, diagramming / drawing, labeling, and fill-in-the-blank. Quizzes may not be made-up.
- Two practical exams worth up to 100 points each will be administered during the semester. Exam
 questions will include a variety of formats including, but not limited to, short answer, labeling /
 diagramming, drawing, identification, and fill-in-the-blank. Exams may not be made-up.*
- All elements of the course must be completed in order to pass the course.
- NOTE: The lab instructor may deduct points at his or her discretion for failure to comply with any of the policies (explicit or implied) included on the syllabus or the University of North Texas Bulletin.

Grading			Grading Assignments		
Pre-lab assignments (11 @ 5 pts)	=	55	90 – 100%	=	Α
Summary assignments (4 @ 10 pts)		40	80 – 89%	=	В
Writing assignments (2 @ 15 pts)		30	70 – 79%	=	С
Presentations (2 @ 15 pts)		30	60 – 69%	=	D
Quizzes (4 @ 5 pts)		20	Below 60%	=	F
Exams (2 @ 100 pts)		200			
Total possible points		375			

Release of Grades: The Family Educational Rights and Privacy Act (FERPA) (1974), does not permit faculty or staff to report grades by phone or email.

^{*}Students who will or have missed an exam for one of the following reasons should contact the 1733 lab supervisor immediately:

Participation in sponsored University activity (requires prior notice + presentation of authorized absence card from the Dean of Students Office);

Observance of a religious holiday (must notify instructor in writing within the first 15 days of the semester); or

[•] Qualified medical excuse (documentation required; instructor must be contacted within three days of absence). Lab Supervisor: Kimberly Piccolo, BB109, 940-565-4472, Kim.Piccolo@unt.edu