Molecular Bases for Human Disease, BIMM110, Spring 2014

Lecture: CTR119
Time: Monday and Wednesday 5:00 pm-6:20 pm

Instructor: Professor Maho Niwa, mniwarosen@ucsd.edu

Exams: Midterm Exam: 5/4/2015 @5:00-6:20 pm in Class
Final Exam: 6/12/2015 @7:00-10:00 pm

Textbook: No Assigned Textbook
All the lectures will be podcasted and lecture notes will be posted on UCSD TED.

Office hours: Friday 10:00-10:50 am @NSB#1 Scholarly Activity Room (Lunch Room)

Project Assistant: Ria Vanessa O. del Rosario (NSB#1, Rm4119)
Tel: 822-0815 (8:00 am-4:00 pm)

*Midterm and Final Exams will be picked up from Ria.

Teaching Assistant:
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Description of the course:

This course presents 1) genetic, biochemical, and molecular biological approaches used to identify the molecular basis of human diseases; 2) current understanding of selected major human diseases at the molecular and cellular levels; 3) successful and possible therapeutic treatments of these diseases. It is expected that students who take BIMM 110 already have a good background in molecular biology, metabolic biochemistry, and genetics.

Schedule:

Week 1
- March 30, Lecture 1: Human Disease Today
- April 1, Lecture 2: Down Syndrome

Week 2
- April 6, Lecture 3: Robertsonian Translocation
- April 8, Lecture 4: Hemophilia

Week 3
- April 13, Lecture 5: Anthrax
- April 15, Lecture 6: Heart Disease and UPR signaling (Guest lecture by Professor Chris Glembotski)

Week 4
- April 20, Lecture 7: Molecular Cell Biology of Cyctic Fibrosis
- April 22, Lecture 8: Cholera

Week 5
- April 27, Lecture 9: Metabolic Disease (Guest lecture by Professor Jim Wilhelm)
- April 29, Lecture 10: Midterm exam

Week 6
- May 4, Lecture 11: Epigenetics, X-Inactivation
- May 6, Lecture 12: Tools to Study Human Diseases Neurodegenerative Disease,

Week 7
- May 11, Lecture 13: Neurodegenerative Disease, Alzheimer
- May 13, Lecture 14: Huntington Disease (Triple Repeats)

Week 8
- May 18, Lecture 15: Virus (Ebola)
- May 20, Lecture 16: Brain Tumor (Guest lecture by Professor Clark C. Chen)

Week 9
- May 25, Lecture 17: Anchondroplasia
- May 27, Holiday

Week 10
- June 1, Lecture 18: Stem Cell
- June 3, Lecture 19 Special Topic

The learning Environment:

In lectures and sections, refrain from eating, newspaper reading and conversation. Turn off cell telephones and messaging devices.

REQUIRED MATERIALS:

iClicker - a small handheld radio frequency device that you will use to answer questions posed in class each day. Only the iClicker brand will work. New or used iClickers can be purchased at the bookstore. If purchasing iClicker imposes significant financial burden, another option is to sit close to one of the TA's and submit your answers to him or her on a piece of paper with your name on it, at the same time as the class is voting via clickers. Clicker participation will contribute to 10% of your final grade. You will be graded based on your participation, regardless whether your answer was right or wrong. To get full credit, you will need to answer (=click) to at least half of the questions in 75% of the lectures, starting in week 3, April 10 (you can start earning clicker credits earlier, starting in the first class). There is no need to notify the instructor or the TA's if you forgot your clicker or ran out of battery - as long as you've participated in 75% of the lectures, you are fine.

GRADING:

1 Midterm	39% of the final grade
Final exam	59% of the final grade
Clicker participation	2% of the final grade

All exams will be closed book/closed computer. Questions will be derived from the lectures, and questions discussed in class.

Overall course letter grades will be assigned using the following scheme:

88-100%	A (A-, A, A+)
78-87%	B (B-, B, B+)
60-77%	C (C-, C, C+)
45-59%	D
0-44%	F

STUDENTS WITH DISABILITIES: Reasonable accommodations will be provided for qualified students with disabilities. If you have any disability that may impair your ability to complete the course successfully, please contact me during the first week of the course.

ACADEMIC INTEGRITY

Absolutely no cheating will be tolerated. UCSD Policies on Academic integrity will be enforced

For further information:

http://blink.ucsd.edu/Blink/External/Topics/Policy/0,1162,19400,00.html

All work must be done by the student to whom it is assigned, without any unauthorized aid of any kind.