

General Biochemistry II

CHEM 464

Syllabus for Fall 2009

Text: Nelson and Cox, Lehninger Principles of Biochemistry, 5th Edition

Please note that text assignments are to be read before coming to class.

LECTURE	DATE	TOPIC	TEXT ASSIGNMENT
1	August 31	Biochemistry Re-Introduction/Membranes	Chapter 11: 371-380
2	September 2	Membrane Transport	Chapter 11: 381-396
3	September 9	ATP and Ion Gradient-Driven Transport	Chapter 11: 396-413
4	September 14	Biosignaling – G protein-coupled receptors	Chapter 12: 419-439
5	September 16	Biosignaling –Protein Tyrosine Kinases, Ion Channels	Chapter 12: 439-455
6	September 21	Biosignaling – Vision, Olfaction, Gustation, Cell Cycle, and Oncogenes	Chapter 12: 461-478
7	September 23	Hormonal Regulation of Metabolism	Chapter 23: 901-912; 922-940
	September 28	Exam 1	Lectures 1-7
8	September 30	Enzyme Re-Introduction	Chapter 6: 183-205
9	October 5	Enzyme Mechanisms –Proteases	213-218, Handouts
10	October 7	Enzyme Mechanisms – Lysozyme	222-225, Handouts
11	October 13	Enzyme Mechanisms – Cyclooxygenase	800-803, Handouts
12	October 14	Enzyme Mechanisms – Tryptophan Synthase	865-869, Handouts
13	October 19	Enzyme Mechanisms – Bcr-Abl	475-476, Handouts
14	October 21	Enzyme Mechanisms – Histone Acetyltransferases	938-943, 1102-1103, Handouts
	October 26	Exam 2	Lectures 8-14
15	October 28	DNA Basics	Chapter 24: 947-971
16	November 2	DNA Replication	Chapter 25: 975-992
17	November 4	DNA Repair & Recombination	Chapter 25: 993-1014
18	November 9	Transcription	Chapter 26: 1021-1050
19	November 11	Transcription	Chapter 26: 1033-1062
20	November 16	Translation	Chapter 27: 1065-1099
21	November 18	Translation	Chapter 27: 1075-1109
	November 23	Exam 3	Lectures 15-21
22	November 30	Antibiotics and Resistance	Handouts
23	December 2	Antibiotics and Resistance	Handouts
24	December 7	Antibiotics and Resistance	Handouts
25	December 9	Antibiotics and Resistance	Handouts
	December 14 1:30 – 4:15	Final Exam	