

LIFE SCIENCES 3 (LS 3.2)
 Introduction to Molecular Biology, Spring 2008
 Tue & Thu, 2-3:15P
 Dr. Genhong Cheng and Dr. Randolph Wall

<u>Lecture</u>	<u>Date</u>	<u>Topics</u>	<u>Reading</u>
Cheng	April 1	Molecular Components	41-54
Cheng	April 3	Protein structure	72-91
Cheng	April 8	Protein function and Techniques	672-679
Cheng	April 10	DNA Structure	97-122
Cheng	April 15	DNA Replication	181-233
Cheng	April 17	RNA structure	122-127
Cheng	April 22	Transcription	347-377
Cheng	April 24	Regulation of Prokaryotic Transcription	483-499
Cheng	April 29	Regulation of Eukaryotic Transcription	529-551
Cheng	May 1	Review for Midterm Exam	
Cheng	May 6	Midterm Exam	
Wall	May 6	Eukaryotic Genes & mRNA Processing	371-374, 379-387, 391-395, 398-403, 406-409
Wall	May 8	Translation I: Genetic Code & tRNA	411-423, 461-477
Wall	May 13	Translation II: Ribosomes & Protein Synthesis	423-453, 458-459
Wall	May 15	Viruses & the New Central Dogma	681-684
Wall	May 20	Restriction Enzymes & DNA Mapping	647-653
Wall	May 22	Recombinant DNA Cloning & PCR	654-660
Wall	May 27	Screening & Identifying DNA Clones	651-653
Wall	May 29	Analyzing Cloned Genes & Gene Chips	660-671
Wall	June 3	Genomes, RNA & Gene Regulation	613-619, 635-640, 567-570
Wall	June 5	Final Exam Review	
Wall	June 10	Final Exam	

Text: Molecular Biology of the Gene (Fifth Edition), Cold Spring Harbor Press.
 J. D. Watson, T.A. Baker, S. P. Bell, A. Gann, M. Levine, and R. Losick