

課程名稱：BMES424200分子遺傳學 (Molecular Genetics)

學分數：3

時間：W3W4F3

地點：醫環系 R401

授課老師：張建文 (C.W. Chang)

助教：江品歆

Schedule:

| Lecture | Title |
|------------|--|
| 2/20, 2/22 | L1 Nucleic acid structure and gene expression |
| 2/27, 3/1 | L2 Chromosome structure and function |
| 3/6, 3/8 | L3 Genes in pedigrees and population |
| 3/13, 3/15 | L4 Amplifying DNA: cell-based DNA cloning and PCR |
| 3/20, 3/22 | L5 Nucleic acid hybridization |
| 3/27, 3/29 | L6 Analyzing the structure and expression of genes and genomes |
| 4/10, 4/12 | Mid-term exam |
| 4/17, 4/19 | L7 Organization of human genome |
| 4/24, 4/26 | L8 Human gene expression |
| 5/1, 5/3 | L9 Studying gene function in the post-genome era |
| 5/8, 5/10 | L10 Cancer genetics |
| 5/15, 5/17 | L11 Genetic testing of individuals |
| 5/22, 5/24 | L12 Pharmacogenetics, personalized medicine |
| 5/29, 5/31 | L13 Tentative special topics I: Genetic manipulation of animals |
| 6/5, 6/7 | L14 Tentative special topics II: Genetic approaches to treating diseases |
| 6/14 | Final Exam |

Textbook:

Human Molecular Genetics 4th edition. Garland Science (2010)

Grading:

10% class participation; 20% report/presentation; 35% midterm exam; 35% final exam.