



Molecules of Life
Dissemination Conference
Atlanta
March, 2008

The College

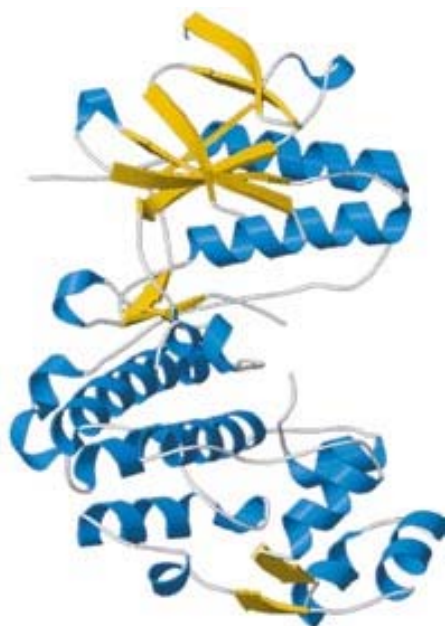


- 21,000 day and evening student population – 65 countries represented
- 60 fields of study including business, fine arts, graphic arts, performing arts, liberal arts and sciences, health related sciences, engineering technologies and social sciences
- 225 acre campus
- 25 miles from NYC, located in Garden City, Long Island

Chemistry Fundamentals

- Chemistry 108 – Consumer Chemistry
 - Spring Term, 4 credit course
- Student enrollment
 - 24-26 students
 - 10% no previous chemistry courses
 - 90% had 1 year of high school chemistry
- Prerequisites
 - no remedial math or english
- Course specifics
 - 2 lectures per week (1hr. 15 min/session)
 - 1 lab per week (2 hr. 30 min.)

MOL – Incorporated Modules



- Chapter 2: Enzymes as Biological Catalysts
- Chapter 3: Enzymes and Drug Design

Week #1 Specifics

- Introduction to Organic Chemistry - 2 Lectures
 - chemical bonding
 - functional groups
 - simple nomenclature
 - demonstration of model building
 - pretest assessment
- Lab Exercises
 - introduction to organic chemistry
 - comparison of organic vs inorganic compounds
 - qualitative testing of properties
 - model building

Week #2 Specifics

- MOL Module
 - Enzymes as Biological Catalysts – 2 lectures
 - introduction to kinetics and enzymes
 - chapter content
- Lab Exercises
 - alkanes, alkenes and other functional groups
 - qualitative testing
 - model building
 - simple reactions

Week #3 Specifics

- MOL Module
 - Enzymes and Drug Design - 2 lectures
 - chapter content
 - discussion of Vioxx article
 - individual student report on specific pharmaceutical
- Lab Exercises
 - Synthesis of aspirin and oil of wintergreen
 - TLC of student prepared aspirin and commercial analgesics



Week #4 Specifics

- Wrap Up, Review and Testing
- Post Test Assessment
- Classroom Hourly Exam

