

Syllabus: General Chemistry III, Chem-13, Summer 2011

Instructor: Dr. Ram Subramaniam

Office: AS-220

Email: rsubramaniam@scu.edu

Office Hours: By appointment

Class Meeting: MTWRF- 12:15-3:15 p.m., *Class Room:* AS-220

Text Book: The text book for this class is- “Chemistry: The Central Science, Brown, Lemay, Bursten, & Murphy, Eleventh Edition, Prentice Hall”

Course Content: This is the third and final class in the General Chemistry sequence. There will be a strong emphasis in laboratory procedures and data analysis as well as the lecture portion of the class. We will discuss various statistical tools used in data analysis and interpretation. The lecture will also focus on different titration analyses such as: acid-base, potentiometric, and redox titrations. Additionally, we will also introduce concepts in chemical thermodynamics and electrochemistry. We will also be discussing some essentials of spectroscopy.

Academic Honesty: In this class you are expected to do all the work associated with any of the graded assignments (quizzes, exams etc.) on your own. Unauthorized consultation in any form is strictly prohibited and may result in failure in the course. For more information on academic integrity please refer to:
<http://www.scu.edu/academics/bulletins/undergraduate/Academic-Integrity.cfm>

Disability Accommodation Policy: To request academic accommodations for a disability, students must contact Disability Resources located in The Drahnann Center in Benson, room 214, (408) 554-4111; TTY (408) 554-5445. Students must provide documentation of a disability to Disability Resources prior to receiving accommodations. For more details on how to qualify for accommodations please refer to:
<http://www.scu.edu/advising/learning/disabilities/index.cfm>

Class Attendance Policy: You are required to attend all classes during the quarter. Certain topics may be assigned for reading and not covered in class. It will be your responsibility to learn this material, as it will be included in the exams. It is not possible to schedule make-up exams due to the extremely rigorous structure of the quarter. The only situations that will be *considered* for a make up are: 1) Medical- in this case you are required to provide a note from your physician 2) Death in the family 3) Athletic events- if you are an athlete and will be away on a scheduled exam date participating in an athletic event representing the University.

Tentative Class Schedule: The following is a tentative schedule of topics to be discussed in each class. You are strongly encouraged to read the relevant sections from the text before coming to class. Dates of assignments are subject to change at the discretion of the instructor.

Date	Chapter	Topics
7/25		No Class
7/26	16	Review
7/27	17.1-17.3	Common Ion Effect, Buffers, Titrations
7/28	17.4-17.6	Solubility
7/29		Problem Set
8/1	<i>Mid Term I: Chapter 17</i>	
8/2	19.1-19.4	Entropy
8/3	19.5-19.7	Free Energy
8/4	Handout	Spectroscopy, Unknown S
8/5		Problem Set
8/9	<i>Mid Term II: Chapter 19</i>	
8/9	20.1-20.3	Redox Reactions
8/10	20.4-20.5	Cell Potential, Free Energy
8/11		Problem Set
8/12	<i>Final Exam: Chapter 20</i>	

Important Dates

Date	Activity
7/26	Last date to drop the class with a full refund
7/27	Last date to drop the class with a 50% refund
7/29	Last date to drop the class without a W (no refund)
8/5	Last date to withdraw from the class with a W
8/12	Final Exam

Evaluation: Lecture

Component	Points	Total Points
Problem Set	25	25
Mid-Term	2 × 100	200
Final Exam	1 × 100	100
Total		325

Evaluation: Laboratory

Component	Points	Total Points
Unknowns	5 × 60	300
Homework	4 × 5	20
Notebook	1 × 15	15
Proposal	1 × 15	15
Total		350

Overall points for the class: 325 (lecture) + 1/2 of 350 (laboratory) = 500