

GENERAL CHEMISTRY
CHEM 1010
Summer 2001

Instructor: Dr. Sheldon S. York
S. G. Mudd Building, Room 253
Phone 303-871-2990

Lecture Text: Chemistry, 2nd Edition, Silberberg, 2000, McGraw-Hill

Lectures: 8:10-10:20 a.m., M-F, Olin 205

Exams: There are 3 one-hour exams during the three week long quarter. That amounts to one each week. Each exam is on the material covered since the exam before. None are cumulative. The exam questions will be similar to the examples and exercises in the text and to the assigned homework questions.

Each exam is worth 100 points. Your two highest exam grades will be doubled when computing your final grade, your lowest exam grade will not be doubled. Therefore, the total points possible on the three exams are 500 points.

Homework: The homework problems are chosen to strengthen your understanding of the lecture material. The lecture and homework schedule lists the homework problems that are due that day. The total points possible from all of the homework assignments are 100 points.

Grading: Your final grade in the course is based on a maximum of 600 points, distributed as follows:

Hour exams (three 100 point exams, two highest grades doubled)	500 points
---	-------------------

Homework	100 points
-----------------	-------------------

The assignment of a letter grade (A, B, C, etc.) to a given numerical grade is a somewhat flexible procedure and depends on the overall class performance. Grades, however, will not be fitted to a statistical bell-shaped normal distribution. If the overall class performance is high, it is possible to have a distribution with predominantly A's and B's and relatively few lower grades.

The fast pace of summer school courses is very demanding. The most important advice that I can offer is to keep up with the assignments. We will cover 8 chapters of the textbook and have 3 exams in 3 weeks. Homework and lab reports are due almost every day. **Do not fall behind.** If you are having difficulties with some topic or calculation, be sure to ask questions in class to clear up the problem, or make an appointment to discuss it after class. Do not assume that dimly understood material will fall into place eventually, because the course will quickly pass beyond the topic, and then it will show up on an exam.

Do not make the mistake of believing that you can learn the course material from the lectures alone. Working through examples and exercises in the text and doing the homework is extremely important. It is the best measure of how well you understand the material. Homework assignments are due on the Mondays that you have an exam, and this material will be covered on the exam. You are urged to do these problems by the Friday of the week before so that you can ask any questions about them before the exam.

LECTURE AND HOMEWORK SCHEDULE

DATE	TOPIC	READING	HOMEWORK DUE
Jun 18	Atomic Structure	7.1-7.3	None
Jun 19	Atomic Structure	7.4	7: 8, 9, 10, 16
	Electron Configurations	8.1-8.2	7: 23, 27, 30, 32
Jun 20	Electron Configurations	8.3-8.5	7: 49, 54, 56, 57 8: 9, 10, 11, 14
Jun 21	Chemical Bonding	9.1-9.3	8: 25, 31, 34, 42 8: 53, 54, 55, 56 8: 74, 83, 84, 87
Jun 22	Chemical Bonding	9.4 10.1	9: 13, 20, 26, 29 9: 34, 38, 39, 40
Jun 25	HOURLY EXAM 1 Chemical Bonding	10.2	9: 48, 53, 57, 58 10: 7, 8, 16, 17
Jun 26	Molecular Shape	10.3-10.4	10: 21, 22, 30, 33
Jun 27	Bond Theory	11.1-11.2	10: 43, 46, 47, 48 10: 49, 50, 65, 66
Jun 28	Bond Theory	11.3	11: 7, 8, 12, 13
	Reactions in Aqueous Solutions	4.1	11: 16, 17, 21, 24
Jun 29	Reactions in Aqueous Solutions	4.2-4.4	11: 33, 34, 35, 36
	Oxidation-Reduction Reactions		4: 16, 21, 35, 38
Jul 2	HOURLY EXAM 2 Oxidation-Reduction Reactions	21.1	4: 39, 44, 45, 46 4: 65, 68, 69, 74
Jul 3	Thermochemistry	6.1-6.4	4: 96, 97 21: 14, 15
Jul 5	Thermochemistry	6.5-6.6	6: 10, 17, 21, 25
	Thermodynamics	20.1, 20.3	6: 37, 38, 50, 51
Jul 6	Help session for the first hour HOURLY EXAM 3		6: 63, 64, 75, 76 20: 12, 16, 17, 25