

GENERAL CHEMISTRY LAB
CHE 120-015 Spring 2006

Thursday 1:40-4:40p.m.. SC-422
Instructor: Gwen Fields
Office Hours: M, W, F 9:00a.m.-10:30a.m.
Office SC442 Phone# 572-6681

Co/Pre REQUISITE General Chemistry I Lecture

REQUIRED MATERIALS

- 1) Lab record book, Hayden McNeil Publishing
- 2) Safety goggles
- 3) Calculator- NOT graphics or programmable
Suggested models: Casio fx- (300SA-w, 115S-w, or 250HC-s), Sharp EL (506L or 509LH) or TI (34, 30Xa, or 36X)
- 4) General Chemistry Lab Manual (found online on the general chemistry lab site)

*** If you withdraw at any time from the lecture you must also withdraw from the lab. ***

TENTATIVE SCHEDULE

DATE	EXPERIMENT	DUE DATE
1/12	Check-in, Intro Msmnts.	1/19
1/19	Chromatography	1/26
1/26	Laboratory Measurements	2/2
2/2	Chem. and Phys. Properties	2/9
2/9	Zinc Iodide	2/16
2/16	Alum	2/23
2/23	Chemical Reactions	3/2
3/2	MIDTERM EXAM (Safety thru Chem Rxns)	
3/9	Spring Break--- no class	
3/16	Cycle of Copper	3/23
3/23	Titration	3/30
3/30	Calorimetry	4/6
4/6	Spectroscopy	4/13
4/13	Titration of Bleach	4/20
4/20	Lewis Structures / VSEPR	4/27
4/27	Final Exam (Copper thru Lewis)	

GRADING

Safety Quiz - 50 points

Intro. To Measurements - 25

All other Experiments- 75 points each

2 EXAMS- 100 points each (30 points practical, 70 points written)

Formal Lab Report- 100 points

TOTAL POINTS- 1275

Labs = 76% of final grade

Exams = 16 % of final grade

Formal Report = 8% of final grade

90 - 100 % A

80 - 89 % B

70 - 79 % C

60 - 69 % D

0 - 59 % F

LABORATORY NOTEBOOK

The lab record book is required for all experiments with the exception of the VSEPR lab on 4/20. No manual pages should be used during a lab period unless indicated by the instructor. Prior to entering the lab, 1) the notebook should contain the title thru protocol, and these sections should be initialed by the instructor before beginning the experiment 2) the prelab questions should be completed and ready to turn in.

The format for the lab notebook write-up is on p. iii of the lab manual.

A complete notebook entry for each experiment must have:

Title (2pts) of the experiment - at top of a new page

Objective (3pts) of the experiment (why you are doing the experiment)

Reagents (5pts) properties and safety concerns. The overall reaction, where applicable.

Protocol (10pts) written in numbered fashion on left column of the record book

Data and Observations (25pts) actual steps done; written in right column along side of protocol. List any amounts of reagents used and anything you see, hear, or smell (in relation to the experiment)

Calculations(10pts) for each new calculation done, one example should be done showing the formula used and how the data was "plugged-in" to the equation. The answers should always be recorded to the correct number of sig. figs. These go in your lab notebook.

The TOP copy of Title thru Data and Observations must be initialed by the instructor and the student and turned in prior to leaving the lab for the day. The white copy of the calculations may be turned in the next lab period with any corresponding data and/or question sheets. The remaining 45 points for the experiment will be divided appropriately among any data sheets from the lab supplement, pre and post-lab questions, and correct answer (identity of an unknown, % error, % recovery, etc.) Reports are due at the beginning of period following completion of lab. Late reports will incur a penalty of 2 points per week day. The last day to turn in any material to be graded is 4/28/06.

ATTENDANCE POLICY

There will be a maximum of two make-up labs for the semester. In order to have permission to make-up a lab, the instructor must be contacted by phone, not e-mail, within 24 hours of the start of the scheduled lab time. You **MUST** talk directly to the instructor, not just leave a message. You must schedule a new lab time with your instructor and the instructor with whom you will be making up the experiment. Upon contacting your instructor you will be notified of other days and times that are available for you to attend. The missed lab must be made up within one week of the missed lab, and the report will be turned in on your next scheduled lab session. There will be no lab work made up after 4/26/06.

FORMAL LAB REPORT

One formal written report will be prepared in stages throughout the semester. The report will be done on Zinc Iodide, in addition to the weekly report as described above. The format and directions for writing the report are in the front of the lab manual p.xviii and xix. The report must be typed. After a draft of each section has been submitted and graded, the student will make corrections before the final paper is submitted. The corrected rough draft and final paper must both be submitted on the due date.

Due Dates for Formal Reports

2/23 Title page, Objective, Introduction - 13 pts

3/16 Data, calculations, results - 14pts

3/30 Discussion and conclusion, references - 13 pts

4/20 Revised paper - 60 pts

The graded rough draft of each section must be attached or there will be a 20 point penalty!