

Chemistry 101A Lab

Fall 2009: Section 016, CRN 76301, TR 10-1, Science 202

Instructor: Robert Price, PhD
Office: S-248, 239-3515, rprice@ccsf.edu
Office Hours: MW 8:30 am-9:00 am, in S-248
W 1:30-2:30 pm and Th 2:00-3:00 pm in the MESA/STEM Center, Bungalow 201 (Go north from Science, along the path between Creative Arts and Art Extension)

Webpage for this lab section (available starting week 2):
http://www.ccsf.edu/Departments/Chemistry/price/Chem_101A_Lab/101_Lab_Index.html

Required Supplies: *Chemistry 101A Laboratory Manual*, 11th Edition
Laboratory Notebook with bound, quadrille-ruled pages (duplicate pages preferred) (A composition book or a spiral-bound notebook is **not** a laboratory notebook. Please be sure to get the real thing.)
Safety glasses with side shields or goggles
Scientific calculator

Suggested Supplies: Permanent markers (Sharpie or similar) for labeling glassware, ruler

Attendance: Required at all laboratories. You can not pass the course without participating in the laboratory. Students missing more than three consecutive laboratories without notifying me may be dropped from the course (W grade assigned). You must attend the laboratory for which you have registered. You may not attend sessions of another lab section without permission. Permission will be given only when you must miss your own lab session because of an excused absence (illness or personal emergency). Whenever you must be absent, please notify me by voice mail or e-mail.

Please arrive **on time** for each laboratory session so that you are present for all of the pre-lab discussion. Students who miss the pre-lab discussion will not be allowed to perform the experiment and will receive a score of zero.

Withdrawal: If you decide to withdraw from the course, it is your responsibility to contact the registration center by submitting the proper form in person or by using the STARS (web registration) system. I will not drop you automatically for non-attendance. I will assign a failing grade if you stop attending without filing for withdrawal. The deadline for withdrawing from the class is November 20.

Late Work: A penalty will be deducted from the score of any late assignments. The penalty is 20% for each lab period after the due date. Work more than one week late will not be accepted or graded.

Laboratory Notebooks and Reports

Follow the format and guidelines given on page ii of the laboratory manual for keeping your notebook. Your report will be a copy of the pages of your notebook, either a photocopy or a duplicate-page copy. **All items listed on p. ii of the lab manual must be included in your notebook for every experiment. You must complete items 1-3 (title, objective, method or procedure) as well as a data table prior to coming to class for each new experiment.** These items are considered your pre-lab, and are worth 2 points for most experiments. I will check notebooks at the beginning of most experiments. During lab, **record all data and observations directly in your notebook—do not use other pieces of paper.** In laboratory workplaces, lab notebooks are legal documents that must contain all original data. Since many of you will work in laboratories, I want to prepare you well. That is why I ask you to comply with all of these requirements.

For most experiments, I will also give you a data summary sheet to be attached to the front of your report. Please remember to include this summary sheet. Lab reports will usually be due at the beginning of the next lab period following completion of each experiment. Each day, please have your notebook initialed by me before leaving the lab.

Report Grading

Of the reports or results handed in, some will be graded in depth. These will be ten points each. Others will be graded based on certain parts only, or based on experimental results only. These will be worth five points each. Some others will be checked off to acknowledge completion of the work. These will not be worth any points, but your lab grade may be lowered if you do not turn them in. I will decide after the labs are turned in which to grade in depth, which to grade partially, and which to check off.

For each graded experiment, your score will be determined by your adherence to the lab report and notebook format, your advance preparation, your compliance with safety measures, and your use of the lab notebook for recording **all** information. **After one warning, I will deduct one point from your lab score every time I see that you are not using your notebook to record all data directly.** In labs that involve unknowns, part of the score will be based on how well you identify or measure a property of the unknown (in other words, based on your results). In some labs involving unknowns, the lab may be graded based only on the unknown; in such cases the maximum possible score will be 5 points.

Academic Integrity and Honesty

All work you submit must be your own. It is fine, and often very helpful to work on your reports with other students, but each student must use his or her own words in writing the various parts of the lab report. If I see identical wording in your reports, I will not give you (or the other person) any points for that particular experiment.

There will also be no tolerance for copying or attempting to cheat on quizzes. Please always do your own work—it's the only way to really be sure you're learning and mastering the subject.

Grading: (Approximate breakdown of points)

Pre-lab, 2 points for 13 experiments	26 points
Lab reports	150 points
Lab quizzes, about 5, 20 points each	100 points
Safety/Cleanliness	20 points
Participation	<u>20 points</u>
	316 points

Safety/Cleanliness: You will start the course with 20 points for safety and cleanliness. I will deduct one point each time I notice a safety/cleanliness violation on your part. Examples of violations are: not having safety glasses over your eyes while an experiment is in progress, forgetting your safety glasses, leaving a backpack or other object on the floor where someone could trip on it, leaving the lid off chemical supplies, spilling chemicals on the balance pan, leaving your area messy. You can get points back by noting safety problems in a lab procedure and proposing safer ways to perform the experiment with the equipment, supplies, and general method already provided.

Participation: You will begin with 18 participation points. You can gain points (up to a maximum of 20) by participating in prelab discussion—one point per experiment. You can lose participation points for being late or involving yourself in other activities during discussion (like talking, sleeping, texting, writing you lab report, doing work for another class)—one point for each occurrence.

The total lab points will be normalized to a maximum possible score of 125 points to be added to your lecture points in determining your grade for the course. This is done by multiplying your percentage of points earned by 125.