Chemistry 2101: Introductory Analytical Chemistry Lecture
Course Syllabus, Fall 2013

3 Credits

Instructor: Nic Frost
16 Smith Hall
frost112@umn.edu

Lectures: M W F 11:15 am – 12:05 pm
220 STSS (Science Teaching & Student Services)

TAs: Megan Weisenberger (weise135@umn.edu)
Alex Johnson (joh04584@umn.edu)
Marzieh Ramezani (ramez007@umn.edu)
Alyssa Cassabaum (cassa051@umn.edu)
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Joe Amato (amat0028@umn.edu)

Chem 2101 and Chem 2111 will share TAs.

Website: ay13.moodle.umn.edu

Office Hours: M 1:00 pm – 3:00 pm, F 1:00 pm – 2:00 pm, 16 Smith

Class Description: Chem 2101 is an introduction to the field of Chemical Analysis, i.e., the quantification of the amount of a particular compound in a particular sample, such as "how much cholesterol is in this milk?" At the conclusion of this class, students should have an understanding of the common approaches used in Analytical Chemistry. Topics that will be covered range from fundamentals typically encountered in Analytical Chemistry (e.g., statistics and chemical equilibria) to specific techniques, such as titrations, spectroscopy, and chromatography. Students with an interest in a career involving Analytical Chemistry are strongly encouraged to take Chem 4101 (Intermediate Analytical Chemistry). The two lecture courses 2101 and 4101 are accompanied by the lab courses Chem 2111 and 4111, which are strongly recommended to anyone with a serious interest in Analytical Chemistry, as are directed studies (Chem 4094) in a research group with an analytical focus. It is not a requirement to take Chem 2101 and Chem 2111 in the same semester, but you cannot take Chem 2111 without prior or concurrent enrollment in Chem 2101.

Required Materials: ***Quantitative Chemical Analysis*** **(8th Edition, Daniel C. Harris; W.H. Freeman and Company: New York, 2010).** All students are expected to have read the assigned chapters of the textbook prior to the lecture. The lectures are designed to build on the information in the textbook. Also, there will be recommended problems from the textbook to further your understanding of the material.

Attendance: Attendance at all lectures is assumed. You are responsible for all material and announcements presented in lecture.

Scholastic Conduct: All students are expected to be familiar with the University policy on scholastic conduct, particularly as it pertains to cheating; it may be reviewed at: *http://www1.umn.edu/regents/policies/academic/Student_Conduct_Code.html*

TAs are instructed to let those suspected of cheating to finish exams without informing them that their cheating has been observed. Cheaters are contacted after the exam by the instructor and, to discourage repeat offenders, are reported to the Office for Student Academic Integrity.

Disability Services: Students with disabilities that affect their ability to participate fully in lecture or to meet all course requirements are encouraged to bring this to the attention of the instructor as soon as possible so that appropriate arrangements can be made. A letter from the Office of Disability Services (www.ds.umn.edu) is required.

Grading: The course will be graded on a total points basis. The table below shows all of the graded components and the total points possible.

Category	Points Possible
Best Score from Exam I, II, or III	100
Second Best Score from Exam I, II, or III	100
Final Exam	150
Total Points Possible	**350**

The course will be graded on a curve, but a higher class average will result in a higher average grade. Typically, > 85% will receive an A- or better, > 70% will receive a B- or better, and > 60% will receive a C or better. There will be no incomplete grades given.

Exams: There will be three "hour" exams and one final exam in this course. Each "hour" exam will be taken in lecture, which means there will be a 50-minute time limit. Your lowest exam score from the three "hour" exams will be dropped. The final exam will be given according to the University's final exam schedule. You will need a calculator and writing utensils. Graphing calculators or smartphones are NOT allowed. You must have a non-programmable calculator. Exams will be closed book.

Make-up exams will NOT be given. A missed exam, regardless of the circumstances, will count as your lowest exam score and will be dropped.

Regrades: Requests to have an exam regraded will only be honored if the exam is written in ink and the request is detailed in writing.

Problem Sets: There will be suggested problems posted on the course Moodle site throughout the semester. These problems will not be graded but they will help you further your understanding of the material and prepare you for exams. We will discuss some of the problems in lecture; however, office hours are the recommended time to get help working through these problems.

Lecture Schedule: There is a lecture schedule posted on the course Moodle site. This schedule will be updated throughout the semester to reflect the progress made in lecture. Exam dates will <u>not</u> change.