

<u>Week</u>	<u>Chapter</u>	<u>Topic</u>
1 1/14–1/18	1 2	Keys to the Study of Chemistry The Components of Matter
2 1/21 1/23–1/25	2	No Lecture; Martin Luther King Day Holiday The Components of Matter
3 1/28–2/1	3	Stoichiometry of Formulas and Equations
4 2/4–2/6 2/8	3	Stoichiometry of Formulas and Equations Exam 1
5 2/11–2/15	4	Three Major Classes of Chemical Reactions
6 2/18–2/22	4 5	Three Major Classes of Chemical Reactions Gases and the Kinetic-Molecular Theory
7 2/25–3/1	5	Gases and the Kinetic-Molecular Theory
8 3/4–3/6 3/8 3/11–3/15	6	Thermochemistry: Energy Flow & Change Exam 2 No Lectures; Spring Break Holiday
9 3/18–3/22	6 7	Thermochemistry: Energy Flow & Change Quantum Theory and Atomic Structure
10 3/25–3/29	7	Quantum Theory and Atomic Structure
11 4/1–4/5	8	Electron Configuration and Chemical Periodicity
12 4/8–4/10 4/12	8 9	Electron Configuration and Chemical Periodicity Models of Chemical Bonding Exam 3
13 4/15–4/19	9 10	Models of Chemical Bonding The Shapes of Molecules
14 4/22–4/26	10 11	The Shapes of Molecules Theories of Covalent Bonding
15 4/29–5/1 5/3	11	Theories of Covalent Bonding No Lecture; Reading Day
16 Wednesday, 5/8, 8:00-9:50 am		Comprehensive Final Exam

Text: The text for this course is: M. S. Silberberg, "Principles of General Chemistry " 3rd Edition, McGraw Hill, 2013. A study guide with solutions is available, and students will almost certainly find it useful. Recommended for those students with marginal math backgrounds is: D. M. Goldish, "Basic Mathematics for Beginning Chemistry", 4th Ed, MacMillan, 1990. Copies are available from booksellers and are on reserve in Faraday Library, Faraday Hall, Room 212.

A number of old chemistry texts are available in Faraday Library. These older texts might explain a topic more clearly or provide extra end-of-chapter problems that will help you study for the class. Ask the library staff for help finding them.

BlackBoard: Class documents, such as this syllabus, some lecture material, exam keys and exam scores will be posted on BlackBoard. Thus, you should make certain you know how to access BlackBoard.

INFORMATION and POLICIES

Office Hours: I will hold office hours on Wednesdays and Fridays, from 2:00–2:55 PM. You are welcome to come to my office without an appointment for class assistance during these times. If you can't make it then, you may make an appointment for another time. However, since I have other responsibilities, appointments will be limited. You can contact me by e-mail to ask short, concise questions or to make appointments; however, the turnaround time may not be instantaneous.

Assistance with the Course Material: The Department of Chemistry & Biochemistry maintains Faraday Hall 246 as a free tutoring room for General Chemistry students. It is staffed irregularly; look for the schedule sheets posted around the Faraday complex and near the tutoring room. Names of tutors who charge for their services are available from Linda Davis in Faraday 319 (the Chemistry Department Office). Students may ask their recitation and laboratory TA's for assistance in understanding the lecture material; however, it should be understood that these people have other responsibilities, and may not accommodate requests instantly or at all.

As part of the price of your textbook, you have internet-based access to LearnSmart, an online chemistry learning technology made available by the text publisher. Use of LearnSmart is entirely optional; no part of your grade will be determined by your use or lack thereof. However, previous studies have shown that using LearnSmart is likely to improve your grade in Chem 210. Information on how to use LearnSmart will be posted on BlackBoard.

The NIU ACCESS program provides assistance with course material through its Supplemental Instruction (SI) system. Further information on this will be provided when available.

Recitation: R001 M 10:00–10:50 AM; R002 M 11:00–11:50 AM; R003 M 8:00–8:50 AM; R004 M 1:00–1:50 PM

Recitation TA: Heather Barkholtz, FW 414

Each of you must attend the recitation section assigned when you registered for the course. Recitation sessions will involve solving problems, discussing the course material and homework, and taking quizzes. The recitation score (100 points) will be based on attendance (2 points for each of 14 class meetings) plus the best four of five 20-point quizzes (80 points). **Late homework will not be accepted. There will be no make-up quizzes.** The professor will deal with any issues affecting your ability to attend recitation or take quizzes (such as medical problems or snow closures), on a case-by-case basis. His decision is final. The recitation score will replace the lowest examination grade if it is higher (see below).

Solving **all** of the problems at the end of each chapter, *with a time limit*, is good practice for the exams, since most exam questions will be taken from the text.

Exams and Grades: There will be three examinations (100 points each) during the semester. There will also be a comprehensive final examination (200 points). The in-semester exams will consist of 25 multiple choice questions; the final exam will consist of 50 multiple choice questions. All exams will employ Scantron technology. Keys for the exams will be posted on Blackboard.

You are expected to arrive promptly for exams. No student will be admitted to the exam room once any student has completed the exam and left the room.

Your overall final class grade will be determined as follows:

Best of Three Exams and Recitation:	300 points maximum
<u>Final Exam:</u>	<u>200 points maximum</u>
Total:	500 points maximum

The fact that the recitation score can replace one exam score allows you to miss an exam if absolutely necessary and lessens the effect of one poor exam on the overall grade. **There will be no makeup exams or extra credit.** The professor will deal with any issues that affect your ability to take exams (such as medical problems or snow closures) on a case-by-case basis. His decision is final.

The grading scale will be $\geq 80\%$ (400 points) = A, 70–79.9% (350–399 points) = B, 60–69.9% (300–349 points) = C, 50–59.9% (250–299 points) = D, $<50\%$ (249 points) = F. The scale may be revised slightly downward; **there will not be a curve.** In particular, the F range is guaranteed to start at 249 points. Also, there are two adjustments:

(1) Any student scoring less than 50% in recitation will receive a grade of F for the course, regardless of that student's performance on the exams.

(2) Any student scoring less than 60 out of 200 (30%) on the comprehensive final exam will receive a grade of F for the course, regardless of that student's performance on the previous exams.

Academic Dishonesty (cheating): Academic dishonesty includes, but is not limited to, looking at another student's exam during a testing session, allowing another student to copy work, and use of unauthorized materials (e.g., lecture notes, crib sheets, textbooks, prohibited electronic devices including pagers, cell phones, or programmable calculators containing stored equations, formulas, or text) during exams. Violation of any of these terms will result in assignment of a score of zero for the exam in question. **CHEATING IN ANY FORM WILL NOT BE TOLERATED AND MAY RESULT IN FAILURE OF THE ENTIRE COURSE.**

Disability Accommodations: NIU abides by Section 504 of the Rehabilitation Act of 1973, which mandates that reasonable accommodations be provided for qualified students with disabilities. If you have a disability that requires accommodations, you must register with the Disability Resource Center (DRC, 4th floor, University Health Services building (815-753-1303)), the designated office on campus to provide services and administer exams with accommodations for students with disabilities. Then, and only then, should you contact the professor.