

In the Chemistry II course, students build on their general chemistry experience from their junior year, as well as their increasing sophistication in science and math, to explore fundamental concepts not covered in the general chemistry course such as thermochemistry, behavior of gases, equilibrium, kinetics, electrochemistry and organic chemistry, which are central to acquiring a deeper understanding and application of chemistry. The course is highly quantitative with an emphasis on chemical calculations and mathematical formulation and is focused around a substantial laboratory component. The course will contribute to the development of the students' abilities to solve problems, work effectively in both independent and cooperative settings, think clearly, and to express their ideas orally and in writing, with clarity and logic. The course intends to meet the needs of students with career interests requiring a strong chemistry background, such as science, mathematics, engineering and the health professions. Although the concepts and labs that form the foundation of this course are included in the College Board's AP Chemistry curriculum, the goal of this class is not to prepare students to take the AP chemistry exam, but to give the students the opportunity to do advanced work in chemistry.

REQUIRED MATERIALS

Textbook: *Chemistry* by Zumdahl & Zumdahl 8th Ed. (Brooks/Cole Publishing, 2014)

Three-ring binder is recommended to help you maintain an organized notebook.

Lab Notebook: It is recommended that you keep a separate notebook for labwork. A single subject, spiral bound, 8.5 x 11 inches (50-70 pages).

Scientific calculator

GRADING SYSTEM: Grades are calculated using a percentage system, not total points.

Tests (60%) There will be a test at the end of each unit that may cover one or more chapters. Test objectives to help you focus your studies will be posted on the course website. This course will place a greater emphasis on the understanding of concepts and the development of problem solving skills as opposed to rote memorization of scientific facts. Tests will be designed to evaluate how well you understand the concepts and can apply your chemistry knowledge and problem solving ability. You will be permitted to use specific (teacher prepared) tables and handouts on tests.

Lab Work (25%) You will be required to record data and to complete analysis and conclusions questions for each lab. Scientific writing and lab reports are components of the lab work grade. There will be questions about lab concepts on each test.

Homework and Quizzes (15%) Homework is considered practice and does not get graded for accuracy. Assignments may involve web resources, the textbook or handouts. Practice is the only way to ensure success in chemistry and the assignments are intended to help you learn and master the material. Answer keys for most assignments are posted on the course website so you can check your work. Assignments are generally "quick-checked" in class, and answers reviewed and discussed. Homework assignments are given an effort grade of 100% if the assignments are turned in on, or before the due date. Assignments turned in after the due date will receive an effort grade of 50%. Assignments not done by the test date will receive an effort grade of zero. Quizzes will be given for each unit and will be posted on line as a Google form. Quizzes must be submitted by the due date. They are to be done individually, on your own, and you may use resources to help you.

Semester Exams- The final exam for the term will be the exam for the last unit of study.

Extra Credit- there will be extra credit problems and/or questions on unit tests. **No other extra credit will be assigned.** You are expected to keep up with course expectations.

WHAT IS EXPECTED OF YOU

- Be respectful- to your peers, teachers, classroom and school.
- Be responsible for your own learning and actions- take notes in class, complete required readings and assignments, pay close attention in class, stay on-task, review and study!
- Come to Class! Your best chance of mastering the concepts requires your presence in class.
- You must use electronic devices smartphone, tablet, laptop, etc. in an appropriate manner.
- Adhere to the school's honor code and maintain the highest degree of academic integrity. See the Q & A section of the web-site for specific info about what constitutes academic dishonesty.
- Sign a laboratory safety contract, follow the rules, and behave in an appropriate manner in class and lab.

NEED HELP?

Mr. S is very willing to provide extra help. Please use office hours, or you may request an appointment. You are expected to visit and use Mr. S's web-site where homework, useful links and test info will be posted.

<http://strippolichemistry.weebly.com/index.html>