

Chemistry Course Outline 2017 - 2018

Mr. Allan, El Diamante High School

Course Goals:

- 1) To prepare students of college ability for further study in chemistry and at the same time to present material of use in daily life.
- 2) To encourage the spirit of scientific investigation and with it the attitudes of accuracy in thought and work.

Semester 1

Unit 1 – Atomic Structure and the Origins of Elements

Atoms – Structure of the atom; Nuclear reactions and the Stellar origins of our elements

Unit 2 – Patterns of Behavior and Ionic Bonding

Elements classes; Periodic trends in Electron Configurations, Radius and Ionization energy

Unit 3 – Ionic and Covalent Bonding

Ionic Bonding and Covalent bonding; Models and Lewis Structures; Compound formulas, and formula mass; Polymers

Unit 4 – Conservation of Matter and Stoichiometry

The Mole and conversions; Chemical Equations and Conservation of Mass

Semester 2

Unit 5 – Chemical Reactions and Energy

Stoichiometry of Reactions; Energy and Reaction Kinetics; Chemical Equilibrium; Energy consumption

Unit 6 – Water and Earth's Hydrosphere

Properties of Water; Water, Earth's surface and Earth's climate

Unit 7 – Water as a Solvent

Properties of Solutions and Solution Concentration; Acids and Bases

Unit 8 – Gases and the Atmosphere

Physical Characteristics of Gases; Gas Laws; Kinetic Molecular Theory; Composition of the Atmosphere and Greenhouse Gases

Grading: Student achievement will be assessed primarily through benchmark quizzes, Unit tests, and lab reports. A score of zero is given to a student on a benchmark until the student passes the benchmark with a score of 75% or better. *The maximum score that will be recorded in the gradebook on a **retake** of a benchmark is 75%.* The student may retake the benchmark as many times as necessary until the end of the next unit, or the end of the semester, whichever comes first. Students should attend office hours to retake benchmarks, and to get help in preparing for a failed benchmark. Unit tests may be taken only one time each.

Course grades will be assigned according to VUSD's standard grading practice:

100% - 90% = A || 89.9% - 80% = B || 79.9% - 70% = C || 69.9% - 60% = D || Below 60% = F

Overall student progress grades, as well as the scores on individual assignments, are posted on the PowerSchool Portal for students and parents. I update the grades immediately upon completion of an assignment. Often, student scores will be available for a benchmark or test on the day in which the assessment was completed. I do not have access to student and parent login information (user ID and password). Those must be obtained from the learning director.

The PowerSchool Portal for students and parents is:

<https://powerschool.vusd.org/public/>

Attendance: It is your responsibility to find out what assignments have been missed during an absence and make plans with me for getting caught up on missed tests, quizzes and labs. If your illness will keep you out of school for more than two days I expect you to contact the school and request your assignments. I follow the district policy of giving you two school days to make up work for each day of excused absence.

Honesty:

Plagiarizing and copying assignments, or cheating on tests and quizzes will not be tolerated. ***All work is to be done individually.*** Failure to do so will result in a parent call or conference and a “zero” on the assignment. Repeated offenses will result in an unsatisfactory citizenship grade.

Citizenship Guidelines:

District policy states that teachers will assign a citizenship grade to students on report cards. Choices for the citizenship marks include "Outstanding," "Satisfactory," "Needs Improvement," and "Unsatisfactory". Students receiving two or more unsatisfactory citizenship marks from their instructors in a given grading period are ineligible for extracurricular activities for a period of at least six weeks.

District policy states that the following criteria shall be used in determining a student's citizenship mark in his/her class:

1. Attends class regularly
2. Comes to class on time. Six (6) or more unexcused tardies in a semester may result in an unsatisfactory citizenship mark.
3. Comes to class with necessary materials.
4. Completes homework assignments.
5. Meets deadlines.
6. Does his/her own work when independent work is required; does not cheat.
7. Exercises reasonable care of school property.
8. Shows respect for others.
9. Does not disrupt class; exercises good conduct.

Materials for Class:

1. Students will check out a chemistry book through the school library, and are accountable to the library for damage or loss of the textbook. I prefer that students leave this book at home and that they NOT transport it back and forth to school.
2. Students will have the opportunity to sign up for Internet access to an online version of their textbook. We might not have a classroom set of textbooks, so students may have to rely upon the Internet access to the textbook at school. We have Chromebooks in class for that purpose.
3. A binder with paper, pens, and #2 pencils.
4. Lab goggles are provided by the instructor. Students may also borrow calculators. Students may use their own calculators for class work, quizzes and tests. Smart phone calculators may be used for in-class work and laboratory calculations, but are not allowed on tests and quizzes.

My Web Site: I maintain an Internet web site as a resource for my chemistry students. At the site you will find the assignment calendar, practice quizzes, as well as all of the notes, PowerPoints, organizers and labs. Most of my documents are in Adobe PDF format, for which you will need to download a free viewing application. There are links at my site to the Adobe web site. My web site address is:

www.sciencegeek.net

Office Hours: My office hours are Monday through Friday at lunchtime. Students may also ask for help any other time that they find me in my room. I cannot guarantee my availability in the morning before 8AM. Outside of school hours, you may email at **andy.allan59@gmail.com**

I do not check my VUSD email during the evening or on weekends.