

AP CHEMISTRY SUMMER ASSIGNMENT AND FORMS REQUIRING SIGNATURES

Curriculum Plan: We will cover 18 chapters in the textbook at roughly a pace of 2-3 per month.

September

- Chapter 1- Chemical Foundations
- Chapter 2- Atoms, Molecules, and Ions
- Chapter 3- Stoichiometry

October

- Chapter 4 - Chemical Reactions
- Chapter 5 - Gases

November

- Chapter 6- Thermochemistry
- Chapter 7- Atomic Structure

December

- Chapter 8- Bonding
- Chapter 9- Covalent Bonding

January

- Chapter 10 - Liquids and Solids
- Chapter 11- Solutions February
- Chapter 12 - Chemical Kinetics
- Chapter 13- Equilibrium
- Chapter 14- Acids and Bases

March

- Chapter 15 - Aqueous Equilibrium
- Chapter 16- Spontaneity, Entropy, and Free Energy
- Chapter 17- Electrochemistry
- Chapter 22- Organic

April

Final Topics and REVIEW

May

AP EXAM is during the first two weeks of May, Date to be determined
Projects, labs, and presentations done in class

Summer Assignment

This course is a second year chemistry course. It is expected that students will enter this course with a strong understanding of introductory chemistry concepts and scientific math skills. Your summer assignment will review of the following concepts:

Chapter 1: Chemical Foundations
Chapter 2: Atoms Molecules and Ions
Chapter 3: Section 3.8-3.9 Chemical Equations

Things to do:

- Below is the reading. As you read, take notes and clearly label each part in your notebook.
- Complete the example problems
- Learn the names and symbols for elements 1-38, 47-51, 53-56, and 78-82.
- Commit to memory the contents of tables 2.3, 2.4, 2.5, 2.6, 2.7 and 2.8. There will be an ion quiz the first day that class meets.
- There will be a test on all of this material within the first few days of class, depending on the schedule.

Chapter	Topic	Reading	Example Problems
Chapter 1	Part 1 Introduction	p. 2-10	
	Part 2 Significant Digits	p. 11-17	p. 34 #33-39 odd
	Part 3 Dimensional Analysis and Density	p. 18-22 and 26	p. 34b # 49, 55, 69
	Part 4 Classification and Separation of Matter	p. 27-30	p. 34d #83, 87, 107, 119
Chapter 2	Part 1 Early History	p. 36-39	p. 66 # 19
	Part 2 Development of Basic Atomic Structure	p. 40-46	
	Part 3 Modern Atomic Structure	p. 46-51	p. 67 #38, 43, 45
	Part 4 Binary Ionic Compounds (Type I)	p. 51-55	p. 67c #75
	Part 5 Binary Ionic Compounds (Type II)	p. 55-57	p. 67c #76

Chapter	Topic	Reading	Examples Problems
	Part 7 Binary Covalent Compounds (Type III)	p. 59-61	p. 67c #81-82
	Part 8 Acids	p. 62-63	P. 67c #86
Chapter 3	Part 1 Chemical Equations	p. 90-95	p. 115 #33, 97, 101, 103

Safety and Summer Assignment Agreement

1. I agree to wear approved eye protection (goggles and/or full face shield) when involved in a laboratory activity in which corrosive liquids, hot liquids or hot solids are used, or in any activity, exposure to which might have a tendency to cause irritation or damage to the eyes.
2. I agree to wear chemical resistant laboratory aprons when corrosive chemicals are used.
3. I agree to wear proper shoes during a laboratory activity. It is strongly recommended that no sandals or any type of open shoes be worn in the laboratory on days experiments are to be performed. Use caution if you are wearing open footwear.
4. I agree that if my hair exceeds shoulder length or if the instructor deems it necessary I will tie it back.
5. I agree to remove my contact lens during activities involving exposure to chemical fumes, vapors and/or splashes.
6. I agree to maintain a quiet behavior during laboratory activities. I understand this is necessary to allow quick accurate instruction should an emergency occur.
7. I have read and will follow the general "Instructions for Safety", and any additional instructions given by the instructor or in the text.
8. I agree I am fully responsible for my actions and will behave appropriately during all laboratory activities.
9. I agree to use all laboratory equipment ONLY in the manner for which it is intended.
10. I agree to carefully follow the laboratory directions indicated in the laboratory and given by the instructor.
 - I have read the above and agree to abide by all of the rules.
 - I understand that if I do not abide by these safety rules and those set by my instructor I will not be permitted to work in the laboratory. This would result in a zero grade for any laboratory missed without the option to make up the laboratory or the grade.
 - I have read the AP Chemistry Summer assignment packet and understand the requirements for this class.
 - Additionally, there will be an honor code in effect for all assignments in AP Chemistry. Students are allowed and encouraged to work together on homework, assignments, and labs because this is one of the best ways to learn material. However, identical assignments, homework, test corrections and labs will be regarded as cheating and will receive no credit and disciplinary action.

Student name: _____ (please print)

Student Signature

Date

Parent Signature

Date

BOOK NUMBER _____