Exam #3 Objectives

CHEM 1050 Chemistry and the Citizen

Text Reading

Chapter 7: sections 1-4, 6-8

Homework Assignment

Chapter 7: 1, 2, 4, 7, 9, 10, 14, 15, 16, 24, 28, 29, 32, 35, 49, 51, 57, 58, 62, 63, 109

Concepts

1. Demonstrate the ability to balance chemical equations using the smallest whole number coefficients.
2. Given a chemical equation, identify the type of reaction (combination, combustion, decomposition, single replacement, or double replacement).
3. Using the periodic table, calculate molar masses for compounds (round to one decimal place).
4. Use Avogadro's number to convert between formula units and moles.
5. Use molar mass to convert between mass and moles.
6. Demonstrate the ability to do stoichiometric calculations.
7. Demonstrate the ability to draw diagrams that relate the energy of the reactants, the energy of the products, the heat of reaction, and the activation energy.
8. Demonstrate a working vocabulary of the following terms:

actual yield	combustion	molar mass
activation energy	decomposition reaction	mole
Avogadro's number	double replacement reaction	single replacement
chemical equation	endothermic	stoichiometry
chemical reaction	exothermic	theoretical yield
combination reaction	heat of reaction	