Exam 2 Study Guide

- Chapters 2.7-2.8; 3; 4.1-4.6 (skip 4.5)
- Quiz 2
- Lectures 9-17
- Homework 4-6

Chapter 2 (2.7-2.8)
- Periodic Table
  - families (names, charge states, metal/non-metal)
  - periods
- Naming Simple Compounds (Table 2.3, 2.5, 2.5)

Chapter 3
- average atomic mass
- atomic/molecular mass
- atomic/molecular molar mass
- Avogadro’s Number
- mole
- percent composition (wt-%)
- molar conversion factors
- determining empirical formulas
- molecular empirical formulas
- balancing chemical equations
- Stoichiometric calculations
- limiting reactants
- theoretical/actual/percent yields

Chapter 4.1-4.7 (skip 4.6)
- Aqueous solutions
  - solvent/solute
  - water (hydration)
  - strong/weak electrolytes
  - strong/weak acids/bases
- Molarity calculations
  - dilutions
- Describing reactions
  - molecular equation
  - complete ionic equation (spectator ions)
  - net ionic equation