

# Chapter 15 Study Guide

## Solutions

### Chemistry I

#### B. White



#### Chapter 15 Objectives

1. Describe the characteristics of solutions and identify the various types.
  2. Relate IMFs and the process of solvation.
  3. Define the solubility and identify factors affecting it.
  4. State the concentrations of solutions in different ways.
  5. Calculate the concentrations of solutions.
  6. Explain the nature of colligative properties.
  7. Describe all four colligative properties of solutions.
  8. Calculate the boiling point elevation and the freezing point depression of a solution.
  9. Identify the properties of suspensions and colloids.
10. Describe different types of colloids.
11. Explain the electrostatic forces in colloids.

#### Activities

- \_\_\_ Class presentation on solutions
- \_\_\_ Activity on concentration
- \_\_\_ Colligative properties activity (Making ice cream)
- \_\_\_ Lab Options
- \_\_\_ Optional student review and self-assessment from the web site [www.chemistrymc.com](http://www.chemistrymc.com)  
Username: cmc2005  
Password: t8chefec

#### Assignments

- \_\_\_ You have a choice with reading notes. Either take traditional reading notes OR answer questions 48-63 in place of reading notes.
- \_\_\_ **Homework** from the book: **page 484, 69-89 (10 pts)**

*Homework must be turned in on 8 ½ x 11 inch unlined paper. Homework must be completed and checked before the day of the chapter test, and it is the responsibility of the student to make sure that the homework is complete and corrected.*