Mixtures and Solutions Name: \_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_\_

Alternate Activity for Lab Block: \_\_\_\_\_\_\_\_\_ Date: \_\_\_\_\_\_\_\_\_\_\_\_\_

**Part I: Directions: Read textbook pages 110 D – 116 D and answer the following questions.**

1. Define the following words below.

a. Mixture

b. Solution

c. Solute

d. Solvent

e. Suspension

2. Why is a solution called a homogeneous mixture?

3. What is the difference between a solute and a solvent? Provide one example for each.

4. How does the freezing point of a solvent change when a solvent is dissolved into it? Provide one example.

5. How does the boiling point if a solution depend on the amount of solute in it?

6. Pure water freezes at zero degrees Celsius and boils at one hundred degrees Celsius. Would tap water likely freeze and boil at those exact temperatures? Why or why not?

**Part II. Directions: Read textbook pages 117 D – 123 D and answer the following questions.**

7. Define the following words below.

a. concentration

b. solubility

c. saturated

8. How can a solution be made more concentrated? How can a solution be made less concentrated?

9. What are two factors that can change the solubility of a gas?

10. Suppose you stir sugar into some ice water. Some of the sugar remains at the bottom of the glass. After the glass sits out for about an hour, you stir it again. What will happen to the sugar? Why?