Study Guide for Unit Test on Chemical Reactions

The upcoming test will focus on information from pages 75-85 in your science notebook. Answer the following questions on a sheet of notebook paper. You will turn in this paper before your test. The test will be Monday, April 14th.

1. What is a chemical reaction?  
2. What are four signs that a chemical reaction is taking place?   
3. What happens to chemical bonds when a reaction occurs?  
4. What is a chemical formula?  
5. What are the prefixes used for naming covalent compounds? (If I give you a formula, you will need to know the prefix to identify the correct chemical name!)  
6. What is the difference between covalent compounds and ionic compounds?  
7. What does the law of conservation of mass say?  
8. Know how to balance equations. Do the following equation on your own paper to practice:

\_\_\_\_CuO + \_\_\_\_\_HCl 🡪 \_\_\_\_\_CuCl2 + \_\_\_\_\_H2O

9. Label the equation above with the following terms on your paper: reactants, products, yields, subscripts, coefficients.  
10. What are the four types of chemical reactions and how do you know which is which?  
11. What is the difference between an exothermic reaction and an endothermic reaction?  
12. What does the law of conservation of energy say?  
13. What is activation energy?  
14. What are the five factors that can affect reaction rates and what do they do to the reaction?