Bauck's CHEMISTRY Ch. 1 Test Review

This is an optional assignment due the day of the test.

Materials: loose leaf paper, pen and pencil, calculator
Test date: _____
Test value: 200 points
Test format: multiple choice**;** physical vs. chemical change identification**;** density problems (show all work and units)**;** "thought questions" (short essays)

Topics:

1) **Alloy**—What is it?
2) **Chemical change**—What is it? Identify examples. Compare to chemical property. Contrast with physical change. How can you tell when a chemical change has occurred?
3) **Chemical formula**—What is it? Be able to count the number of atoms in a given formula such as $Cu(OH)_2$ = 5 atoms: 1Cu, 2O, 2H. List another example for this review.
4) **Chemical property**—What is it? Identify examples.
5) **Compound**— What is it? Identify examples. Compare and contrast element and mixture.
6) **Density problems**—Be able to solve for density, mass, and volume. The equation D = M/V will be given. Show all work and units. Show a sample solved density problem for this review.
7) **Endothermic** vs. **exothermic** reactions – compare and contrast
8) **Element**—What is it? Identify examples. Compare and contrast compound and mixture.
9) **Hypothesis**—What it is? Can it be proven? How does it fit into an experiment? Contrast with scientific law and theory.
10) **Law of Conservation of Energy**—What is it?
11) **Law of Conservation of Mass**—What is it? Be able to explain the law in your own words and apply it to a lab situation.
12) **Microscopic** vs. **submicroscopic** vs. **macroscopic** – compare and contrast
13) **Mixture**—What is it? Identify examples. Compare and contrast element and compound.
14) **Physical change**—What is it? Identify examples. Compare to physical property. Contrast with chemical change.
15) **Physical property**—What is it? Identify examples. How can you use physical properties to tell the difference between unknown substances?
16) **Pure substance**— What is it? Identify examples.
17) **Qualitative** vs. **quantitative** measurements – What are they? Compare and contrast them.
18) **Scientific law**—What it is? Can it be proven? How does it fit into an experiment? Contrast with hypothesis and theory.
19) **Solution**—What is it? Identify **solute** and **solvent**.
20) **Theory**—What it is? Can it be proven? How does it fit into an experiment? Contrast with scientific law and hypothesis.