Chapter 1 Study Guide

Name: _____

Define each:

1. Matter—
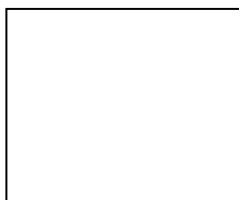2. Mass—
3. Weight—
4. Volume—

   State the formula for calculating *volume of a cube*:

   Calculate volume: L = 25 cm, W = 5 cm , H = 5 cm

5. Complete:

Term	Definition	Examples
Atom		
Molecule		
Element		
Compound		

6. List & draw 4 states of matter. Also describe the motion of the atoms that make up each:

   _____   _____   _____   _____

   _____   _____   _____   _____

7. State whether each is an element, compound, or molecule (you may have multiple answers for each:

   O_2_____

   CO_2_____

   Ca_____

   NaOH_____

   *carbon dioxide*_____

   *1 carbon atom*_____

   *2 oxygen atoms bonded together*_____

8. List 3 non-examples of matter.

9. A _____ has no definite shape or volume.
10. A _____ has definite shape & volume.
11. A _____ has volume but no definite shape.

12. Draw & explain how a simple distillation apparatus works.

13. Circle the pure substances:

Lemon Ade	Table salt (NaCl)	Soil
Cereal with milk	Iron	Oxygen

14. Define homogenous mixture—
15. Define heterogeneous mixture

16. State whether each is homogenous or heterogeneous:

_____Orange juice   _____plain milk
_____Soda drink   _____ Chex Mix

17. As temperature increases, gas pressure _____.
18. Would you weigh more or less on the moon? Please explain…