Name_____Date_____Period_____

Unit 1 Study Guide

1. What is an independent variable?
2. What is a dependent variable?
3. What happens to the hypothesis in the last step of the scientific method?
4. What is a hypothesis?
5. What is a control?
6. What do the following instruments measure?
a. Triple beam balance
b. Graduated cylinder
c. c. Thermometer
d. d.Ruler
7. What is scientific notation?
8. Convert the following units:
a. 20 ml=_____L
b. 59 meters=_____ mm
9. Write the following measurements in scientific notation:
a. 1,200,000 m=
b. 639,000 L=
c. 2,000,300,000 mm=
d. .000000523 cL=
e. 153 Kg=
10. Write the following in numerical terms:
a. 2.32 X 10 7 m =
b. 6.29 X 10 5 Kg=
c. 9.9 X 10 -5 L=
11. What is accuracy?
12. What is precision?
13. If the density of an object is 4.5 grams/ml and I measure it 4 times and get 2 grams/ml, 20 grams/ml, 10 grams/ml, and 0.05 grams/ml have I been accurate, precise, both or neither?
14. When drawing a graph what must be at the top?
15. What must come after all measurements?
16. Why is the metric system used in science?
17. What is a theory?
18. What is a law?
19. What is the difference between earth and environmental science?
20. Give three examples of quantitative data.
21. Give three examples of qualitative data.