Chapter 01 - Chemistry: An Introduction

Student: _____

1. Define the following terms:
a. science
b. chemistry

2. Define the following terms:
a. scientific method
b. natural law
c. hypothesis
d. theory

3. Which of the following is **not** a step in the scientific method?
A. Make an observation.
B. Formulate a hypothesis.
C. Perform an experiment.
D. Change results to agree with your hypothesis.
E. Develop a theory (or model).

4. A _____ is a summary of observed behavior, and a _____ is an explanation of behavior.
A. law, measurement
B. theory, scientific method
C. theory, law
D. law, theory
E. hypothesis, theory

Chapter 01 - Chemistry: An Introduction Key

1. Define the following terms:
a. science
b. chemistry

a. Science - a framework for gaining and organizing knowledge. It is a procedure for processing and understanding certain information.
b. Chemistry - the science that deals with the matter of the universe and the changes it can undergo.

2. Define the following terms:
a. scientific method
b. natural law
c. hypothesis
d. theory

a. Scientific method - the process or steps of scientific inquiry.
b. Natural law - a statement describing observed behavior.
c. Hypothesis - a possible explanation for an observation.
d. Theory - a set of testsed hypotheses that gives an explanation for some behavior or observation (also called a model).

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