

Scientific Method Study Guide

The following vocabulary and concepts will be on the test. Please study and practice.

Sources for information: Scientific Method Step-Book, Self-checks, Chapter 1 worksheet, Hypothesis worksheet, Personal dictionary, Ms. B's website, Interactive Science online text...

Vocabulary	Additional Concepts
Accuracy	Components and criteria of "Framing the investigation"
Analyze	Components and criteria of "Designing the investigation"
Attitudes of Science: bias, creativity, curiosity, ethics, honesty, open-mindedness, skepticism	Components and criteria of "Collecting and presenting information"
Conclusions	Components and criteria of "Analyzing and Interpreting Results"
Constant/Control variable	How to frame a scientific question or problem statement
Data	Reliable sources of background information
Data Table	How to write an "if . . . then . . . because " hypothesis
Dependent variable	What mass is and how to measure it
Equipment: beaker, graduated cylinder, microscope, thermometer, etc...	What volume is and how to measure it
Experiment	What temperature is and how to measure it
Graph (types and uses)	Units for measuring mass, volume and temperature
Hypothesis	Ways of recording data . . .
Independent variable	How to record data given a situation
Inference	How to write lab procedures using correct criteria and identify manipulated, responding, and control variables
Manipulated variable	How to correctly graph data
Model	How to evaluate and use data in a conclusion
Observation	How to evaluate the validity of an experiment
Prediction	How to write a 6 step conclusion
Qualitative	
Quantitative	
Responding variable	
Science	
Scientific law	
Scientific method	
Theory	