

Experiment

Conduct an experiment that (depending on the topic) tests an idea you are studying.

Definition: A test under controlled conditions that is conducted to demonstrate a known truth, examine the validity of a hypothesis, or determine the efficacy or something previously untried.



Words from the Trade:

- Analyze
- Conclusions
- Data
- Hypothesis
- Variable
- Design
- Prediction
- Results
- Scientific Method

Trade Hints:

- Put your results in a diagram, chart, graph, or table.
- Expect the unexpected.
- Make certain you follow all of the steps of the scientific method.
- Use safety procedures.
- Design your experiment in an area that interests you.



Project "Look-4s"

An excellent project has all of these elements:

- Hypothesis is clearly stated
- Experiment is well documented with lab notes
- Lab notes include illustrations of steps and results
- Reasonable conclusions are drawn from the research

	Achieving	Developing	Not Yet
Performance Characteristic	<p>3</p> 	<p>2</p> 	<p>1</p> 
Illustration of experiment	I drew all of the parts of what I saw	I drew some of the parts of what I saw	I did not draw what I saw
Description of experiment	I wrote down everything that I saw happen	I wrote down some of the things that I saw happen	I did not write down what happen
Description of process	I can tell what happened at the beginning, middle, and end	I can tell what happened but I get things a little mixed up	I could not tell what happened.
Understanding	I can tell why all the things happened the way they did in our experiment	I can tell why all the things happened the way they did in our experiment	I don't really know why things worked the way they did
Working like a scientist	I knew what to do and did it until it was done	I needed a little bit of help from the teacher	I kept getting mixed up and needed a lot of help from the teacher