



Lesson Plan

Archeology and Artifacts: Stones River National Battlefield

Grades

4, 5, 6

Subjects

Language Arts
Social Studies
Women's Studies

Time Allotted

45 minutes in class; 30 minutes
Stones River National Battlefield

Setting

Classroom; Stones River
National Battlefield

Group size

No limit, groups of 4 to 5 students

Skills

Classification, organization, observation, scientific inquiry

Methods

Students will learn the steps of scientific inquiry by studying archeology and classifying "artifacts."

Materials

Doohickey kit for each group. Must be identical and contain about two dozen familiar objects, such as, bolts, rocks, string, paper clips, cloth, candy (M&Ms, skittles), etc. Be sure to include different sizes and colors.

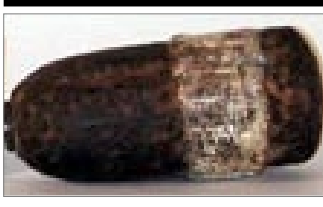
Keywords

Artifact
Attribute
Classification
Hypothesis
Inference
Observation

Objectives

At the end of the activity, students will be able to:

- *Categorize "artifacts" according to their attributes.*
- *Understand how scientists use classification to help answer research questions.*
- *Demonstrate the steps of scientific inquiry.*



BACKGROUND INFORMATION

Classifying objects is something that comes easy to us. We accomplish it by paying attention to certain attributes while ignoring others. It is hard to take in all the attributes at once; therefore, we tend to choose only the ones that are relevant to the immediate task. For example, if we have a group of items that are alike in every way except color, then color would be the attribute used for categorizing. If size is variable, then it too could be used, and so on.

The use of a certain classification system depends on what the classifier wants to know. When archeologists bring items back to the laboratory they decide what behavior they want to know and form a hypothesis. Next they use classification to help them accept or reject the hypothesis.

Archeology is based on observation and inference and both are used to learn the story of the past. By making an observation about an artifact, archeologists can infer the behavior of the people who used the object.

In 1995, an archeological study was conducted on a portion of the Stones River Battlefield. Archeologists used metal detectors to locate battle remnants and marked the spot with flags. Later the artifact was dug up and classified. By studying the type of object and its location, scientists hope to learn more about the actions and movements of troops during the battle.

Steps of Scientific Inquiry

- Behavioral Question
- Hypothesis
- Classification Categories
- Accept or Reject the Hypothesis
- Make a Behavioral Inference

ACTIVITY

- Distribute a “doohickey kit” to groups of 4 to 5 students and ask them to organize the objects into categories using one or more classification schemes.
- When the class is finished, have each group explain their schemes according to the attributes (shape, color, size, function, material, etc.) they chose.

- Compare and contrast each groups system and explain that one classification system is not any better than another, it depends on what you want to know.

- Devise some simple questions that might be answered by classifying the objects in the kit. For example: What colors are present? How many different shapes are there? Etc. The students will need to regroup the objects based on the question asked.

- Pass out copies of the classification worksheet or create your own to correlate with your kits. Discuss each with students. Then use the classification worksheet to assist students in placing the “artifacts” into categories.

FOLLOW-UP ACTIVITIES

- Pass out copies of photographs of civil war artifacts. Have students imagine they are archeologists that have excavated some artifacts on a portion of the Stones River battlefield. They are now ready to begin analyzing the items they brought back to the laboratory to find out what might have happened during the battle.

- Teachers might wish to introduce this activity by distributing pictures of battlefield items and captions cut-out and separated. The students can then speculate as to what the artifact is and how it was used. Finally the captions and photographs can be matched.

- Visit the museum at Stones River National Battlefield and categorize artifacts in the museum.

- Participate in a ranger program at Stones River National Battlefield.

- “Memories to Last: Observing Monuments” activity in this guide

RESOURCES

Smith, Shelly J. and Jeanne M. Moe, Kelly A. Letts, and Danielle M. Patterson. *Intrigue of the Past: A Teacher’s Guide for Fourth through Seventh Grades*. United States Department of Interior and Bureau of Land Management, 1996.