



Lesson: What is a Fossil?

Grade level: K-8

Preparation time: 10-15 minutes

Activity duration: 30 minutes - 2 hours

Learning objectives:

- Students will understand that a fossil is evidence of past life.
- Students will make observations about specimens that may or may not be fossils.
- Students will use evidence to determine if any observed feature of their specimen provides evidence of past life.
- Students will decide whether each specimen is a fossil and, if so, what kind of evidence of past life it provides.

Lesson background:

- Fossils provide evidence of past life. They can contain or show the ancient remains of plants and animals, or traces of them. It can be difficult to determine whether a specimen is a fossil (evidence of past life) or not a fossil (a rock or something that appears to indicate past life but actually does not). In this activity, students and teachers carefully examine several specimens that may or may not be fossils. The key is to decide whether or not each specimen provides evidence of past life.

Lesson materials provided:

- 19 sample specimens (see attached description sheet for further detail)

Lesson preparation:

- Read the background information included with this kit.
- Familiarize yourself with the specimen descriptions on the notecards provided in the kit.

Lesson procedure:

1. Explain to students that a fossil, by definition, provides evidence of past life. Ask if anyone has seen a fossil before, and have them describe some features that they remember. Tell them that during this activity, they will get to look at a variety of specimens and determine if each one shows evidence of past life, and can therefore be classified as a fossil.
2. Set out the specimens with their matching cards around a table or around the room.
3. Have students take out a sheet of paper and a pencil and number their sheet from #1 to #19.
4. Explain to the students that they will be observing a series of rock and fossil specimens. They need to decide if each is a rock or a fossil and why they think so. What evidence, if any, of past life does each specimen show?
5. Divide the students up among the 19 specimens. Allow 1-2 minutes per station and tell students when to switch stations. This provides an opportunity to lengthen the activity if necessary - students can take more detailed notes on each specimen.
6. After students have had a chance to observe every specimen, have them return to their seats.
7. As a class, go through the specimens together. Discuss observations and conclusions about whether each is a rock or a fossil and why. Use the "What is a Fossil?" notes as a resource during this discussion.