Teaching News Is Elementary April 29, 2016

Each week, this lesson will share some classroom activity ideas that use the newspaper or other NIE resources. You are encouraged to modify this lesson to fit the needs of your students. For example, some classrooms may be able to use this as a worksheet and others might need to ask and answer the questions in a class discussion.

Materials you will need for this lesson: The Seattle Times e-Edition, pencil and paper, dictionary, and several everyday objects in brown paper bags.

Article: "Broad mouth, keen hearing, fatter teeth set dinosaur apart" Page: Main, A2 Date: Wednesday, April 27, 2016

Pre- Reading Discussion Questions:

What is paleontology? What do paleontologists do? Look up the words 'inference' and "observation". Discuss what these words mean. How do these two words relate to each other? How are they different? How do you think paleontologists use observations? How do you think paleontologists use inferences?

Vocabulary:

Read the following quotes and determine the meaning of the word based on how it's used in the sentence:

"Broad mouth, keen hearing, fatter teeth set dinosaur apart."

Keen: sharp or penetrating, in particular.

"A rare and finely preserved skull unearthed in Argentina belonged to a dinosaur with a **drooping** head, far bigger eyes and keener hearing than some of its more evolved relatives, providing new clues about this group of **lumbering** plant-eaters."

Drooping: end or hang downward limply

Lumbering: moving in a slow, heavy, awkward way

"The fossil is from a dinosaur that was part of a group known as titanosaurs, and is considered **modest** in size, about 40 feet long and 10 tons in weight, in contrast to some others in that grouping. "About two elephants worth," estimated Matthew C. Lamanna, an assistant **curator** at the Carnegie Museum of Natural History in Pittsburgh.."

Modest: relatively moderate, limited, or small

Curator: a keeper or custodian of a museum or other collection

"Its bones had the same **proportions** of an adult, which suggests that young titanosaurs were quickly on their feet after hatching and **fending** for themselves."

Proportions: a part, share, or number considered in comparative relation to a whole

Fending: look after and provide for oneself, without any help from others.

"The **orientation** of the inner ear also suggests that Sarmientosaurus typically held its head pointing downward at a 45-degree angle. The scientists **infer** that it **foraged** on plants near the ground."

Orientation: physical position or direction of something

Infer: To conclude from evidence or by reasoning

Foraged: search widely for food

Journal Writing Prompts:

Look at the following statements from the article, label if they are observations (O) or inferences (I) and explain your thinking.

____ The fossil is from a dinosaur that was part of a group known as titanosaurs, and is considered modest in size, about 40 feet long and 10 tons in weight.

____ Its bones had the same proportions of an adult.

__ [This] suggests that young titanosaurs were quickly on their feet after hatching and fending for themselves.

____ Sarmientosaurus was unlike other titanosaurs, with a broad snout and fatter teeth.

___ It also had very large eye sockets, suggesting better than-average eyesight.

____ The orientation of the inner ear also suggests that Sarmientosaurus typically held its head pointing downward at a 45-degree angle.

____ The scientists infer that it foraged on plants near the ground.

Discussion Questions:

What were some of the observations that the paleontologists made about the dinosaur? How do you know? What were some inferences that the paleontologists made about the dinosaur? How do you know? How were the observations and inferences related? How did what the paleontologists prior knowledge (what they already knew about dinosaurs) help them make observations and inferences?

Small Group Discussion and Activity:

In a group or with a partner, choose a bag. Take turns reaching inside and feeling the object (no peeking). Write down a list of observations about the object. How does it feel? Is it smooth or rough? What shape is it? Is it light or heavy? Does it make a sound? Does it have a smell? After you finish your list of observations, make a list of inferences. What do you think the object is made of? Can you draw what it looks like? Can you guess what it is used for? When you are done, remove the object from the bag and check to see if your observations and inferences were right! Reflect on the process of making them. What was helpful to you? What do you wish you had been able to know?

Answer Key to Journal Writing Prompts

O The fossil is from a dinosaur that was part of a group known as titanosaurs, and is considered modest in size, about 40 feet long and 10 tons in weight.

O Its bones had the same proportions of an adult.

I [This] suggests that young titanosaurs were quickly on their feet after hatching and fending for themselves.

O Sarmientosaurus was unlike other titanosaurs, with a broad snout and fatter teeth.

O/I It also had very large eye sockets, suggesting better than-average eyesight.

I The orientation of the inner ear also suggests that Sarmientosaurus typically held its head pointing downward at a 45-degree angle.

I The scientists infer that it foraged on plants near the ground.

Copyright © 2016 The Seattle Times Company