

Name: _____ Class: _____

Treasures in a Pinecone

By Jan Black
2016

Jan Black has written for Highlights. In this informational text, Black explores what causes pinecones to open and close. As you read, take notes on how pinecones benefit the forest.

[1] One warm day when I was walking in my backyard, I saw a pinecone on the ground. I picked it up, and some seeds fell out of it. Those seeds would be a tasty treat for a squirrel, I thought. Would a squirrel find the seeds in time for dinner?



"A pinecone is sometimes closed. It is sometimes open." by David Liebman is used with permission.

I realized that pinecones were not always open like this one. Sometimes cones were tightly closed. I decided to find out why.

I read about pinecones in books and on the Internet. I interviewed a pinecone expert. I gathered pinecones from my backyard and kept them outside on my deck. I watched them for over a year. Here's what I learned.

Pinecones open and close slowly as the weather changes. When it's cold or wet, cones are tightly closed. This protects the seeds inside from rain and snow.

[5] When the weather becomes warm and dry, pinecones open. In a forest of pine trees on a hot day, you might even hear the crackling sound of cones popping open. The seeds inside may then fall to the ground. The wind may blow the seeds to places where they can grow into new pine trees. A seed has a better chance of taking root and growing when the weather is warm.

Seeds Are Food, Too

"Pine seeds are an important source of food for many animals," says Monty Maldonado. He is a pinecone expert with the United States Forest Service. He says squirrels depend on pinecone seeds for most of their meals. They spend lots of time gathering and storing the cones. Maldonado says some animals eat only the seeds from a pinecone. But red squirrels and gray squirrels will eat the whole thing.

Small animals aren't the only creatures who eat pine seeds. Maldonado says big grizzly bears and people eat them, too.

You may have eaten the seeds of the pinyon pine, which grows in the western United States. These seeds are also known as pinyon nuts, or pine nuts. They are used in salads, puddings, cakes, candy, cookies, and pesto sauce.

Seeds inside a pinecone are important for the growth of new trees and as food for animals. It is the pinecone's job to protect and release them. So take note of the pinecones you see on the ground. They hold treasures inside.

Copyright © Highlights for Children, Inc., Columbus, Ohio. All rights reserved.

Text-Dependent Questions

Directions: For the following questions, choose the best answer or respond in complete sentences.

1. PART A: What is the main idea of the text?
 - A. The seeds guarded in pinecones grow the forest and provide food for animals.
 - B. Humans often don't appreciate the importance of pinecones.
 - C. It's important to be curious when presented with a mystery in nature.
 - D. Pine seeds are tasty to humans and animals but not necessary to the forest.

2. PART B: Which detail from the text best supports the answer to Part A?
 - A. "One warm day when I was walking in my backyard, I saw a pinecone on the ground. I picked it up, and some seeds fell out of it." (Paragraph 1)
 - B. "I gathered pinecones from my backyard and kept them outside on my deck. I watched them for over a year. Here's what I learned." (Paragraph 3)
 - C. "You may have eaten the seeds of the pinyon pine, which grows in the western United States. These seeds are also known as pinyon nuts, or pine nuts." (Paragraph 7)
 - D. "Seeds inside a pinecone are important for the growth of new trees and as food for animals. It is the pinecone's job to protect and release them." (Paragraph 8)

3. Which of the following best describes the author's point of view?
 - A. Pinecones are very important part of nature for many different reasons.
 - B. The United States Forest Service should protect pinecones.
 - C. Readers should do their own research when they're curious about something.
 - D. There are many different ways one can explore nature and learn about pinecones.

4. What is the relationship between the weather and the appearance of pinecones?
