

GENERATIONGENIUS Always question. Always wonder.

# **LESSON PLAN**

**D** Link to Video

## LIVING THINGS CHANGE THEIR ENVIRONMENT GRADES K-2

**SUMMARY** 

Students design a bird nest and learn how birds change their environment when they make their homes. Duration: 45 minutes.

#### NEXT GENERATION SCIENCE CORRELATION STANDARDS

K-ESS2-2. Construct an argument supported by evidence for how plants and animals (including humans) can change the environment to meet their needs.

Science & Engineering Practices	Connections to Classroom Activity
<ul> <li>Analyzing and Interpreting Data</li> <li>Analyzing data in K–2 builds on prior experiences and progresses to collecting, recording and sharing observations.</li> <li>Use observations (firsthand or from media) to describe patterns in the natural world in order to answer scientific questions. (K-ESS2-1)</li> <li>Engaging in Argument from Evidence</li> <li>Engaging in argument from evidence in K–2 builds on prior experiences and progresses to comparing ideas and representations about the natural and designed world(s).</li> <li>Construct an argument with evidence to support a claim. (K-ESS2-2)</li> </ul>	<ul> <li>Students observe a bird nest and see that it is made from things that are in the bird's environment. The students will use evidence to support the claim that animals change their environment when they build their homes.</li> </ul>

Disciplinary Core Ideas	Connections to Classroom Activity
<b>ESS2.E: Biogeology</b> Plants and animals can change their environment. (KESS2-2)	<ul> <li>Students learn that birds change their environment when they build a nest.</li> </ul>
Crosscutting Concepts	Connections to Classroom Activity

ENGAGE

Show students the attached images of bird nests. Ask:

- Have you ever seen a bird nest before?
- How do you think a bird makes its nest?
- Where does the bird get the materials to make the nest?

These questions should start a conversation about how birds find twigs, grasses, leaves, etc. Birds pick them up with their beaks and then fly to a tree to build their nests. Tell students that today they will be building nests using a variety of materials from around their environment.

### EXPLORE

Before the lesson place different materials in different areas of the classroom, so students can move around their environment like birds do in order to make their nest.

Give student groups a paper plate and allow them to begin making their nests. Encourage them to use a variety of materials. After they are done, place "eggs" such as jellybeans or large gum balls in each one.

#### MATERIALS

- Shredded newspaper
- Yarn
- String
- Thread
- Pieces of felt
- Pipe cleaners
- Twigs
- Paper plates
- Glue
- Dried leaves
- Small objects such as jellybeans or bubble gum balls to represent eggs

#### **DIY Activity**

- Foil baking pan
- Foil bread pan
- Pitcher of water
- Handful of sticks
- Handful of leaves
- Handful of rocks
- Container of chocolate frosting
- Plastic spoon
- Pencil
- 2 Books



Allow students to share their nests with the class. Some follow up questions might be:

- Where might a bird find some of the materials for their nests?
- How long do you think it takes for a bird to build a nest?
- Why is it important for a bird to have a nest?

Discuss how birds change their environment when they build their nests by moving materials around. They also change the environment of the tree they choose to build their nest in.

#### ELABORATE

## WATCH THE GENERATION GENIUS LIVING THINGS CHANGE THEIR ENVIRONMENT VIDEO AS A GROUP

Then facilitate using the Discussion Questions.

Discuss other ways animals change their environment. Some examples include beavers building dams and changing the flow of water, or animals building burrows underground, such as prairie dogs. See if students can think of any other examples that result in a change to the environment.

# EVALUATE

Students can play the online Kahoot! quiz game located below the video which provides downloadable scores at the end of the quiz game. Alternatively, you can use the paper quiz or the exit ticket questions. All these resources are located below the video in the Assessment section.

# EXTENSION

For older students, you could extend to discussing different species of birds and different types of nests they build. This website shows some non-traditional bird nests that students may not be familiar with; <a href="https://www.birdlife.org/worldwide/news/8-incredible-bird-nests-around-world">https://www.birdlife.org/worldwide/news/8-incredible-bird-nests-around-world</a> It shows how birds use their environment and what's available to them to build a nest.

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### **BIRD NESTS**



