

Connecting With Your Child

Observing Interactions in Ecosystems

To apply what your child has learned about ecosystems, take your child to a natural area nearby. It could be your backyard, a local park, a riverside, a city street, or any area where you might observe organisms in their natural environment. Work with your child to select an organism to observe. It could be an animal, such as a deer, squirrel, or fish. Keep in mind that smaller animals, such as insects, can be found in grass and under rocks. Insects often make



fascinating subjects for observation. You may also choose to observe a type of plant or a fungus, such as a mushroom. Whatever you observe, be safe and do not touch or otherwise disturb the organism.

Write down the ways the organism is interacting with the living and nonliving components around it. For example, a beetle may be interacting with nonliving components by digging in the soil or drinking water. It may be interacting with living components by eating plants, or it may be prey for birds or other insects.

With your child, convert your list into a visual representation of these connections. Use a piece of poster board or butcher paper for your visual. Write the name of your organism at the center, and draw a picture of it. Draw lines from the organism to all the living and nonliving components with which it interacts. Label each interaction on the line between the organism and the component. Feel free to draw lines between many different components.

For example, you may connect a beetle with a plant that it is eating, then draw a line between the plant and the soil that the beetle is digging in. On the line between the plant and the soil, you can label that the plant obtains nutrients and water from the soil. The goal is to illustrate that the living and nonliving components in an ecosystem are highly interconnected.

Here are some questions to discuss with your child:

1. How is your organism dependent on the living components in its environment?
2. How is your organism dependent on the nonliving components in its environment?
3. What components are needed by almost all organisms in the environment?
4. Which interactions were difficult to observe? How do you know they were happening?