

## Week 7: How Do Plants and Animals Relate?, Part 2

### Plants Need Animals

We have learned how animals need plants, but plants also need animals. Think about where plants are found. Are they only in one place? No!

Different types of plants are everywhere. Oak trees could be beside maple trees, and twenty miles away, oak trees could be beside a grassy meadow.

How did the types of plants get so spread out?

All plants start from the same thing. Think about these clues to try to figure out what all plants start as: colorful, dark, light, heavy, prickly, smooth, big, small.



If you guessed seeds, you are correct. All plants come from **seeds**. How do the seeds get to so many different areas? One way is by animals!

Animals take seeds from place to place by the fur on their bodies. Some seeds have prickly pieces, are really small, or have some adaptation to make them animal friendly.



Birds are also very helpful in transporting seeds. Birds eat seeds as an important part of their diet. As part of the digestion process, the seeds are spread to areas sometimes miles away from the original plant.

Small animals, such as squirrels, chipmunks, and rabbits, also spread seeds through the digestion process.

## Seed Dispersal

Can you think of any other ways seeds might be spread to different places? To **disperse** means to scatter or move in different directions.



Seeds could be dispersed by the following ways:

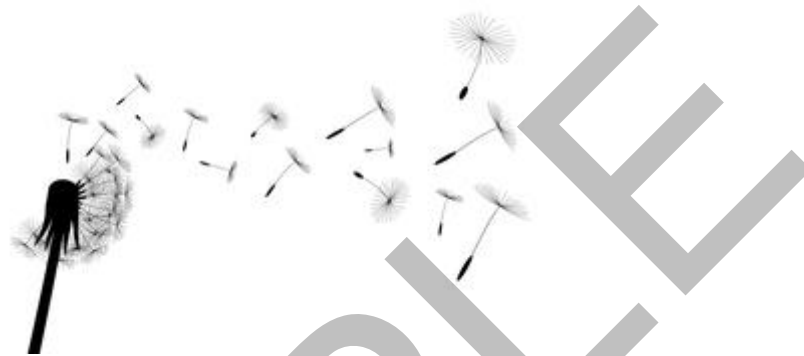
1. animals
2. wind
3. water
4. expulsion

**Seed transporters** are things that help move seeds from one place to another.

Have you ever walked through a wooded area and had plant material stuck to your socks or pant legs? If you have, you have been a seed transporter.

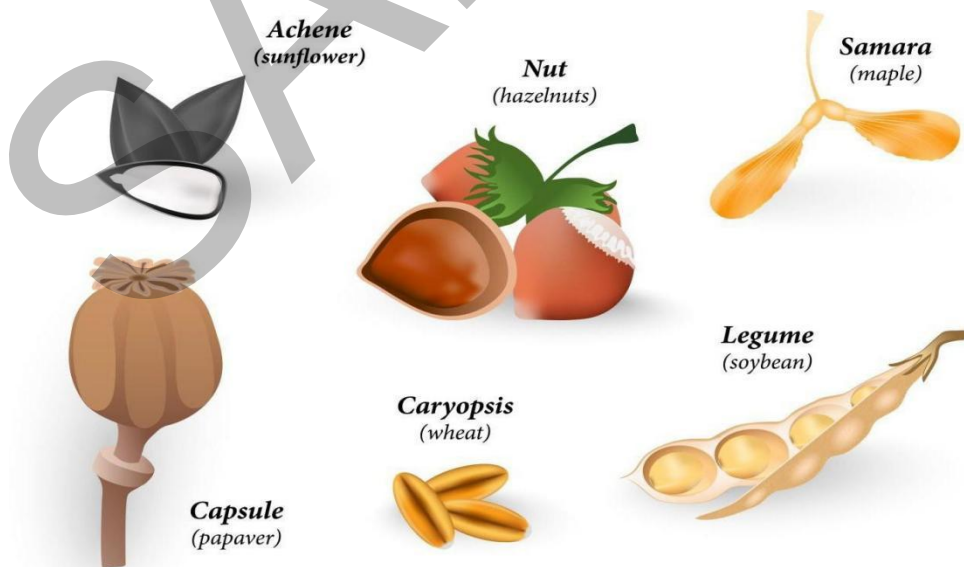
We've already talked about how animals can be seed transporters, but wind, water, and people can also be seed transporters.

The wind helps to move some seeds that are very light. Seeds that move easily in the wind often have little "wings" or "fluff" on them. For example, think of dandelion seeds that blow away in the wind.



The water helps to move some seeds to other places too. For example, coconut seeds float and may be carried by the water to a new place where they can grow.

Some seeds travel on their own by something called expulsion. That means the seed pops or bursts out of the plant! For example, the seed pods of a plant called a touch-me-not can burst open and shoot out the seeds when they are touched.

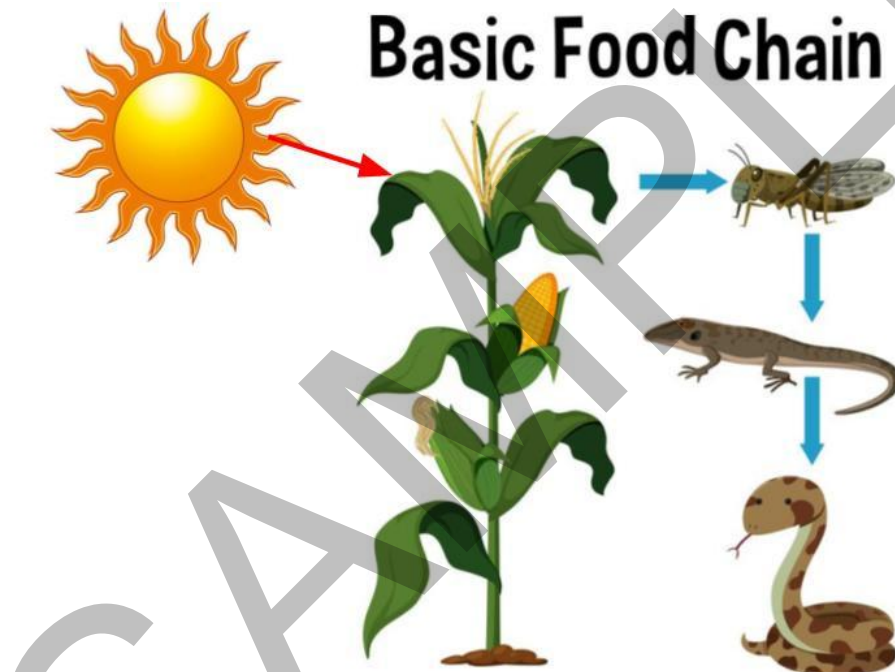


## More About the Food Chain

We've learned that animals need food.

We also learned that all plants and animals are part of a **food chain**. Plants, which make their own food, are producers. Animals are consumers because they eat, or consume, plants and/or other animals.

And we learned that there are different kinds of food chains. For instance, you will find a polar bear in the arctic food chain and a monkey in the tropical forest food chain.

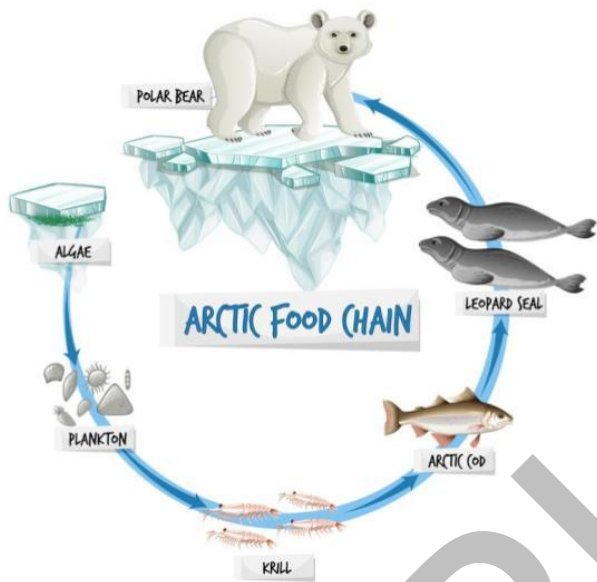


Many food chain pictures have a plant at the beginning of the food chain, but some may say a food chain really starts with the sun. It makes sense to say that, doesn't it? Plants need energy from sunlight to complete photosynthesis.

No sunlight means no photosynthesis. No photosynthesis means no plants. No plants means hungry animals.

Plus, we learned that animals need sunlight to live, too. Sunlight is an important part of both plant and animal life.

Do you remember seeing the arctic food chain?



What is near the beginning of the arctic food chain after algae? Plankton! **Plankton** are tiny organisms floating in the ocean. Many food chains for underwater animals, such as whales and sharks, include plankton.

Like plants, plankton use sunlight, carbon dioxide, water, and nutrients found in the ocean to create their own food through **photosynthesis**.

## Sea Turtles in Their Habitats

Do you remember learning about habitats? A **habitat** is the natural home or environment where an animal lives. You may be able to see animals in their habitat. However, some animals may be harder for you to observe because they are wild animals that live far away.

Today, we will learn about a very interesting animal. Unless you live on a beach, you probably do not have this animal in your backyard. What is it?



A sea turtle!

Sea turtles live in oceans all over the world. Did you know that male sea turtles stay in the ocean their whole lives? Female sea turtles only come on land to nest and lay eggs.

Female sea turtles nest and lay eggs on sandy beaches. They dig holes and lay hundreds of eggs. Then they return to the ocean.



When the baby sea turtles hatch, they crawl straight to the ocean where they live the rest of their lives. Baby sea turtles are called **hatchlings**.



There are seven different types of sea turtles. Different types of turtles eat different things.

Some sea turtles are **herbivores**; do you remember what that means? It means they eat plants. These sea turtles eat plants in the ocean like algae and seagrass.

Other types of sea turtles are **carnivores**, which means they eat meat. They eat other animals in the ocean like crab, fish, worms, and jellyfish.

And still other sea turtles are **omnivores**. Which means what? They eat sea plants and sea animals.

Whether they are herbivores or carnivores, sea turtles find the food they need in their watery habitat.

## Lesson Activities

1. Create a Venn diagram with plants and animals. On the left, write plants. On the right, write animals. List characteristics of each that are different from the other on the outside. Write characteristics that are the same in the center overlapping section. Either download the Week 7: Venn Diagram Template\* or draw two circles that overlap on a piece of paper to create the Venn diagram.
2. Watch this video about how plant seeds travel:  
<https://www.youtube.com/watch?v=WqgVks9NViQ>.
3. Try an experiment to see how plants create oxygen as shown here:  
<https://www.kids-fun-science.com/plant-experiments.html>.
4. Download and view the Week 7: Seed Dispersal Presentation.\*
5. Download and complete the Week 7: Seed Dispersal Sorting Activity. Download the Week 7: Seed Dispersal Sorting Activity Answer Key to check the answers.\*
6. Download and complete the Week 7: Plant Needs Worksheet.\*
7. Download and complete the Week 7: Parts of a Seed Activity.\*
8. Download and complete the Week 7: Seed Sprouting Experiment.\*
9. Watch a video about food chains:  
<https://www.youtube.com/watch?v=MuKs9o1s8h8>.
10. Watch a video about a sea turtle in its natural habitat:  
<https://www.youtube.com/watch?v=3hziM2z37jE>.

*SchoolhouseTeachers.com note: Parents should closely monitor children's use of YouTube and Wikipedia if you navigate away from the videos and articles cited in these lessons. We also recommend viewing the videos on a full screen setting in order to minimize your students' exposure to potentially offensive ads and inappropriate comments beside or beneath the video.*