

Ocean Habitat

5TH GRADE • 6TH GRADE

SUMMER LESSONS



Extended Learning Partnership

Oceans: Environmental and Genetic Factors

Today you learned about the ocean ecosystem. This is the largest ecosystem covering roughly 71% of the earth. In the video, you saw our Sea Lion Cove which represents the cold waters of the California coast. These animals need cooler water to survive and they have blubber to help keep them warm. You also saw our Stingray Bay. This is home to some different species of sharks and stingrays. These animals survive in a warmer climate than our sea lions. Changes in our ocean temperatures can drastically affect these animals' chances of surviving. Another environmental factor affecting our oceans is the movement of water. Tides affect our marine organisms that live on our California coastline. Tides usually occur twice a day and many organisms are adapted to survive. These organisms have to be adapted to resist drying out when they are more exposed during low tide.

Genetic factors also play a role in the chances of animal survival. If an animal is born with a genetic mutation then their chances of survival are much less. This may affect how animals finds food, moves or even senses the world around them. Wishbone, one of our California sea lions, was born without developed eyes. As you can imagine this would be very hard for him to hunt for food in his natural environment. Thankfully, he was rescued and is doing great at Sea Lion Cove. He uses his special whiskers, called vibrissae, to sense objects around him making him a pro in his habitat.

Activity:

 Test out your skills like Wishbone! Cover your eyes and have a family member direct you around your house with their voice. Use your hands like the sea lions' special whiskers and try not to bump into anything along the way.

Writing prompt:

- Read about the Great Pacific Garbage Patch and write an informative text. With your writing, convey the importance of recycling and persuade your audience to take action!
 - https://www.nationalgeographic.org/encyclopedia/great-pacific-garbage-patch/

Math:

- There were 195 guests who watched the sea lion cove keeper chat. If 65 guests visited each time, how many keeper chats were there?
- The rectangular sea lion cove pool has a height of 20 feet, length of 50 feet and a width of 15 feet. What is the volume of the pool?

Check for Understanding:

• How can genetic mutations affect animals in their natural habitat?

