Community of CURIOSITY

Milwaukee Public Museum

LIVING OCEANS HABITATS

The Milwaukee Public Museum's *Living Oceans* exhibit first opened in 1972 after intense work from a team of Museum scientists and artists. At the time, MPM had several exhibits showing the richness and variety of life — on land. These included dioramas depicting the natural worlds of North America, Asia, Australia, and Africa. **One goal of *Living Oceans* was to take the diorama format and extend it into the ocean to better demonstrate our Earth's full biodiversity.**

Living Oceans has ten portholes presenting five habitats in the oceans: inshore areas, a coral reef, the open ocean, a rocky habitat, and the deep, sunless abyssal zone. **A habitat is the natural home of a plant, animal, or other organism.** An organism's habitat fits it just right, providing the correct amount or type of things like food, water, temperature, or seasons.

Use this guide to learn more about ocean habitats!

Portholes 1 and 2

This sandy Caribbean underwater landscape is relatively shallow at only 10-12 feet below the ocean surface. Therefore, the sun can still penetrate this portion of the ocean, creating a habitat with a wide variety of plant and animal life as well as warmer waters than the deeper parts of the ocean.

Portholes 3 and 4

While still in the Caribbean, this habitat is marked by the presence of coral. Coral is an important part of the ecosystem because it provides a home for other animals, namely the long-spined sea urchins. The reef builds toward a crest, but then drops off near water as deep as 30 feet. There is an enormous amount of biodiversity here — so much that ecologists classify coral reefs as among the most diverse habitats on Earth, along with tropical rainforests.

Porthole 5

The open sea habitat in the Atlantic Ocean is farther from the shore. The animals who live here have specific camouflage and coloration for survival. This habitat is away from the continental shelf, meaning the bottom may be hundreds of fathoms down; plants in the form of algae manage to live by just floating.

Porthole 6

This Pacific coast habitat is about 70 feet deep. An important part of this habitat and the larger ecosystem is the kelp, which provides a home for many different ocean animals. In fact, the kelp is so prolific and layered that it has multiple niches, all of which create different homes for animals.

Portholes 7 and 8

In the Pacific rocky bottom, the ocean is about 90-200 feet deep. Even though they're not alive, the rocks are an important part of the local ecosystem, providing a home for the creatures that live there, like moray, scallops, and abalone. Notice that this deeper, rocky home, different from the shallower parts of the ocean, is a habitat for animals different from those in shallower parts of the ocean.

Porthole 9

The deep, dark ocean has virtually no plants. Still, fish like the coelacanth have evolved to live successfully in this environment.

Porthole 10

The Atlantic deep ocean is deep indeed! The bathysphere diving vehicle is 3,028 deep, and the ocean floor is 2,300 feet below that. There's no sunlight, the water is cold, and there are very few, if any, plants. This environment has engendered animals that create their own light inside their bodies.