

FASHION A FISH

ADAPTED FROM PROJECT WILD AQUATIC

LEARN ABOUT ADAPTATIONS BY CREATING A FISH THAT CAN SURVIVE IN A RANDOMLY CHOSEN ENVIRONMENT

Fourth Grade Next Generation Science Standards Met:

[LS1.A](#) Structure and Function

- [4-LS1-1](#)

[ETS1.A](#): Defining and Delimiting Engineering Problems

Pre-Trip Information/Activities (to be done in the classroom prior to trip)

[What is Adaptation?](#)

[Fish Adaptation Videos](#)

[Fish Adaptation Virtual Lab](#)

Materials:

- Paper, colored pencils
- Fish adaptation sheets (laminated, shared among groups)
- Various habitat cards (to be chosen randomly by groups)

Objective:

Students will learn how adaptations can help an animal survive and reproduce in their environment by choosing certain adaptations for their fish after randomly choosing an environment that it will need to survive in.

Introduction:

Aquatic animals have gone through countless adaptations over long periods of time to enable them to survive in their habitats. Sometimes an environment will change quickly and the animals that have adaptations to match this change will be the ones to survive. When an environment changes very slowly, animals can actually evolve and develop a new adaptation to match their slowly changing environment.

Explain that there are four main types of adaptation:

- Protective coloration and camouflage
- Body shape and form
- Mouth type and feeding behavior
- Reproduction behavior (where and how does it lay its eggs so that they will survive?)
- Students may introduce a unique adaptation they invent

Explain that survival of a species depends on its ability to eat, not get eaten and to reproduce and grow to adulthood.

Activity:

- Divide students into groups of 4
- Each group will share a laminated fish adaptation sheet
- Each student within the group will have a 'Fashion a Fish' sheet and colored pencils
- Each group will randomly choose an environment in which their fish is to live and survive
- Each student will fashion their own fish using the adaptations from the sheet
- Each student will fill out the fashion a fish sheet and then draw their fish in their environment
- They can give their fish a species name

Have students share their creation and how their chosen adaptations help their fish live and survive in their environment

Post-trip Information/Activities (to be done in class after trip)

- Have the students create an imaginative story involving the fish they created and how it lives in the given environment (W.4.3)
- Have students do an art activity to create the environment that their fish lives in and write a paragraph on the adaptations needed to survive there (W.4.1-2)