

#### **Grade Level**

 $1^{st} - 5^{th}$ 

#### **Objectives**

- \* To develop observational skills.
- \* To explore the different habitats in the estuary.
- \* To identify the different animals and plants found in the estuary.
- \* To be able to match estuarine animals and plants to their habitats.

# N.C. Standard Course of Study

Grade 1 (1.L.1.1)

Grade 4 (4.L.1.1)

<u>Grade 5</u> (5.L.2.1, 5.L.2.2, 5.L.3.1)

# Exploring the Estuary

#### Overview:

Exploring the Estuary is an activity designed to get students out into the estuary to explore the different coastal habitats by searching for common plants and animals found in those habitats. This activity is a scavenger hunt designed for younger children but can be adapted for use with teenagers and adults. Students will use simple observational skills to find various items commonly found in the estuary.

#### **Materials:**

- collecting bags
- scavenger lists
- field guides (optional)

#### **Background:**

A scavenger hunt is a fun way to get students to use their knowledge while exploring the estuary. Before beginning the hunt, make sure that everyone understands that no live animals or whole plants should be collected. Show your students the sea oats that grow along the dunes and ask them not to pick it or pull it up. Sea oats should be left alone because they play an important part in preventing dune erosion. Remind students that the estuary is home to many plants and animals and not to disrupt their habitat in the search for scavenger list items.



COASTAL RESERVE & NATIONAL ESTUARINE

#### **Activity:**

Select a small area that includes a variety of habitats such as beach, dunes and marsh. Either mark off the boundaries for the search or provide an adult for each group. Provide each team of two or three students with a scavenger list and a collecting bag. Inform the students how long the team will have for the hunt (20-30 minutes) and set them loose. When the time is up, blow a whistle and have each team show which items they've collected. A quick check will reveal the winning team. As you go through the items on the scavenger list, point out unique features of the plant or animal and discuss the role the organism plays in the associated habitat.

#### **Extension:**

- Make the scavenger hunt much more difficult by listing functions and having your students interpret the hints. For example:
  - 1. A shell from a snail that is a predator.
  - 2. Three items that use photosynthesis.
  - 3. A plant we commonly associate with water.
- Have students brainstorm in the classroom items found in the estuary and have them
  make the list of items to find.
- If cameras are available, have students take pictures of the items so they remain in their habitats.
- Can't go to an island? Try a web search of different estuarine habitats and use the lists of items to tell which habitat the item would be found in.

#### Vocabulary:

- beach
- camouflage
- dune

- egg case
- mammal
- marsh

- scavenger
- estuary
- habitat

#### References:

Gosner, K. L. 1978. <u>Atlantic Seashore</u>. Houghton Mifflin Company, Boston. 329 pgs. (ISBN: 0-618-00209-X)

Reid, G. K. 2001. Pond Life. St. Martin's Press, New York. 160 pgs. (ISBN: 1-58238-130-5)

Zim, Herbert S. and Ingle, Lester. 1989. <u>Seashore Life</u>. St. Martin's Press, New York. 160 pgs. (ISBN: 1-58238-149-6)

#### **National Science Standards:**

Content Standards Science as inquiry. [K-4]

Physical Science. [K-4]

Life Science. [K-4]

#### **Ocean Literacy Principles:**

Essential Principle #5 The ocean supports a great diversity of life and ecosystems.

(Fundamental Concept-i)

## **Scavenger Lists**

## **Plant List**

- A thick leaf
- A flower
- Seaweed
- A leaf with a strong smell
- A piece of a vine
- A seed
- A needle-like leaf
- A piece of grass
- A berry
- A segmented plant
- A cone
- A thorn

# **Animal List**

- Crab claw
- Scallop shell
- Egg case
- Bone
- Feather
- Oyster shell
- Sharks tooth
- Crab molt
- Whelk shell
- Marsh periwinkle shell
- Mud snail shell
- Ribbed mussel shell

# **General List**

- Something green
- Something black
- Something hard
- Something white
- A shell
- Something straight
- Something fuzzy
- A round object
- A piece of litter
- Something pretty
- Something camouflaged
- Something soft

The North Carolina National Estuarine Research Reserve is a cooperative program between the North Carolina Department of Environment and Natural Resources, Division of Coastal Management and the National Oceanic and Atmospheric Administration.



