

## WONDERFUL WETLANDS

**Overview:** In this activity, students will work in groups to categorize and name wetlands, using descriptions and a flow chart.

**Content Standards Correlations:** Science, p. 304 and History/Social Studies, p. 310

**Grades:** 3-6

### Key Concept

There are many types of wetlands, each with unique characteristics.

### Objectives

Students will be able to:

- name 2-3 wetland types
- name 2-3 characteristics of each type of wetland named.

### Materials

- copies of Wetland Flow Chart and Wetland Habitat cards on p. 118, 119, 120 (one for each group of two students, cut habitat cards apart.)
- pencils

### Time

40 minutes

### Answers

1. Forested Meadow
2. Wet Meadow
3. Sandy Beach
4. Salt Marsh
5. Mudflat
6. Shrub Wetland
7. Edges of Reservoirs, Lakes, Ponds, Rivers
8. Tidal Freshwater Marsh
9. Open Waters
10. Nontidal Salt Marsh

Adapted from "Wetland Habitats", p. 21, *WOW!: The Wonders Of Wetlands*, Environmental Concern Inc., 1991. The drawings on pp. 89 & 90 are used with permission.

## SUPPORTING INFORMATION FOR THIS ACTIVITY

- There are a variety of wetland types; wetlands are classified according to characteristics such as the amount and frequency of water, the type of water, and the type of plants most common in the wetland.
  - Wetlands are literally "wet lands," but an area does not always have to be wet to be considered a wetland. Many wetlands are only covered by water during a rainy spring season, others are regularly or infrequently flooded by tides, while others may be covered by water most or all of the time.
  - Some wetlands have salty water, while others are wetted by freshwater streams, rivers, ponds or lakes, or rainwater. Differences in the salinity of the water and the degree of wetness, as well as slope, elevation, and climate, cause different plant communities to develop in these areas.

## TEACHING METHOD

### Read

"Wetlands are 'wet lands.' Wetlands combine the characteristics of both water and land habitats. There are many different types of wetlands. Wetlands are classified according to the amount and frequency of water, the type of water, and the type of plants."

### Ask

**? Can you name some different types of wetlands?** (Generate a list on the board. Examples include: salt marshes, mangrove swamps, inland marshes and wet meadows or prairie potholes, edges of rivers, streams, and lakes, forested wetlands, shrub wetlands, etc.)

### Do

Divide the students into groups of two and give each group a copy of the flow chart and a copy of the wetland habitat cards (you can cut these apart in advance or have the students cut them apart).

### Read

"We are going to classify some wetlands according to their characteristics. Characteristics such as salinity, plant types, and tides will help us figure out the what kind of wetland each of our cards describe. We will use the flow chart to determine each wetland type. Let's do an example together."

**Do**

Choose one card to do together and have one student read the card aloud. Go through the flow chart with the class.

**Read**

“You can do the rest of your cards on your own. Write the name of the wetland type on the back of each card.”

**Do**

After the students are done, go over the cards with them (see the answer sheet in the margin).

**Ask**

**? Could you classify the wetland we visited on our field trip?** (Salt Marsh: all or part of the land is sometimes not covered with water; water is tidal; plants stick out of the water; water is salty.)

**Ideas for Writing and Speaking Topics for Language Arts Content Standards, p. 311**

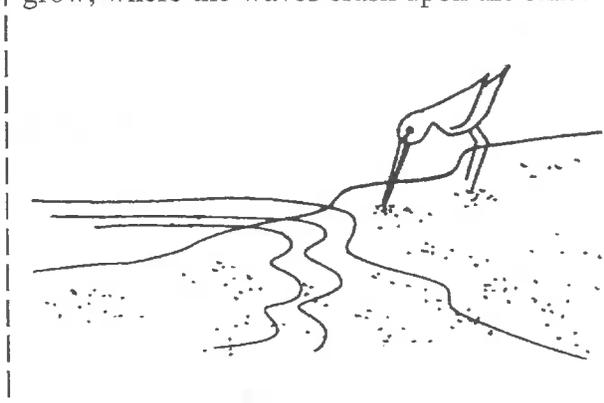
Students can explore:

- information about another kind of wetland and how it is similar to and different from the San Francisco Bay’s salt marshes.

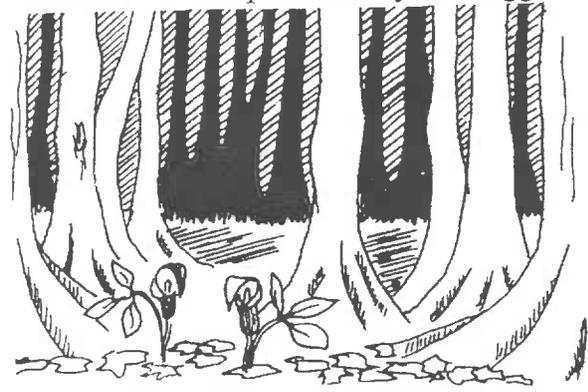
2. Rain or groundwater fills low spots in a field or meadow, creating this wetland. In the heat of the summer, the water will usually dry up. During migrations, ducks and geese stop in at these wetlands.



3. The tide goes in and out over the sandy surface. During low tide, shorebirds feed on animals that live in the sand. No plants grow, where the waves crash upon the sand.



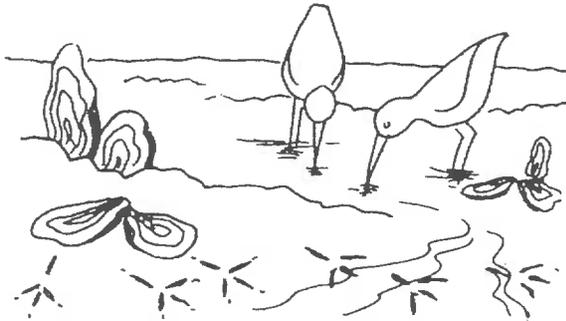
1. The ground holds water for part of the year and dries up for part of the year. Trees grow in this wetland, and in the spring, wildflowers bloom and frogs and salamanders find wet places to lay their eggs.



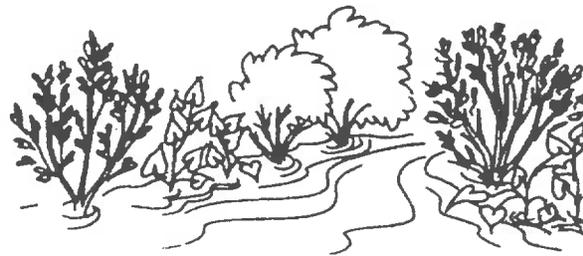
4. Tides move in and out, leaving areas uncovered during low tide. Plants, such as cordgrass and pickleweed, grow in the salty water. These wetlands form at the edges of bays and oceans.



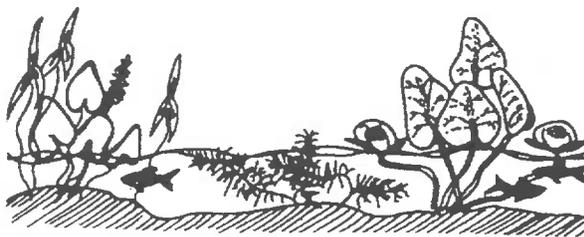
5. When the tide goes out, a muddy bottom is exposed. While this area may not look like a home to animals, and few plants grow here, there are lots of creatures in the mud. Shorebirds search for them with their beaks.



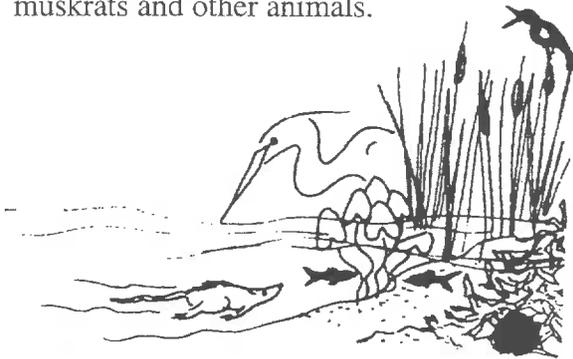
6. You might find this wetland where lakes, streams, rivers, or marshes overflow. They are not always covered with water and they are not tidal. Low-growing shrubs grow here and this wetland offers good habitat for fish, reptiles, amphibians, and many other animals.



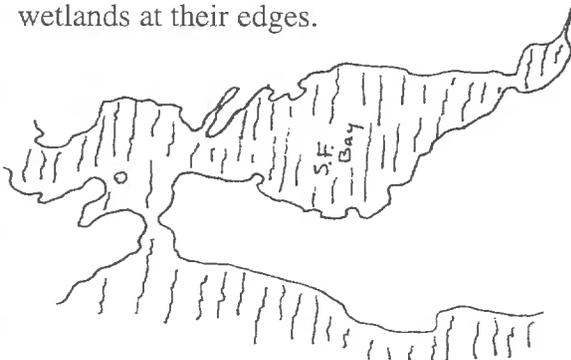
7. This wetland occurs along the shallow edges of bodies of water. The land is always covered with water. Plants grow in the water, providing food for ducks and other birds and a home for fish and other water animals.



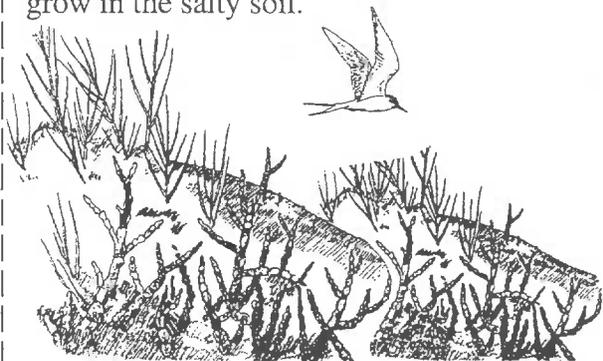
8. In this wetland, the tides push fresh water up rivers. The tides make the water level go up and down, so the ground is sometimes flooded and sometimes dry. Plants grow out of the water, providing food and shelter for muskrats and other animals.



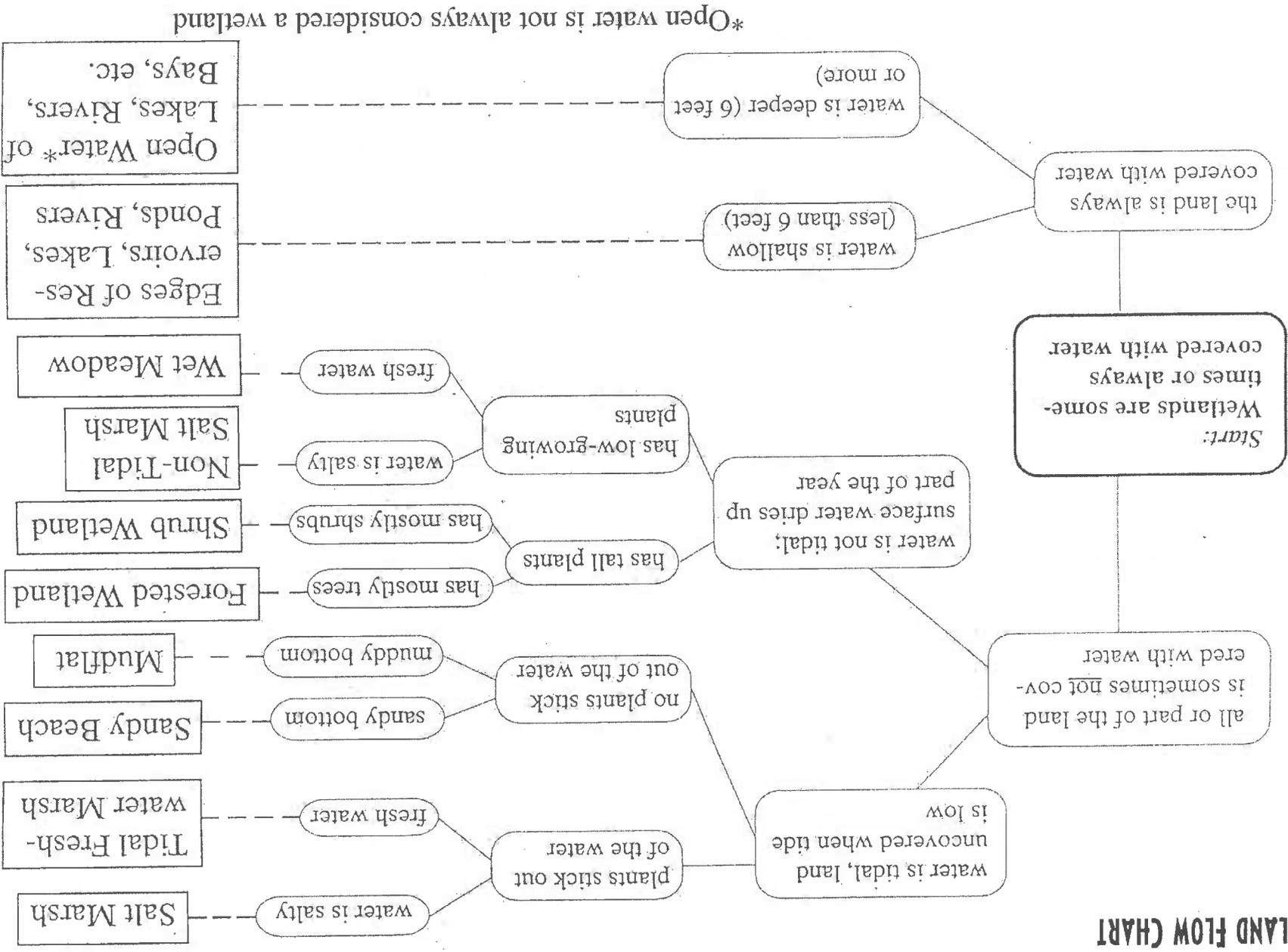
9. These areas are not always called wetlands. The land is always covered with deep water (6 feet or more). Examples include lakes, ponds, rivers, bays, and oceans. These bodies of water often have wetlands at their edges.



10. These areas are not always covered with water. Levees have cut this wetland off from the tide. During the summer and fall, the surface water dries up. Low-growing plants, such as pickleweed and salt grass, grow in the salty soil.



# WETLAND FLOW CHART



\*Open water is not always considered a wetland