



# **LESSON PLAN:** WASTE WARRIORS

#### Summary:

Students will learn the impacts humans have on the environment and what they can do to help.

**Grade Level:** K-5 **Subject:** Science, Art **Duration:** 1 hour





#### **Lesson Objectives**

Students can:

- $\checkmark$  Define pollution
- $\checkmark$  List environmental threats caused by humans
- $\checkmark$  Explain how everyone can reduce their impact on the environment

#### **Materials**

- Posterboard or Construction Paper
- Paint or Colored Pencils or Markers
- Scissors
- Glue

#### Vocabulary

**Conservation:** preservation, protection, or restoration of the natural environment and of wildlife

**Environment:** conditions that surround or influence an organism or community

**Pollution:** the introduction of harmful materials into the environment **Threat:** Something or someone likely to cause damage or danger

#### **Background Information**

All resources on our planet are shared by all living things. No matter the distance, something happening in one part of the world can have a devastating impact on another. Pollution, or the introduction of different forms of waste materials in our environment, has negative effects to the ecosystems we rely on. While some pollution does come from natural causes like forest fires, most are the result of human activity. The amount of pollution of the environment has increased with the rise in human population and development.

When discussing pollution, there are many different types that can be explored. While the major types of pollution are air, water, and soil, there are others such as light and noise pollution. Air pollution is the introduction of a substance into the air that has negative effects on the air quality. This can be caused from natural occurrences, like smoke from wildfires or the release of volcanic ash, or human-caused, like the burning of fossil fuels and exhaust from vehicles. Effects from air pollution include global warming, hazards to wildlife, depletion of the ozone layer, smog that can impact visibility, and respiratory issues in humans.



Water pollution occurs when toxic substances are introduced into water bodies like oceans, rivers, lakes, and ponds. Most often, these pollutants are spread from human activities, but can also occur from natural disasters. This type of pollution can have the most severe impact on the ecosystem. Sewage discharge, oil spills, and agricultural runoff are common causes of water pollution. This contamination can cause algal blooms, water-borne diseases in humans, and the disturbance of pH and salinity and loss of dissolved oxygen in water which impacts aquatic life.

Soil pollution, or land pollution, is the presence of toxic chemicals and pollutants in soil or on land. Sources of soil pollution include overuse of pesticides and fertilizers, improper disposal of waste from factories, garbage, and deforestation. This can result in loss of soil fertility, adverse effects on flora and fauna, groundwater pollution, and various illnesses in humans.

Although pollution is all around us, there are ways you can reduce the pollution you create at home. By planting trees, using renewable energy, decreasing our dependence on vehicles, properly disposing of waste, and recycling materials when we can, will help lessen the impact we have on the environment.

#### Preparation

Gather materials and make copies of worksheet for desired number of students.



#### Procedure

1. Ask your class what they know about pollution. Explain that pollution is the introduction of harmful materials into the environment.

2. Discuss different types of pollution that are common on our planet focusing on air, water, and soil. For older age groups, you can also discuss the causes and impacts of other types of pollution such as light and noise.

3. Pass out printable worksheets that are suitable for the age of your group. Pollution PSA can be done in groups or individually.

## **I SPY THREATS TO WILDLIFE!**

Color the picture below and circle items in the environment that can hurt wildlife.





## **Creative Writing**

Sit outside your school or home. Observe the different types of pollution you see around you. Draw a picture and/or write a paragraph using 5 complete sentences to explain the steps you would take to stop pollution in your area. How would you let people know they should do the same?



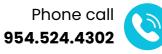
### **Pollution PSA**

Select one form of pollution you have learned about. Paint or draw a sign to show people the effects this pollution has on the environment and how they can help.



# **THANK YOU!**

For more downloadable resources and information on our current program offerings, please visit our website.



Email Address info@southfloridawildlifecenter.org



0

Website www.southfloridawildlifecenter.org

Office Address **3200 SW 4th Avenue** Fort Lauderdale, Florida 33315