

# Robots

## Preparation

**Objective:** Students will be able to create a one of a kind piece of art by building a robot from found objects/junk.

Students will be able to tell about their robot by creating a short write up (with parent help) including details of their robot: name, likes, dislikes, and drawing a picture of what their robot will look like.

**Students:** kindergarten students

**Classroom Management:** Sample artwork. Have materials ready:

- computer parts: shredded wire, memory, keys (from key boards), etc.
- glue dots
- double sided foam tape
- containers to separate parts
- tools: pliers, wire cutters, scissors
- soup cans – one per student (robot body)
- various parts (sorted by size)
  - Examples might be: clean nails, screws, washers, nuts, bolts, rivets, buttons, coins, jewelry.

## Introduction

**Set:** Talk to students about geometric shapes. Ask students what shapes they can see in their classroom.

**Communication of Purpose:** Students will be shown various images of robots. They should look at the details of the robots in the pictures so that they can design and build their own robots.

### Questions to ask:

1. What are robots?
2. What are they made of?
3. Have you ever seen a robot up close and personal?
4. What kinds of shapes do you see in robots?
5. How do they move? What do they do?
6. Can you think of anything that you have in your house that is made to help you and your family? (vacuum, dishwasher, clothes washer and dryer, blender, toaster etc...)

If you could build your own robot, what materials would you use; what would your robot do; does it talk; how does it move; does it eat; what does it eat; what kinds of jobs does it do?

## Body of the Lesson

**Presentation:** Provide the students with instruction on building their robots. Give them the rules and procedures for this art project. They will each be expected to produce one piece of art.

Hand out paper and have them put their names on the top. Ask students to be sure to name their robots.

**Processing:** Students will complete their robot design and write-up, naming and describing their robots characteristics (likes, dislikes, talents, etc.).

**Monitoring:** Circulate and watch for students that need additional help. Be complementary.

### **Closing**

**Closure:** Students will be able to share their robots with the class. Have the students put their art in a designated area and help clean up their table area. Tell students that their robots will be on display at the science fair on March 26<sup>th</sup> and that they will be able to take their robots home after the fair.

**Note:** Prior to this lesson, students should be able to identify, name and find basic geometric shapes in their surroundings.

### **Sources:**

<http://useyourcolouredpencils.blogspot.com/2011/01/robot-junk-sculptures.html>

<http://www.incredibleart.org/lessons/elem/Julie-Robots.htm>

<http://spoonful.com/crafts/can-do-robots>