

## **Paper Mache Earth**

### **Objective:**

To create a globe out of paper mache. This activity helps students realize the proportions of water and land on the earth.

### **Background Information:**

This activity spans two 1-hour lesson plans. After making the globes, the paper mache will need to dry for 3 days before it may be painted. This activity is messy. It is best to have a couple of volunteers on hand to help make the paper mache earths. Students will be putting strips of newspaper on a balloon to make their model of the Earth, and it will be necessary to work with partners for the efficiency of this project. Choose partners ahead of time. It is best to conduct this activity in the lunchroom or any other room lacking carpet. This lesson plan was revised from an activity found at <http://www.planetpals.com/pdfimages/papermacheearth.pdf>.

## **DAY 1**

### **Materials:**

Newspaper

Flour

Water

1 Bucket to hold paper mache mixture for each group of two

1 Balloon per person

1 Plastic cup per person

1 Globe

### **Preparation:**

1. Using a paper cutter, cut newspaper into small strips of approximate dimensions 1 inch by 2 inches. Cut enough strips so that each balloon may be fully covered with strips.
2. Mix three parts flour to one part water in a container. Repeat so that each group of two has their own container to use.
3. Cover the work surface with newspaper.
4. Put 1 clear plastic cup where each student will sit. Place strips of newspaper and containers of flour and water appropriately.
5. Blow up balloons. Place in large plastic bag.

### **Procedure:**

1. Ask the students to guess how much of the earth's surface is covered with water and how much is covered with land.
2. Show the students a globe.

3. Repeat the question. Students may have changed their answers after seeing the globe. After the students have made their guesses, tell students that the earth's surface is covered 75% by ocean and 25% by land.
4. Inform students that they are going to make a globe of the earth out of paper mache today.
5. Take students to cafeteria. Assign students into groups of two.
6. Ask each student to sit by a plastic cup.
7. Pass out one balloon to each group of two.
8. Instruct that one person is going to hold the balloon while the other person puts the newspaper strips covered with paper mache on the balloon. Do a demonstration on the proper way to apply paper mache:
  - Dip a strip of newspaper in the flour and water mixture
  - Wipe off excess flour and water from the strip.
  - Apply the strips to balloon so that the strips overlap with each other.
9. Instruct students to cover their balloon with newspaper and paper mache as you just demonstrated.
10. Once the balloon is covered with paper mache, set the balloon on the plastic cup to dry.
11. Give each group of two another balloon. Have the student who held the balloon last time switch places with the student who applied the strips of newspaper on the previous balloon.

**DAY 2—This activity should be done at least two days after day 1. You may need to patch up some holes in the globes ahead of time. It is best to do this a couple of days before day 2 so that the patched areas have a chance to dry.**

**Materials:**

Paint (blue, green, yellow, black, white, and red)  
1 paint brush for each student  
1 plastic plate for each student (functions as an easel)  
1 permanent marker  
Paper mache globes from previous activity  
Cups from previous activity  
1 new cup for every 2 students  
Newspaper  
1 globe

**Preparation:**

1. Patch up any holes in the paper mache globes at least 2 days before painting the globes.
2. Depending on the age of your students, you may want to use a permanent marker to draw the outline of the continents on the globe.
3. On the day you decide to paint the globes, cover the tables with newspaper.
4. Set up a work station for each student that consists of the following:
  - 1 paint brush
  - 1 globe standing on the cup

- 1 plastic plate
5. Fill a cup with water for every two people to rinse their paintbrushes out with.

**Procedure:**

1. Inform the students that the globes are now ready to be painted. Again show the students a real globe to help them see where the continents are.
2. Pass out the globes and cups.
3. Demonstrate how to paint the globe. Keep the globe sitting on the cup, use one hand to hold the globe for added support and use the other hand to paint.
4. Distribute the paint. Start by giving each child two colors of paint to use, then allow them to use more colors if they wish.
5. Put the globes in a safe place to dry.

**Source:**

<http://www.planetpals.com/pdfimages/papermacheearth.pdf>