

Title: Water We Doing Here?

Objectives:

- To discuss how water is used every day. (TEKS 5.1B)
- To brainstorm how water can be saved every day. (TEKS 5.1B)

Grades: 4-8

Vocabulary: conservation, freshwater

Materials:

- Thin kitchen sponges cut into approximately 2 x 3 squares (one per student)
- Medium-sized plastic bowl with a lid large enough for all of the sponges to fit easily with water
- Water

Preparation Procedure:

1. Calibrate how much water is needed in the bowl by filling the empty bowl approximately $\frac{1}{2}$ to $\frac{3}{4}$ full and mark the water line with a water-based pen.
2. Carefully add sponges, squeezing them so that the water is absorbed. If there is not enough water, add more in measured amounts (by the cup) until all of the sponges are full. It is all right if there is water left over in the bowl.
3. When finished, pour out all of the sponges.
4. Mark the water line with a permanent marker. This is the water line to be used for this activity in the future.
5. Squeeze out the sponges and allow to dry. The sponges can now be stored in the bowl.

Class Procedure:

1. Discuss the amount of freshwater available to us on earth with students.
2. Although the surface of the earth is approximately 72% water, only 2% of that is freshwater. Of that 2%, only a fraction of that is available to us for use.
3. Fill the bowl to the waterline and explain that this represents all of the water we have for daily use.
4. Give each student a sponge.
5. Walk around the room with the bowl, asking each student to place the sponge in the water and tell how he/she used water today. If you have a large classroom, you might extend the use period to “this week” or “this weekend”.

6. Discuss that all of the available resources have been “absorbed: by each of us using water.
7. Now walk around the class and have each student take out one sponge and tell how he/she has (or could have) saved water.
8. Each student squeezes out all of the water in the sponge into the bowl with each answer. There should be no identical answers.
9. With all of the sponges out of the bowl, the water should be a little murky and lower than the original water line.
10. Discuss how even when we are careful to conserve water and clean the water we use, the water is not completely clean. We still do not return all of the water back to its original levels.

Assessment: Have the students create a diagram matching up wasteful water usage problems and their solutions.

Reference: <http://www.4empowerment.com/en/curricula/science/>