It Floats!

In class, the children have explored objects that sink or float. Do this activity with your child to make further discoveries.

WHAT YOU NEED:

- chunk of clay
- tub or sink filled with water
- paper clips

WHAT TO DO:

1. Divide the chunk of clay into two pieces, approximately the same size. Make one piece into a solid ball and the other piece into a bowl shape.



- 2. Ask your child to predict whether the ball-shaped or the bowl-shaped object will sink or float when placed in the water.
- 3. Using this chart, or one similar to it, draw what you think will happen.

- 4. Have your child place one object at a time into the tub to test his/her ideas.
- 5. Use your chart to record what happened to the clay object.
- 6. Talk about what happened. Ask:
 - Which object sank?
 - Which object floated?
 - Is this what you thought would happen?

Object	Draw what you think will happen	Draw what did happen
Clay ball		
Clay boat		

SUMMARY: Changing the shape of an object affects whether it will sink or float.

EXTENSIONS:

Further Investigations:

- Make the ball of clay into a different shape. Use the paper clips to find out which shape will carry the heavier load.
- Reshape the clay. This time make a snake-like coil and a flat circle like a pancake. Observe what happens when you put them each into a tub of water. Is it what you thought would happen?
- Make these shapes with aluminum foil: ball, bowl, snake, pancake.
- Tell if you think each shape will sink or float. Try it.

Related Excursion:

Brooklyn Children's Museum 145 Brooklyn Avenue Brooklyn, New York 11213 718-735-4432

Literary Connections:

- Allen, Pamela. *Who Sank the Boat?* Eco-Clad Books, 1999.
- Holling, Clancy. Paddle to the Sea. Houghton
- Mifflin Co., 1941, 1969.
- Jennings, Terry. *Floating and Sinking*. Gloucester Press, 1988.
- Richards, Jon. *Science Factory: Water & Boats.* Copper Beech Books, 1999.
- Taylor, Barbara. *Sink or Swim! The Science of Water.* Random House, 1991.
- Trumbauer, Lisa. Sink or Float. Newbridge Communications Inc., 1997.

Related Web Sites:

http://www.eecs.umich.edu/~coalitn/sciedoutreach/ funexperiments/agesubject/lessons/beakman/float.html

http://www.vermontbook.org/mg/sink.html

http://www.ipfw.edu/educ/e328jn/wplesson/start.html