## **Everybody Lives Downstream**

**Background:** In class we have been learning about the interrelationships between communities. We share the same resources. Columbus, Ohio is downstream from several cities, and by the same token, many cities south of Columbus share the waters of the Olentangy and Scioto Rivers. That water is also shared by farms, state parks, and manufacturers.

- I. How do the communities and events upstream influence where you live?
- II. Materials

brown butcher paper dice monopoly homes plastic animals "buildings and factories" Map of Central Ohio including rivers and dams.

(Prior to the lab, the teacher takes table-sized butcher block paper and divides it into a grid using a meter stick and markers. The "Land" has a river and tributaries running through it. The grid should be 6 X 6 to match the dots on dice.)

## III. Procedures

- 1. Students roll the dice to determine who goes first. The highest roller gets to choose where to build their home. The procedure works best if there are mountains and a variety of options.
- 2. Students record how they feel about their neighborhood in general and their own home in particular.
- 3. Students should roll again to determine the value of their properties. For example, a six and a four can be \$64,000.
- 4. After each student has "built" their home, the teacher goes through and chooses a spot on each table to do one of the following: set aside a state park, build an amusement park, put in a sewage treatment plant, build a pig farm, or other facilities. The teacher should announce what will be going into the neighborhood.
- 5. The site is chosen by rolling the dice and picking the point on the grid matches the roll, like over 4 and down 3. The students can discuss how they feel about the change and whether or not they want it to be upstream or downstream of them.
- 6. Once the addition has been made, students will discuss the impact on their properties and whether they would like to move to a new property.

## IV. Conclusions

- Are there areas of Central Ohio where the properties have greater value than others?
  Where are they?
- 2. In what direction do the rivers flow in Central Ohio? Grandview 'Heights' and 'Upper' Arlington are actually at higher elevations than Downtown Columbus. What does that mean for the flow of water?
- 3. Why do we treat water before and AFTER it leaves our homes?