

# Pollution Experiments

## Experiment I

This experiment must be conducted on a wet day.

### Supplies:

- Large funnel
- White paper coffee filter
- Beaker or glass jar
- Microscope (optional)

**Directions:** Line a large funnel with a white coffee filter. Place the funnel in a jar and put the funnel outside during rain. Check the paper filter after the rain. If possible, look at it through a microscope.

## Experiment II

This experiment must be conducted on a dry day.

### Supplies:

- Petroleum jelly
- Three white index cards numbered 1, 2 and 3
- One clip board
- Plastic knife

**Directions:** Spread petroleum jelly on each index card with a plastic knife. Attach one card to the clipboard and place outside. Place one card in the classroom under the teacher's desk. Place one card near an air vent in the classroom. After a day or two, compare the cards to see how much pollution has been trapped in the petroleum jelly in the different locations (cards 1, 2 and 3).



### Experiment III

This experiment must be conducted on a sunny day.

#### Supplies:

- Two small thermometers
- One resealable plastic bag

**Directions:** Place one thermometer in the plastic bag, fill the bag with air and seal the bag. Record the temperature on both thermometers. Place both thermometers in a sunny window. Record the temperatures again after five minutes.

### Experiment IV

#### Supplies:

- Two small beakers or glass jars
- Acid (white vinegar)
- Eight plant leaves with stem
- Self-stick labels

**Directions:** Label one jar "water" and fill it with plain tap water. Label the second jar "acid water" and fill it with half vinegar and half tap water. Dip four leaves completely in each of the jars and then stand four leaves in each jar, stem in the liquids. Observe the leaves for a few days and record your observations.

### Experiment V

#### Supplies:

- Two beakers or glass jars
- Acid (white vinegar)
- Two pieces of chalk
- Self-stick labels

**Directions:** Label one jar "acid" and fill it with vinegar. Label the second "water" and fill it with tap water. Place a piece of chalk in each jar. Observe the chalk for several days and record your observations.



## Experiment VI

### Supplies:

- Two small jars
- Salt and tap water
- Measuring spoons
- Eight plant leaves with stem
- Self-stick labels

**Directions:** Label one beaker or jar “water” and fill it with plain tap water. Label the second beaker or jar “salt water.” Fill it with tap water, add four tablespoons of salt and stir it until dissolved. Dip the four leaves completely in each of the jars and then stand the four leaves in their jar, stems in the liquids. Observe the leaves for a few days and record your observations.

## Experiment VII

### Supplies:

- Two stalks of celery
- Two beakers or small jars
- Red food coloring
- Water

**Directions:** Fill each jar half full of water. Put several drops of red food coloring in one jar. Make a fresh cut on the bottom of each stalk of celery. Place one stalk of celery in each jar. Observe the celery for a few days and record your observations.

