

## Through the Eyes of a Fly

**Skill:** Discuss how compound eyes help flies survive. Create a model of an insect's compound eye.

**Estimated Lesson Time:** 45 minutes

### Teacher Preparation:

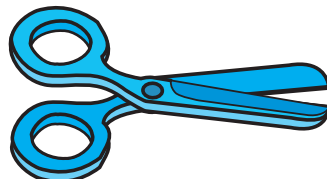
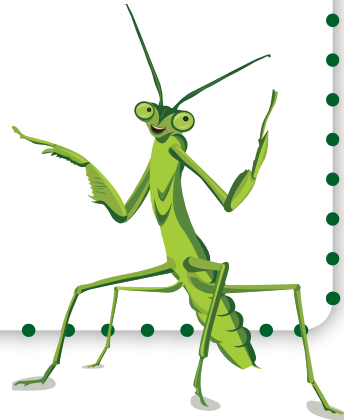
Gather the supplies for the experiment.

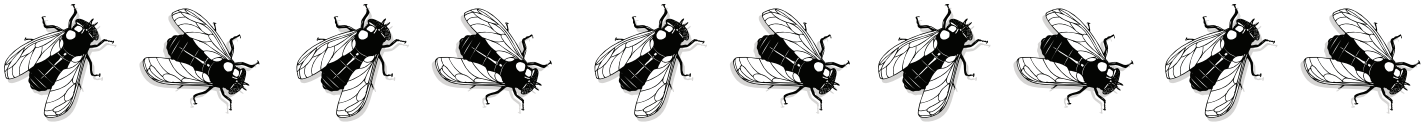
#### Materials for each group:

- sanitized egg carton
- paper bowl
- sheet of bubble wrap
- glue
- tape
- scissors

#### Materials for each student:

- 1 science notebook





## “Through the Eyes of a Fly” Lesson

1. Ask your students if they have ever wondered why it is difficult to catch a fly. Explain that besides being able to fly through the air at speeds over 50 mph, flies have unusual eyesight! Many insects have compound eyes that consist of thousands of six-sided lenses. These lenses don't provide clear vision, but they can detect the slightest movement. The large compound eyes allow the fly to see all around and even behind it. Ask
  - How do compound eyes help a fly survive? Explain your answer. (*Compound eyes help a fly see small movements. A fly can protect itself from danger.*)
  - Compare the compound eyes of a fly to the eyes of a human. How are they the same? How are they different? (*A human eye has only one lens. A fly's eye has thousands of lenses. Human eyes provide clear vision. A fly's eyes do not.*)
2. Now that students have discussed the overall function of a compound eye, divide the class into groups of four to create their own compound eye models.
3. Provide each group with the materials listed.
4. Instruct each group to cut the egg carton into 12 individual cups. Then invert the paper bowl and tape or glue the egg cups to the bottom.
5. Instruct the group to cut the bubble wrap into 12 hexagons so it represents the lenses and glue one lens to the bottom of each cup.
6. Once each group has completed its compound eye model, ask each child to answer the following questions in his science notebook:
  - What have you learned about compound eyes?
  - How do compound eyes help insects survive?
  - What other body structures assist an insect with its survival?

