Pollinators

Takeaway: Bugs are important because they pollinate plants and allow them to create fruit.

Materials:

Whiteboard and marker

Bee Collecting Pollen visual aid

Cut flowers (or live if available)

Rope

14 (or more) small bowls or cups

7 (or more) packs of different-colored mini pompoms

1 pack of medium pompoms

Construction paper

Kid-safe scissors

Glue

Pipe cleaners

Small round candies (M&Ms or Skittles)

Small paintbrushes (optional)

Optional extension

Modelling clay in pieces (enough for 2 pieces per kid)

Plastic bags (1 per kid)

Sharpie

Part 1: What are pollinators?

- 1. Have the kids introduce themselves and tell you their favorite bugs. Write them on the board. Star next to the ones that are pollinators.
- 2. Explain that you've starred the pollinators. Ask the kids:
 - a. What are pollinators?
 - i. Pollinators are insects or animals that transfer pollen between plants.
 - b. Why are pollinators important?
 - i. Plants need pollen from another plant in order to create seeds and fruit.
 - c. Why do pollinators pollinate plants?
 - i. Most pollinators are looking for food, such as the nectar that plants produce. They actually pick up and move pollen by accident! (Use the Pollinators images for a visual aid).

3. Give each kid a flower. Explain where nectar is produced (can be different places depending on the flower, but usually in the center). Ask if they can find where the pollen is made (the anther) and where the pollen is dropped off (the pistil – tell them to look for something slightly raised that an insect going to get nectar would have to rub against).

Part 2: Let's Be Bees

- 1. Ahead of time, set up your "garden" area by arranging a rope around a large patch of grass. Fill small cups or bowls with mini pompoms, one color per container. Fill other cups or bowls with M&Ms or Skittles.
- 2. Split kids up into two groups (or ask them to split themselves up) one will be bees and one will be flowers. Have kids make headbands using construction paper and pipe cleaners to show whether they are a bee or a flower.
- 3. Give each flower a small bowl of pompoms and a small bowl of candy. (They do not get to eat it.) Explain that the pompoms are like pollen that they, as a flower, have produced, and the candy is like the sweet nectar that they have produced. Have them spread out around the "garden" area holding their bowls.
- 4. Give each bee a full-size pompom. Tell them that this is like the furry butt of a bee that rubs up against the anthers and collects pollen. Dunk a full-size pompom in a cup of mini pompoms to demonstrate how the smaller pompoms cling to it. Explain that they are hungry bees looking for sweet nectar, and will travel around the garden looking for flowers. When they reach a flower, they will take one drop of nectar (piece of candy) from their candy bowl. Then they'll roll their pompom around in the pompom bowl collecting pollen. Then they'll move on to the next flower. They can't return to a flower they've already been to until they've gone to all the other flowers first.
- 5. Have the bees collect pollen. Call them back once all the bees have made a round of the flowers. If you wish, you can have flowers and bees swap and repeat the exercise. (If you don't, let the flowers have some candy).
- 6. When all the kids are back, ask the bees to count how many different colors of "pollen" are on their pompom. Ask the flowers to count how many different colors of "pollen" are in their bowls. Ask the kids what happens when different colors mix together? (Pollination happens, and a fruit or vegetable starts to grow!)

Part 3: Pollination in Practice

- 1. Remind the kids of how you looked at real flowers earlier and saw where the pollen is produced and collected.
- 2. Explain that they are now going to be the pollinators! Ask the kids to look around the area and find some flowers. Show them how to rub their finger (or a small paintbrush) gently against the anther and then against the pistil of another flower to pollinate it. Remind them that flowers can only pollinate other flowers of the same type.

Optional lesson extension: Building Bugs

Give each kid a couple of pieces of modelling clay. Tell them to create their own pollinator and give them a name. Allow them to observe the Pollinator visual aids as a guide. As the children finish, place their creations in bags and label them with their name and the pollinator's name.