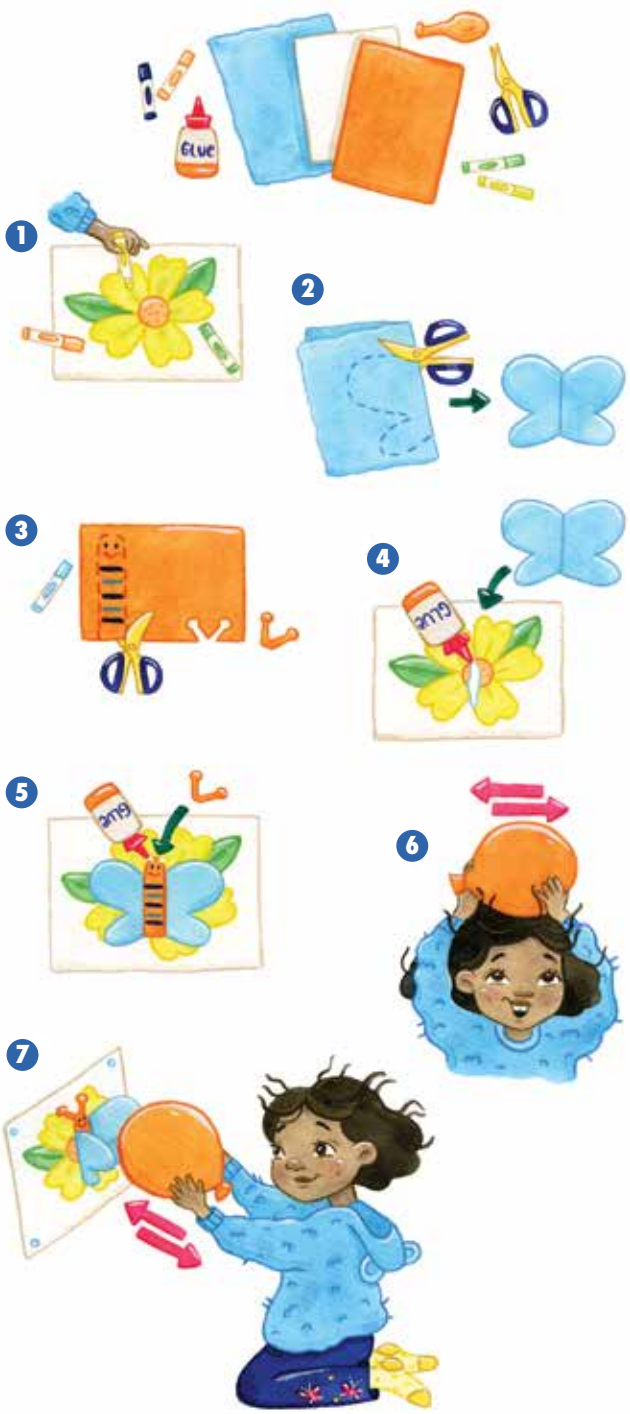
Super Static Electricity Butterfly

WHEN AN ELECTRICAL charge builds up on something's surface, that is called static electricity. Winter is the perfect time to experiment with static electricity because charges build up more easily when the air is dry. Maybe that's why January 9 is National Static Electricity Day!



What You'll Need:

markers
cardstock
scissors
tissue paper
construction paper
school glue
balloon

What to Do:

1. Use markers to decorate the cardstock with a background for your butterfly. You can draw something realistic, like a flower, or something imaginary, like the tip of a unicorn's horn.

2. Cut butterfly wings out of the tissue paper.

3. Cut a butterfly body and antennae out of the construction paper. If you want, use markers to decorate the body.

4. Put a long, thin line of glue on the cardstock where you want the butterfly to go. Place the center of the wings along the line of glue. Do not glue any other part of the wings to the cardstock.

5. Glue the body onto the center of the wings. Then glue the antennae at the top of the body. Let dry.

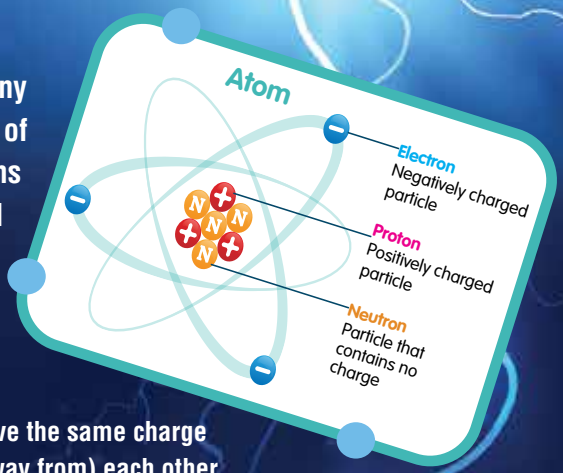
6. Hang your butterfly on the wall or refrigerator. Blow up the balloon, and tie it shut. Then rub the inflated balloon on your hair or the carpet to build up a static charge.

7. Slowly move the balloon in and out, just in front of the butterfly's wings. Watch the wings flap. When your butterfly's wings stop flapping, it's time to charge up your balloon again.

by Leah Kessler
Art by Amy Knill

Why It Works:

Everything in the universe is made of tiny particles that are too small to see. Some of these particles are called protons. Protons have a positive charge. Others are called electrons. Electrons have a negative charge.

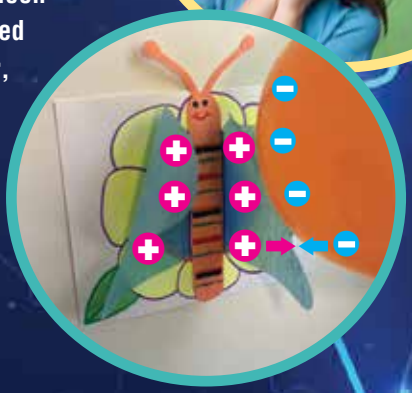


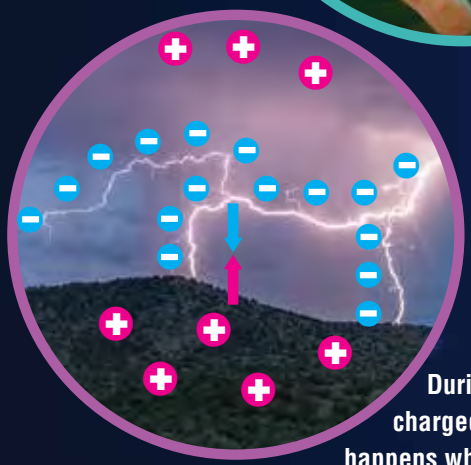
Things that have the same charge repel (move away from) each other.

Positive and negative charges attract (move toward) each other.

When you rub the balloon on your hair or carpet, it picks up extra electrons.

The negatively charged balloon attracts the positively charged protons in the tissue paper, pulling the butterfly's wings toward the balloon.





During thunderstorms, clouds can become charged with static electricity. Lightning happens when the charge jumps inside or between clouds or down to something on the ground.

When you touch a doorknob and get a shock, you're feeling a tiny static charge jump between your finger and the knob.

Where else can you experience the power of static electricity?

by Leah Kessler