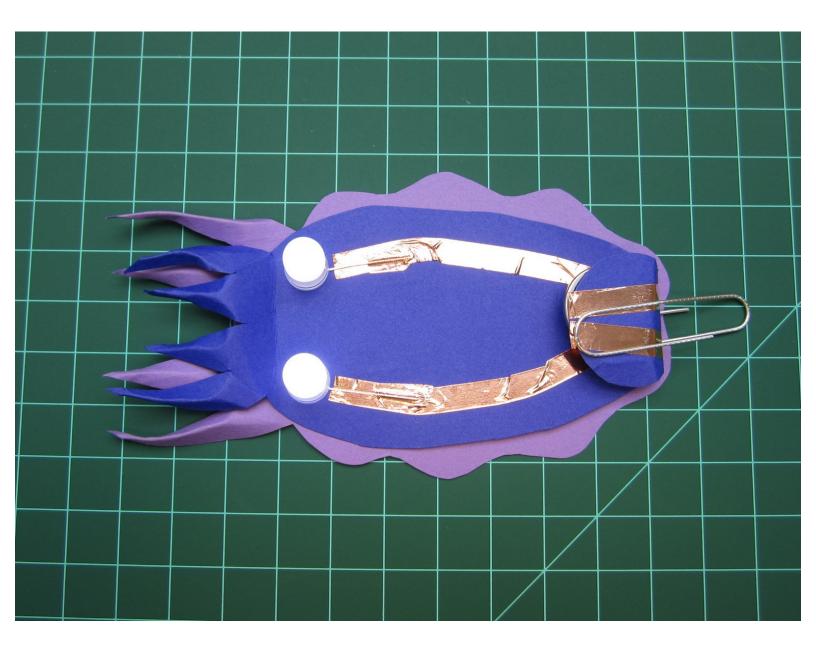


Cephalopod

Create your very own paper craft squid of cuttlefish using conductive tape and LEDs.

Written By: Joshua



INTRODUCTION

This squid won't ink you, but it will light up and change colors for you if you're nice. Creating it is simple and requires only the most basic parts. Follow our video guide, download our PDF template, or follow this guide.



TOOLS:

- Scissors (1)
- Clear Tape (1)

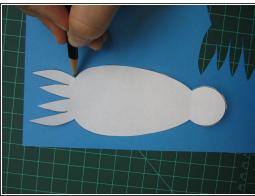


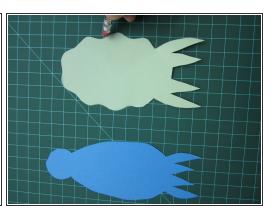
PARTS:

Paper Circuits Kit (1)

Step 1 — Cut Out the Body

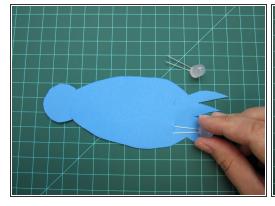


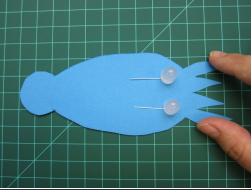


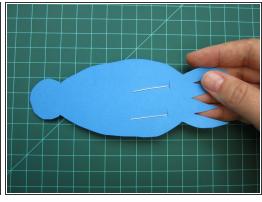


- Print off the template, trace it, and cut out your squid body parts.
- If you plan on freehand cutting your body, be sure to read all the directions first. Pay special attention to how we create the battery holder.

Step 2 — Add the LEDs

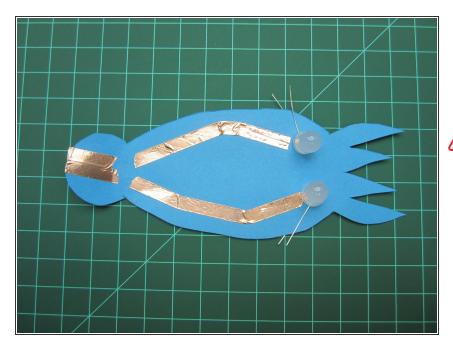






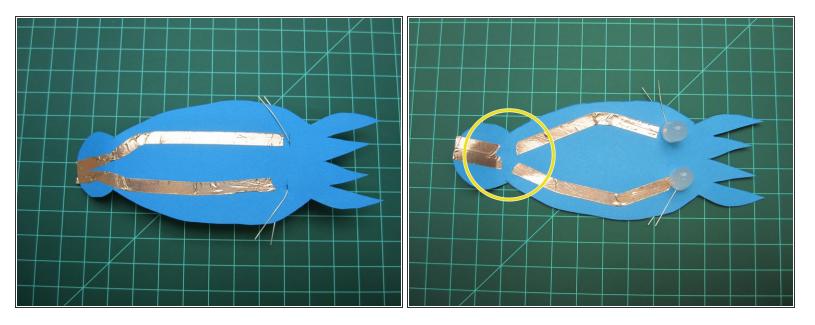
- i The long leg of an LED is Positive, and the short leg is Negative. For this project the Positive legs go on the bottom, and the Negative legs go on the top.
- Bend both LED legs 90 degrees.
- Stick the long Positive legs through the paper. It may help to cut a small slit in the paper.

Step 3 — Add the Negative Tape



- Run two pieces of tape along the top of your project.
- Stop right next to the ball at the end.
- The two top pieces can touch, though the should NOT touch the tape from the backside.

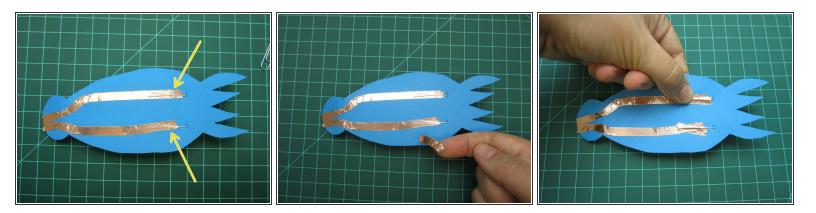
Step 4 — Add the Positive Tape



Run lines of tape from the Positive LED legs back round to the front.

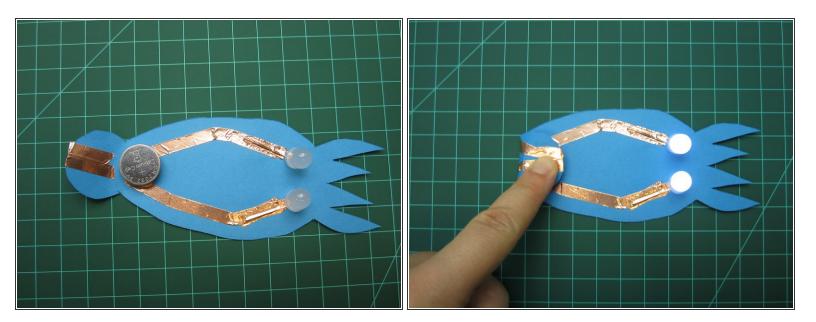
♠ Do not connect the Positive and Negative tape lines.

Step 5 — Tape Down LED Legs



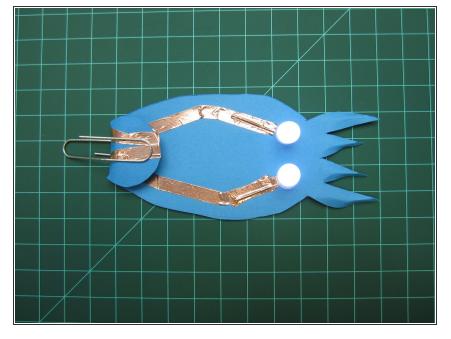
- Position your LED legs over each of the lines of tape.
- Use a small piece of Conductive Tape to tape down each of the legs.
- Do this to all four LED legs.

Step 6 — Test with a Battery



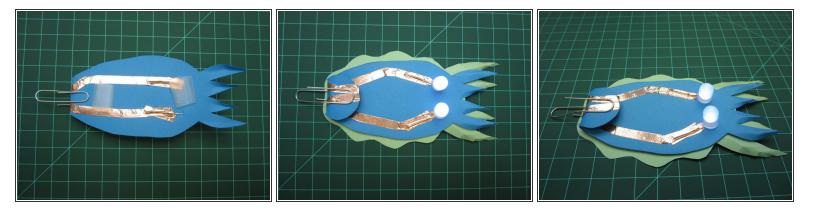
- Place a battery so that bottom (Negative) side is over the two Negative lines of tape. (Top side)
- Fold down the bulb on the back so that the two Positive lines of tape make contact with the top of the battery.
- Both LEDs should turn on.
- (i) When in doubt, flip the battery over and try again. This solves 90% of all building errors.

Step 7 — Add a Binder or Paper Clip



- Use a binder clip or paper clip to hold the battery holder together.
- To "Turn Off" the project, just remove the clip.

Step 8 — Combine the Body



- Roll up some clear tape and stick it to the bottom of your squid.
- Attach the other half of the body.
- (i) Make the arms looks 3D by folding them up along the center of each arm.