Seaside Crafts at Home!
Create a Purple Sea Urchin's Aristotle's Lantern

Materials:

- One paper plate
- Aristotle's lantern template
- Scissors
- Five purple pipe cleaners
- One plastic fork
- Purple paint (acrylic works best)
- Liquid glue
- Glue stick
- A dark-colored marker

This craft creates a purple sea urchin's Aristotle's lantern. The Aristotle's lantern is the name of the urchin's dental structure located on the underside of the urchin. Its five “teeth” scrape algae and other food off of rocks. The Aristotle's lantern got its name when over 2,000 years ago, philosopher and natural scientist, Aristotle, described the mouthparts of an urchin in a natural science textbook. He said, “[it's]like a horn lantern with the panes of horn left out.” In Aristotle’s time, horn lanterns were lanterns with thin pieces of horn on each of the five sides of the lantern. The horn protected the candle from blowing out. See image to the right of a real Aristotle's lantern.
Step 1: Dot paint around the plate, then spread it outwards with the fork. This will create the urchin’s spines. Avoid painting the center of the plate, because it will get covered up in step 3. Leave paint to dry.

Step 2: Print the Aristotle’s lantern template and cut along the dotted lines of pentagon A. This will leave you with five triangles with rectangular bottoms. Fold along the solid line on each triangle piece. Next, cut out pentagon B.

Step 3: Once the purple paint is dry, use a glue stick to glue pentagon B in the middle of the plate with the ‘B’ facing downwards.

Step 4: Using the glue stick, glue one of the five triangles with folded rectangular bottoms to one of the edges of pentagon B. The triangle point
should be facing inwards. Repeat this for all triangle pieces.

**Step 5:** Color under the triangle flaps using a dark-colored marker.

The urchin's Aristotle's lantern is complete! See images below for more photos of what a real Aristotle's lantern looks like.

**Step 6:** Cut the purple pipe cleaners into three- to four-inch pieces. These will be the urchin's tube feet. Urchins use their spines and tube feet to move slowly over hard surfaces.
Step 7: Twist a small spiral on one end of each cut pipe cleaner.

Step 8: Using liquid glue, attach the pipe cleaners around the plate with the twisted end facing outwards. **Tip:** Put a dot of glue at the base of the Aristotle's lantern and roll the end of the pipe cleaner into it to help it stick. This will also allow the tube feet to move in different directions, just like a real urchin!

The purple sea urchin is complete!