

# LIGHT UP THE SKY

*Chart a course for the stars*

Not all treasure maps are found on paper or parchment. Sometimes the path is shown through other means, be it the wind, current or the stars above. Astronomers have been studying the sky and stars for thousands of years. By using math, chemistry and physics, these scientists charted the vastness of space, cataloging hundreds of galaxies and constellations. These findings were crucial for sailors and pirates, aiding them on their journeys at sea before the modern day comforts of GPS and navigation apps.

As a brilliant astronomer, Carina uses her talents to assist Captain Jack Sparrow and Henry on their journey, using her chronometer to measure time in order to navigate the high seas. As a horologist, or scientist who studies time, she is able to find the exact latitude and longitude of the Black Pearl without a map or compass to guide the way. Without her knowledge and experience, any hope to find the Trident of Poseidon would be lost.

It is no coincidence that Carina shares her name with the brightest star in the northern sky. The Carina constellation is one of many clusters of stars that have guided pirates along their treacherous voyages. Pirates not only had to be masters of their ships and crew, but as navigators of the ocean, it was necessary to have a knowledge of nature and the stars in order to reach their destination.

Just like Carina, you must also become an expert of the night sky to truly be a pirate of high esteem. Find time with your family and friends to explore the stars together, especially on a clear night when the stars are at their brightest. Before you step outdoors, head onward to the next page where you can create a star wheel that will help you become familiar with some of the most easily recognizable constellations in the sky.

**CARINA**  
Carina shares her name with the brightest star in the northern sky.

## STUDY THE STARS

Astronomers have been studying the night sky for thousands of years, informing our understanding of weather, tides, time, technology and the earth. Explore this ancient craft by creating a star wheel.

Follow the directions and remember to add your own constellation in the empty space!

- 1) Cut along the dotted line.
- 2) Use a pencil to poke a hole in each white circle.
- 3) Turn off the lights and hold your wheel up towards the ceiling.
- 4) Shine a flashlight a few inches away from your wheel.
- 5) Look for each constellation on the ceiling!

