

## **GREAT SPACE**CHALLENGE

Do you love looking at the stars and exploring the world around you? From July 10 to August 31, 2020, you can participate in the Great Space Challenge. All you need to do is observe and learn about the night sky in the great outdoors or from the comfort of your homes — telescopes aren't necessary, just curiosity!

Based on your grade level, complete the required number of activities to be eligible for the new "Discover Space" patch.

- Daisies, Brownies, and Juniors (grades K-5): Complete one from each category
- Ocadettes, Seniors, and Ambassador (grades 6-12): Complete two from each category



Explore space resources.

- Participate in an online Space Science badge activity or astronomy event.
- Watch the Mars Perseverance launch.
- · Spend time exploring NASA.gov.
- Try an interactive experience, such as <u>NASA Eyes On</u>, <u>NASA Trek</u>, or <u>Small Worlds</u>.
- Read a book or article about a woman or women in space science.
- Watch a space-themed movie (such as Hidden Figures, The Martian, Mercury 13, or Apollo 11).
- Explore NASA's Solar System resources.
- Tour the sky through an app or Stellarium.
- · Color a NASA coloring sheet.

## **Discover and Share**

Share your discoveries with family or your Girl Scout sisters!

- Read about a legend of the sky, and then invent your own!
- · Share one fun fact about each of our Solar System neighbors.
- Learn about a NASA mission or NASA career.
- · Observe the phases of the Moon.
- Read how the NASA Artemis Mission will send the first woman to the Moon.
- · Take a step to protect our dark skies.
- Make a stardust self-portrait.
- · Color your own galaxy.

## **Explore the Night Sky**

Get out under the stars and stay a while.

- Watch Ursa Major, sometimes called the Big Dipper, for a few hours as it appears to move across the sky.
- Identify four constellations and/or planets with the help of a friend, an app or star wheel.
- · Stay up late to watch a meteor shower.
- · Wake up early to see Mars.
- Find night sky objects with binoculars or just your eyes! Look for bright objects like the Moon, a planet, a meteor, or a double star
- Spot the International Space Station or other satellite.
- Use a telescope to get a closer view of the Moon, a planet, or a deep space object like a nebula or galaxy.
- · Join an in-person or virtual star party.
- · Visit a planetarium or observatory.

## **Create and Engineer**

Scientists are makers and creative problem-solvers.

- Make a shadow drawing by tracing the shadow of an object at three or more different times of the day.
- Make a Moon phase book or track the phases with a worksheet.
- Design a Mars rover.
- Design a habitat for an alien world.
- · Engineer like a NASA scientist using items at home.
- Write a poem or song about space.
- Make Moon art or space art.
- Assemble a <u>star clock</u> or <u>star wheel</u>.
- · Cook up a space-themed meal, dessert, or drink.

