

Earth, Sun and Moon



Learning objectives

- Understand that the Sun is a star around which the Earth and other planets orbit
- Understand that day and night are caused by the rotation of the Earth around its axis
- Understand that the seasons result from the orbit of the Earth around the Sun and the angle of its axis
- Gain an appreciation that the Moon orbits the Earth which results in its change in appearance throughout the month
- Understand that Space is a vacuum

Workshop content - students will:

- Explore how the Earth's movement causes day and night and the seasons
- Line up the planets in order
- Make a Moon dial showing different phases of the Moon
- Watch the effect a (partial) vacuum has on 'Mr Marshmallow Man' and relate to the challenges of space exploration
- Taste real space food

National Curriculum links

Sc1 Scientific enquiry

Sc4 Physical processes

2) Forces and motion

b. that objects are pulled downwards because of the gravitational attraction between them and the Earth

4) The Earth and beyond

a. that the Sun, Earth and Moon are approximately spherical

b. how the position of the Sun appears to change during the day, and how shadows change as this happens

c. how day and night are related to the spin of the Earth on its own axis

d. that the Earth orbits the Sun once each year, and that the Moon takes approximately 28 days to orbit the Earth

QCA science units

5E Earth, Sun and Moon

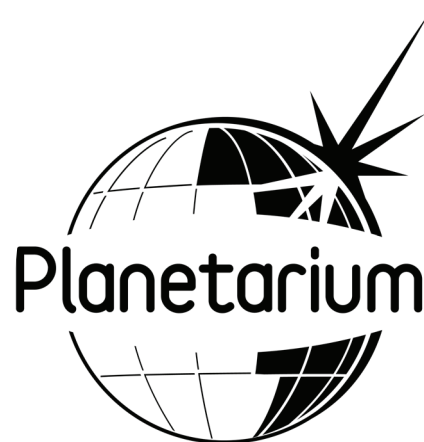
Picture gallery



Mr Marshmallow Man in a vacuum



Make a Moon dial to understand the phases of the Moon



This workshop complements At-Bristol's Planetarium shows for schools

Exploring the Solar System is available for Key Stage 2 pupils

at-bristol.org.uk/planetariumforschools