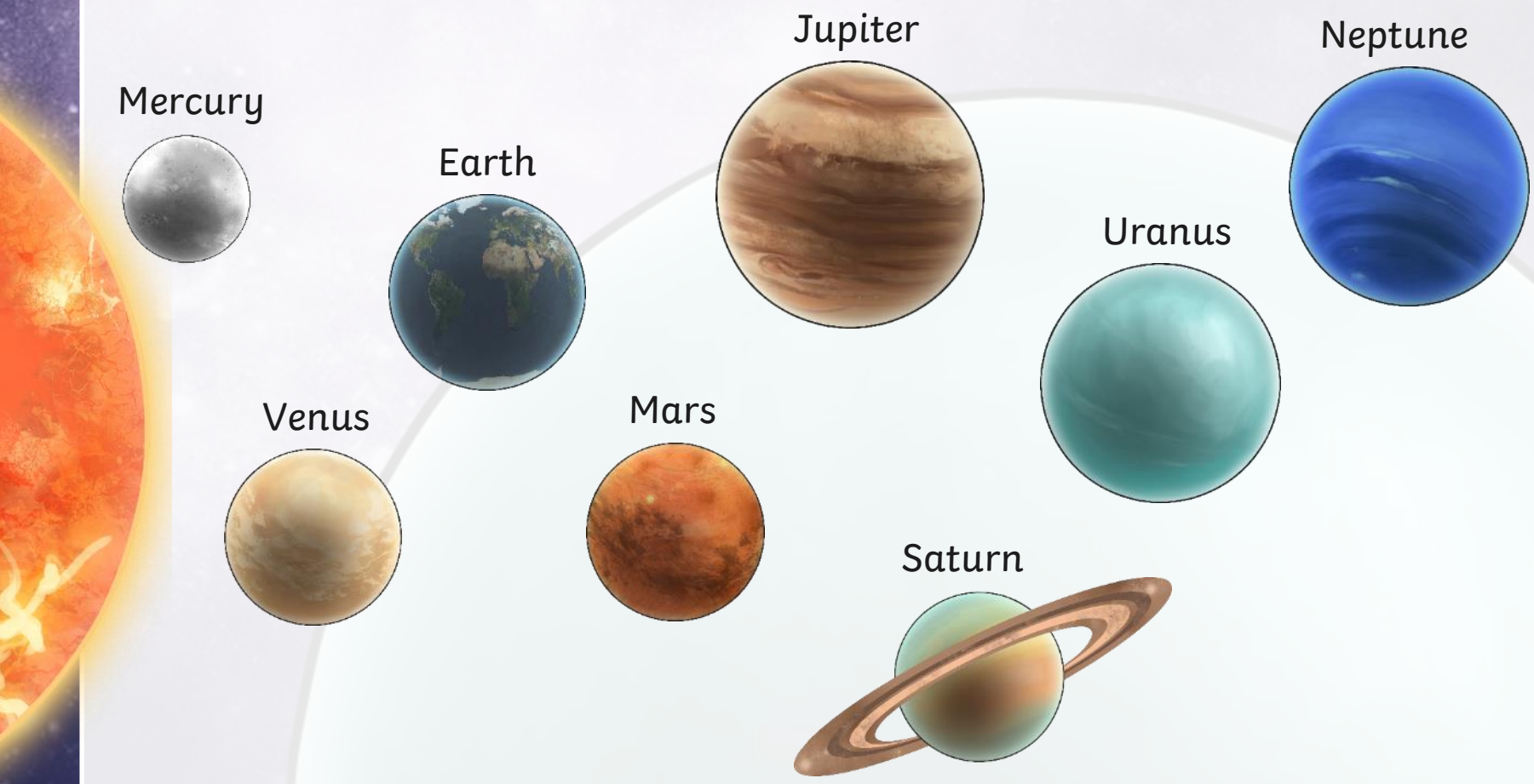
Uranus

Earth is only one of the planets in our solar system. There are seven other planets that also orbit our sun.



The Sideways Planet

The planet Uranus is the third largest planet in the Solar System. It is the seventh planet from the Sun and 2.6 billion kilometres away from Earth.

Uranus is an ice giant. Temperatures on Uranus can reach -224°C, making it the coldest planet in the Solar System.

Uranus gets its blue-green colour from a gas called methane in its atmosphere.

Uranus has 13 rings, the only planet in the Solar System, other than Saturn, that does so. The inner rings are narrow and dark and the outer rings are brightly coloured and easier to see.

Uranus is unusual because it is lying on its side, the only planet in the Solar System to do so.

Uranus is named after the Ancient Greek god of the sky, Ouranos. Uranus is the only one of the planets in our Solar System to be named after an Ancient Greek god. With the exception of Earth, the other planets are all named after Roman gods and goddesses.

Uranus and Earth

Uranus is very different from Earth.

One day on Uranus is about 17 hours long.

Uranus takes a long time to orbit the Sun. One year on Uranus is the same as 84 years on Earth.

Uranus has 27 moons. The moons closest to Uranus seem to be made of ice and rock. We know very little about the outer moons of Uranus.

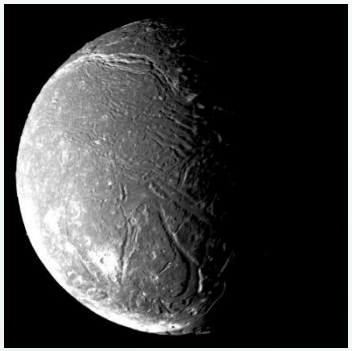
Uranus' Moons

Very little is known about Uranus' 27 moons. While other planets and moons have names that come from mythology, Uranus' moons are named after characters by writers William Shakespeare and Alexander Pope.

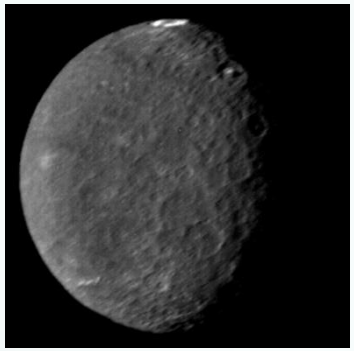
So far, astronomers have only managed to photograph a handful of Uranus' moons.

Titania

Oberon

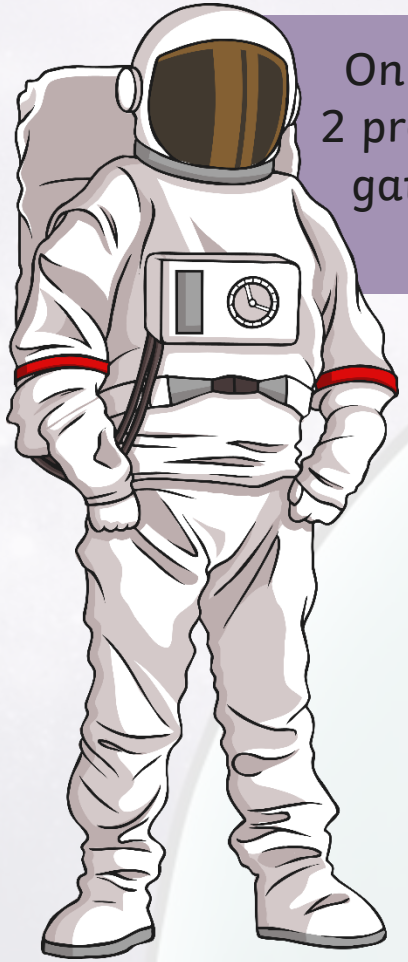


Ariel



Umbriel

Exploration

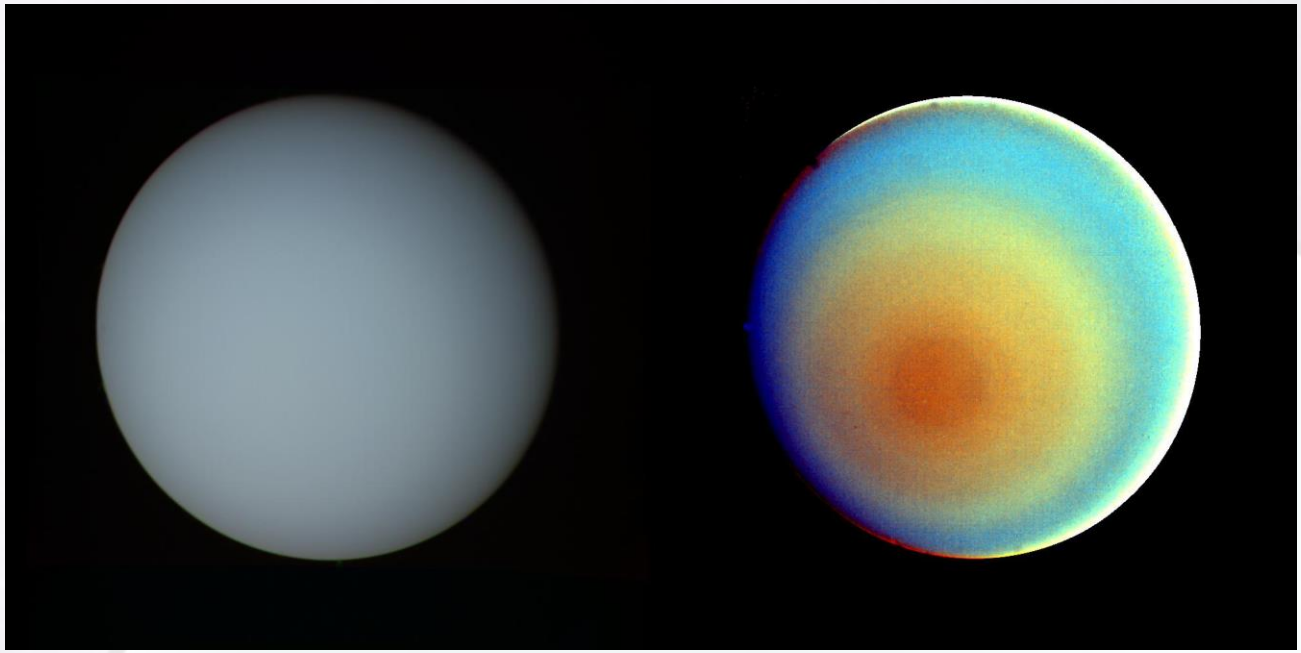


Only one spacecraft has visited Uranus. NASA's Voyager 2 probe reached the planet after a nine-year journey and gathered lots of information about the planet, its rings and moons in six hours.

The rest of the information we have about Uranus comes from the Hubble Space Telescope and other powerful telescopes on Earth.

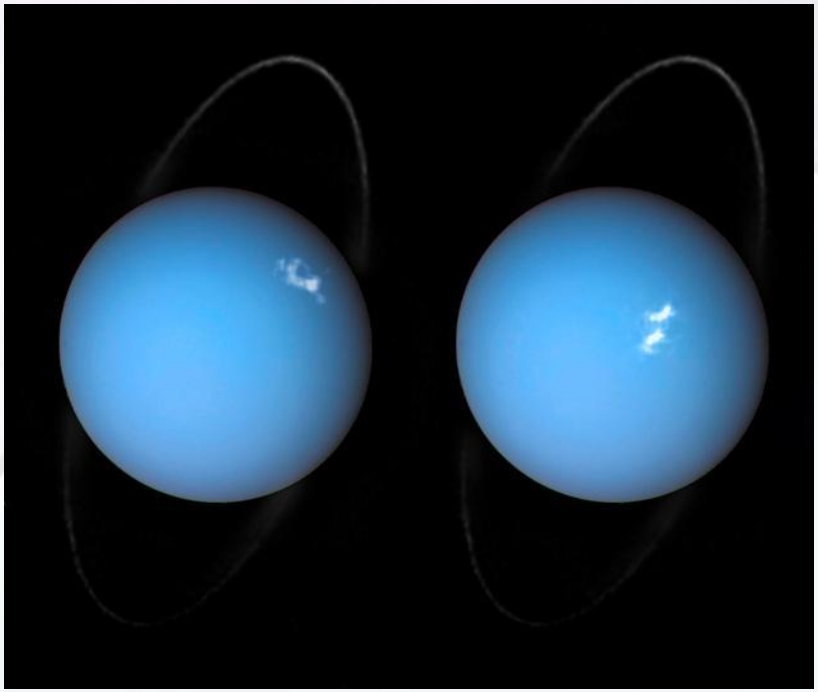
In 2011, NASA's New Horizons probe passed the orbit of Uranus on the way to Pluto. Unfortunately, Uranus wasn't nearby at the time.

Photographs of Uranus



Photographs of Uranus taken by NASA's Voyager 2 probe. The image on the left has been corrected to show the planet as our eyes would see it. The image on the right is the original picture sent back to Earth by Voyager 2.

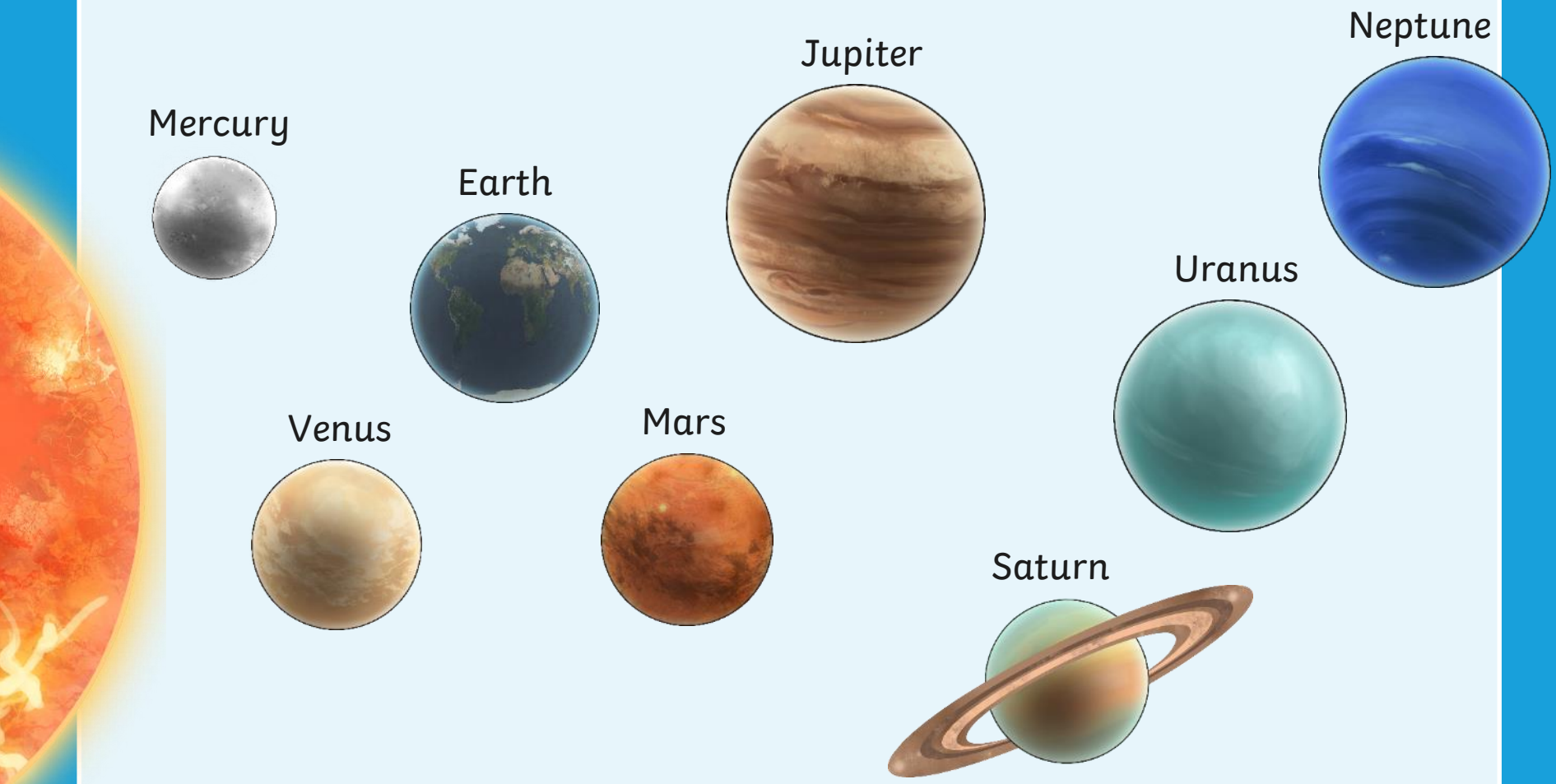
Photographs of Uranus



A mixture of two photos of Uranus taken by NASAs Voyager 2 probe and the Hubble Space Telescope. You can see a bright burst of light called an aurora move across the planet's surface.

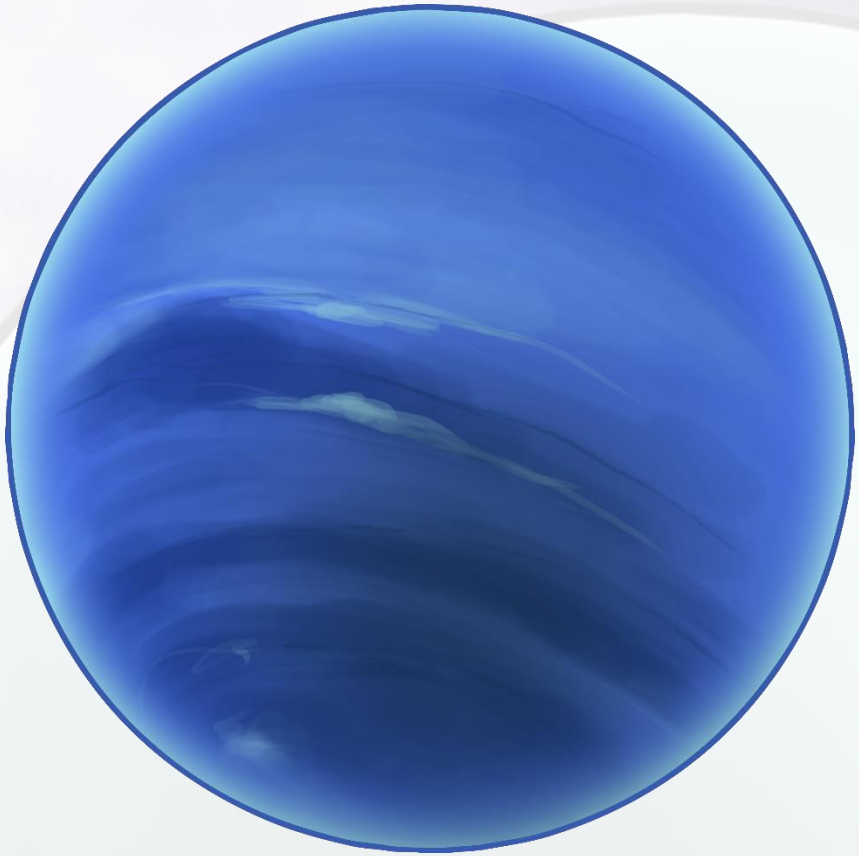
Neptune

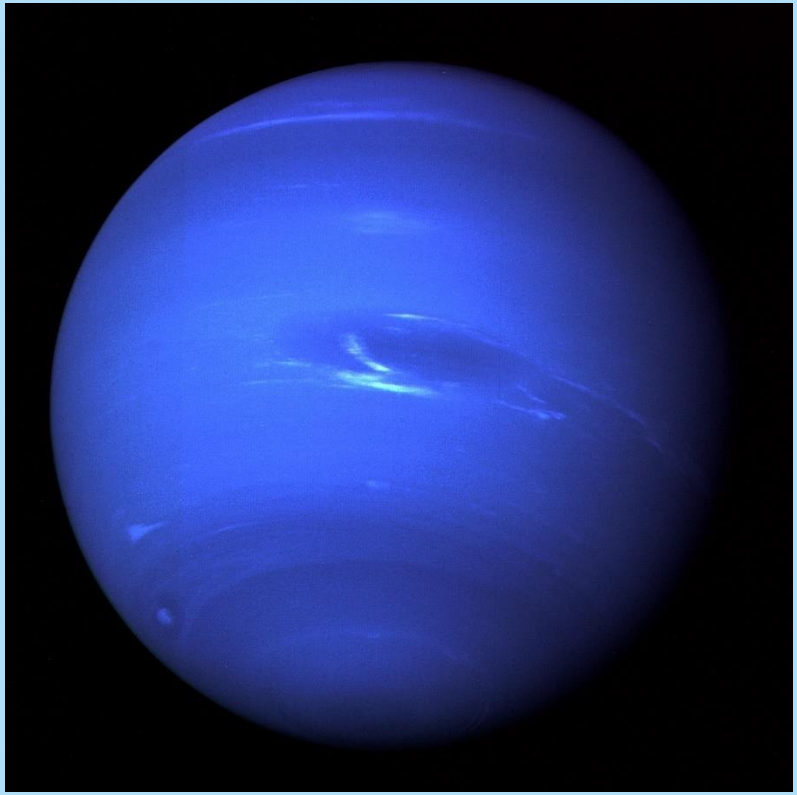
Earth is only one of the planets in our solar system. There are seven other planets that also orbit our Sun.



The Windiest Planet

The planet Neptune is the fourth largest planet in the Solar System. It is the eighth and most distant planet from the Sun. It is 4.3 billion kilometres away from Earth.





Neptune is an ice giant. Temperatures on Neptune can reach -218°C, making it one of the coldest planets in the Solar System.

Neptune is so distant that it takes the light from the Sun four hours to reach the planet.

Neptune gets its deep blue colour from a gas called methane in its atmosphere. It has no solid surface and instead is made of a thick soup of liquids and gases.

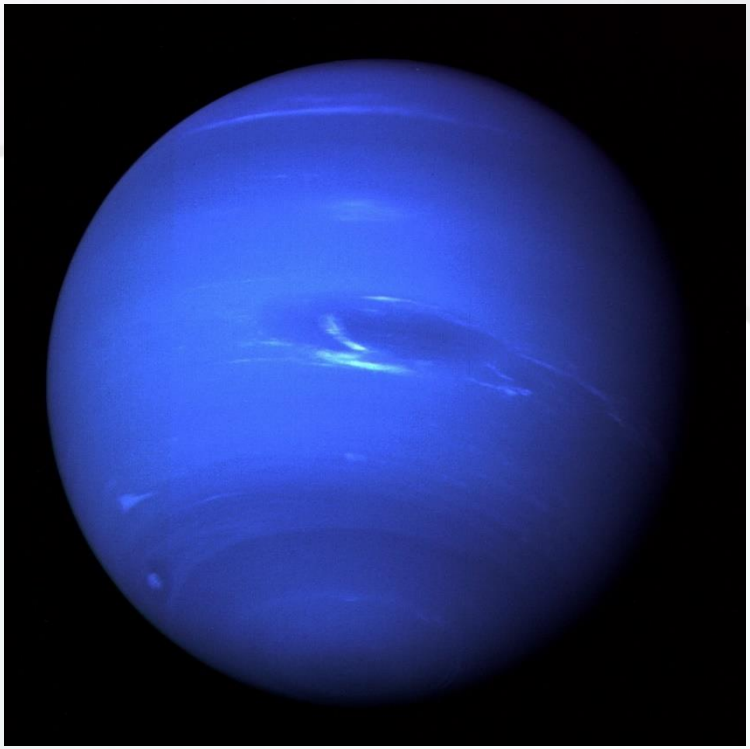
Neptune is the only planet in the Solar System that can't be seen in the night sky without a telescope.

Because of its deep blue colour, Neptune is named after the Roman god of the sea. The first suggested name for the planet was 'Oceanus'; however, 'Neptune' was chosen as all other planets except Earth were named after Roman or Greek gods and goddesses.

Neptune and Earth

Neptune is very different from Earth.

- One day on Neptune is about 16 hours long.
- Neptune takes an extremely long time to orbit the Sun. One year on Neptune is the same as 165 years on Earth. Since the planet was discovered in 1846, Neptune has only completed one orbit; in 2011!
- Like the Earth, Neptune also has four seasons. However, each season is about 40 years long.
- Neptune has 14 moons.

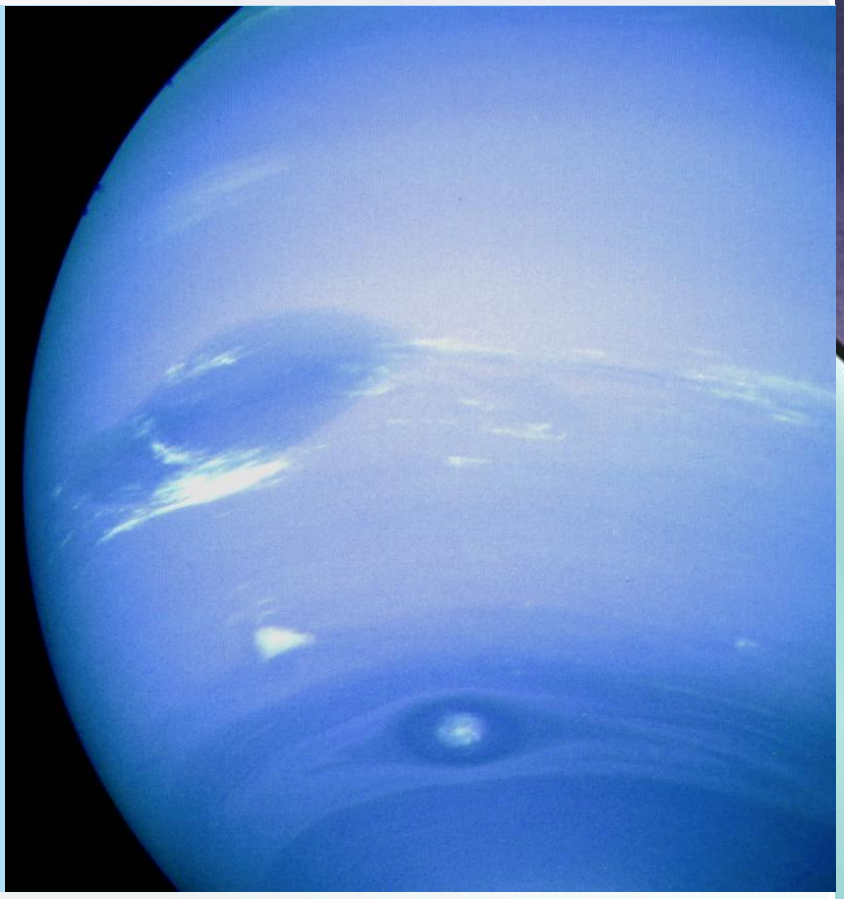


Exploration

Only one spacecraft has visited Neptune. NASA's Voyager 2 probe reached the planet in 1989 after a twelve-year journey and gathered lots of information about the planet and its largest moon, Triton.

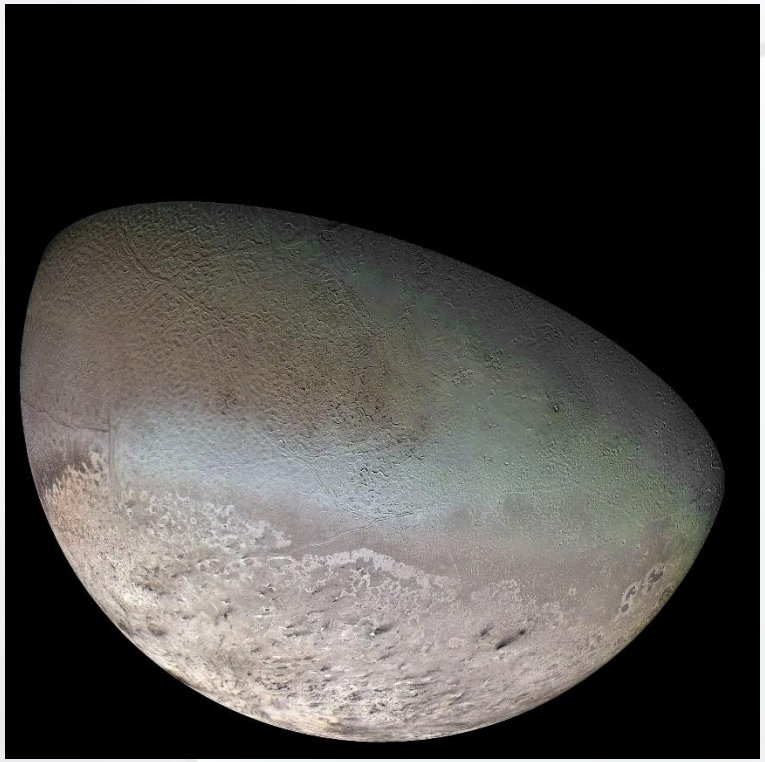
During its mission, Voyager 2 discovered six small new moons orbiting Neptune; Naiad, Thalassa, Despina, Galatea, Larissa and Proteus.

The rest of the information we have about Neptune comes from the Hubble Space Telescope and other powerful telescopes on Earth.



Neptune's Moons

Very little is known about most of Neptune's moons. Each moon is named after sea gods from different mythologies.



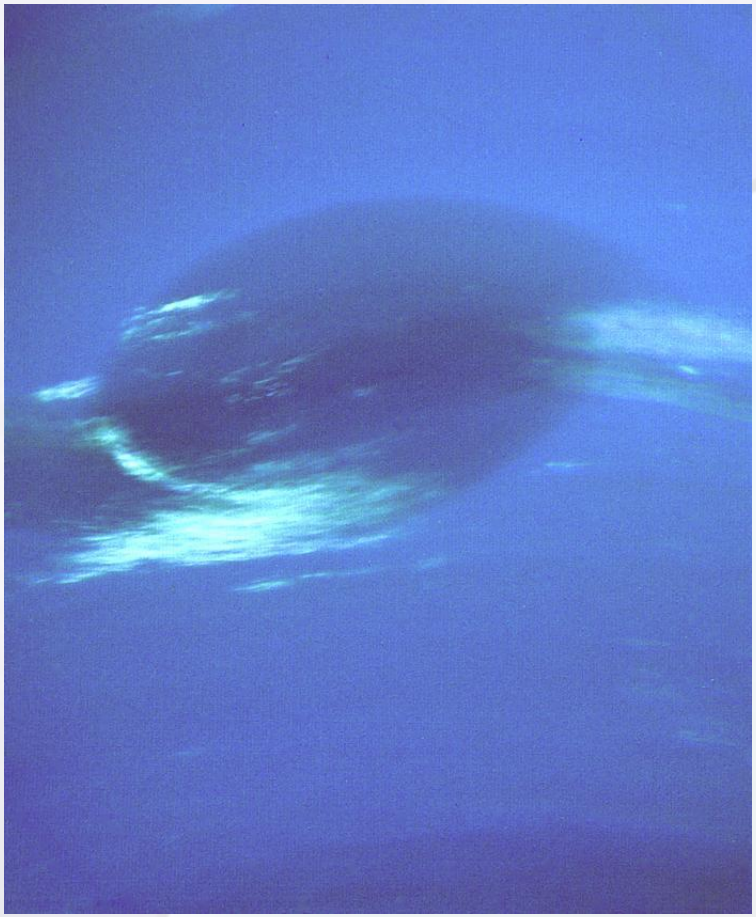
Triton is Neptune's largest moon. It is the only moon in the Solar System that orbits in a different direction to its planet.

The surface of Triton is extremely cold, about -235°C, however it has active geysers on its surface which shoot gas into the atmosphere.

Photographs of Neptune

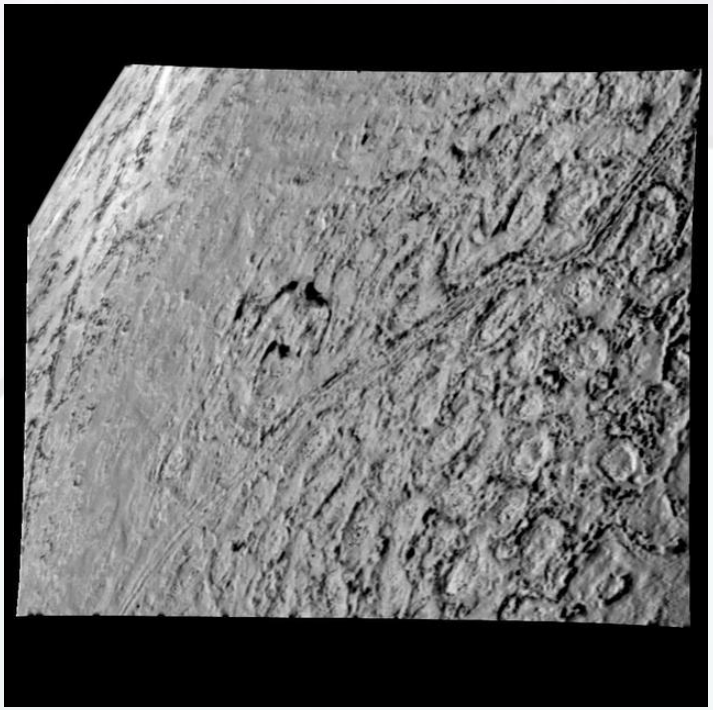
Taken by Voyager 2 in 1989, this photograph shows Neptune and its largest moon, Triton.

Photographs of Neptune



A close up photograph by Voyager 2 of the Great Dark Spot, a huge storm that raged on Neptune. The storm kept changing size and shape until disappearing in 1994. There are many other storm spots on Neptune's surface that appear and disappear.

Photographs of Neptune



A close up photograph by Voyager 2 of the surface of Neptune's largest moon, Triton.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