



THE SOLAR SYSTEM

Observing the night sky with the naked eye, ancient astronomers noticed moving points of light they called “planets,” which means “wanderers.” Those first planets were named for Roman deities: Jupiter, Mars, Mercury, Venus and Saturn.

With the invention of the telescope, astronomers were able to see other planets. These included Uranus in 1781, Neptune in 1846, and Pluto in 1930, which was later redefined as a dwarf planet. Besides planets, thousands of asteroids and comets fill the universe. Most asteroids orbit between Mars and Jupiter. Comets exist beyond Pluto’s orbit.

There are two types of planets. Terrestrial planets, closest to the Sun, have rocky surfaces. These are Mercury, Venus, Earth and Mars. Those beyond Mars’ orbit—Jupiter, Saturn, Uranus and Neptune, are called Jovian planets, meaning “gas giants.”

THE SUN

A huge sphere of mostly ionized gas, the sun is the closest star to Earth.

size: 332,900 times more massive than Earth
temperature: 27 million°F

MERCURY

Named for the Roman Messenger god, Mercury orbits the sun faster than any other planet.

diameter: 3,031 miles
temperature: -346°F to 950°F
mean distance from the sun: 35.98 million miles

VENUS

Named for the Roman goddess of love and beauty, it is the only planet that rotates in the opposite direction of its orbit around the sun.

diameter: 7,521 miles
temperature: 55°F to 396°F
mean distance from the sun: 67.23 million miles

EARTH

Earth is the only planet known to harbor life and the only planet with liquid water on its surface.

diameter: 7,926 miles
temperature: -128°F to 136°F
mean distance from the sun: 92.96 million miles

MARS

Named for the Roman god of war, Mars gets its red coloring from soil rich in iron oxides.

diameter: 4,221 miles
temperature: -305°F to 90°F
mean distance from the sun: 141.61 million miles

JUPITER

The largest planet in our solar system was named for the king of the Roman gods. Its bands of color can be seen with a large telescope.

diameter: 86,846 miles
temperature: -234°F average
mean distance from the sun: 483.80 million miles

SATURN

Named for the Roman god of agriculture, Saturn was the most distant planet known by the ancients. Its rings are comprised of ice particles.

diameter: 74,897 miles
temperature: -295°F average
mean distance from the sun: 890.73 million miles

URANUS

Originally named Georgium Sidus in honor of King George III, Uranus was discovered in 1781. It is twice as far from the sun as Saturn.

diameter: 31,763 miles
temperature: -353°F uniform
mean distance from the sun: 1,784.89 million miles

NEPTUNE

Named for the Roman god of the sea, Neptune’s layer of methane gives a blue coloring. Winds tear through its clouds at more than 1,200 mph.

diameter: 30,775 miles
temperature: -353°F
mean distance from the sun: 2,793.12 million miles

DWARF PLANETS

Named for the Roman god of the underworld, Pluto is the coldest, smallest and outermost planet in our solar system. In 2006, Pluto was reclassified as a dwarf planet. Other dwarf planets are Ceres, Eris, Makemake, Haumea and Sedna.