DATA SHEET

SOLAR SYSTEM: ERIS

Eris is a member of a group of objects that orbit in an area of the solar system beyond the orbit of Neptune called the Kuiper Belt. This distant zone (30-50 AU) is populated with icy debris and rocky bodies, which formed early in the history of our solar system about 4.5 Gya, and are known as Kuiper Belt/transneptunian objects, or plutoids.

Eris was first spotted in 2003 during a Palomar Observatory survey of the outer solar system by Mike Brown, a professor of planetary astronomy at the California Institute of Technology; Chad Trujillo of the Gemini Observatory; and David Rabinowitz of Yale University. The discovery of Eris started the heated debate about the classification of planets and the new status of Pluto.

SOME FACTS ABOUT ERIS

1. Eris is 68 Astronomical Units (AU) from the Sun. (10 125 000 000 km)
2. With a radius of about 1 163 km, Eris is about 1/5 that of Earth.
3. It takes light more than nine hours to travel from the Sun to the surface of Eris.
4. The surface temperatures of Eris vary from circa 56 K to 30 K (-217 °C to -243 °C).
5. Eris has a very small moon called Dysnomia. Its nearly circular orbit around Eris lasts about 16 Earth days days. Dysnomia allows planetary scientists to calculate the mass of Eris.
6. Eris is so distant from the Sun that its atmosphere freezes and collapses, falling to the surface as snow. As it reaches perihelion, the atmosphere thaws.
7. As Eris orbits the Sun, it completes one rotation every 25.9 hours, making its day length similar to ours on Earth.