

Pluto: no longer a planet?

Lyford Rome - Edtec 650

**What do
you think?**

**Should
Pluto still
be called a
planet?**



**In 2000, the
Hayden
Planetarium
redesigned its
solar system
exhibit.**

Pluto was not included with the planets, but with another group called “Kuiper Belt Objects”

Dear Scientist,

What do you call Pluto if its not a planet anymore? If you make it a planet again all the science books will be right. Do people live on Pluto? If there are people who live there they won't exist. Why can't Pluto be a planet? If its small doesn't mean that it doesnt have to be a planet anymore. Some people like Pluto. If it doesn't exist then they won't have a favorite planet. Please write back, but not in cursive because I can't read in cursive.

Your friend,
Madeline Trout

November 6, 06

Dear MR Ipson

I think Pluto is a planet.
Why do you think Pluto is
no longer a planet? I do
not like your answer. Pluto
is my favorite planet!!! You
guy is here to take all of the
books over and change them.

Pluto IS a planet!!!!

Pluto



Your friend

Emerson York



**How many planets
are there?**

5

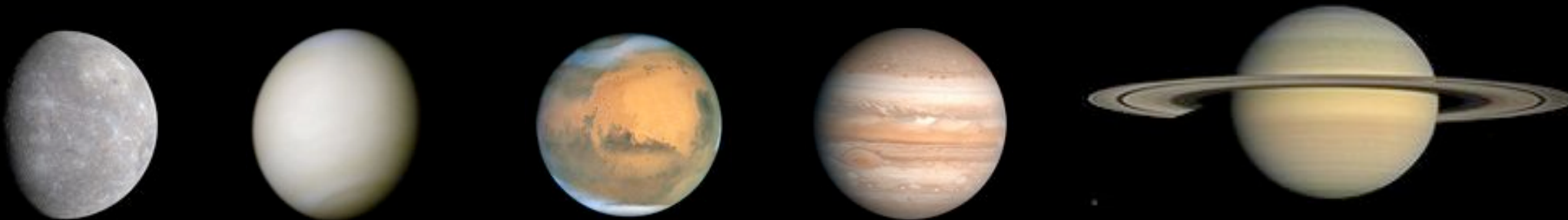
9

8

18

**It depends upon
when you ask the
question**

**The Romans knew
5 planets: Mercury,
Venus, Mars,
Jupiter, and Saturn.**

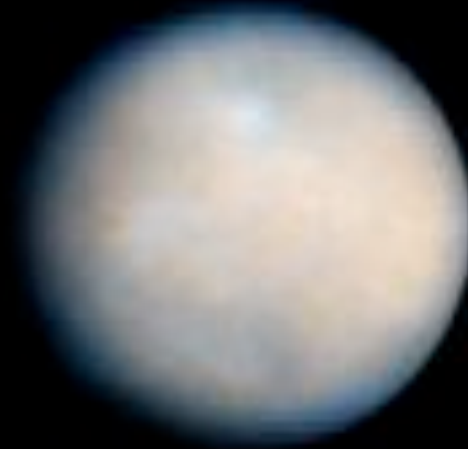
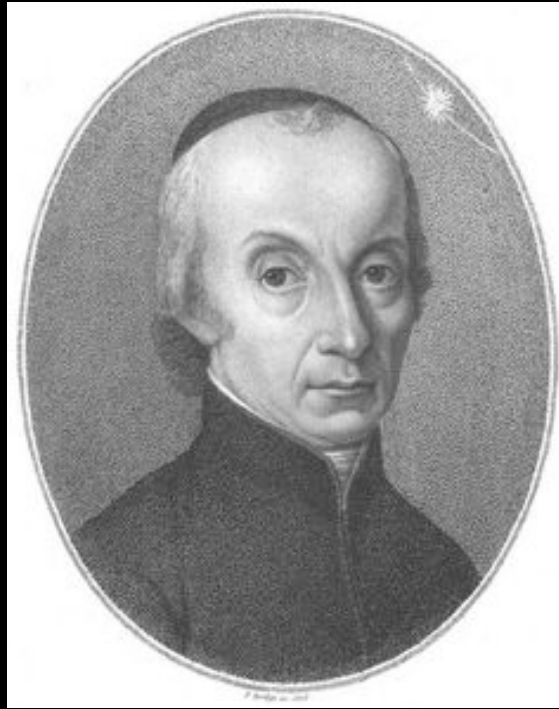


“wanderer”



**William Herschel discovered
Uranus in 1781,
and by then the Earth was also
understood to be a planet.**





**In 1801, Giuseppe Piazzi
discovered Ceres, making the total
8 planets.**

Pallas

Vesta

Juno

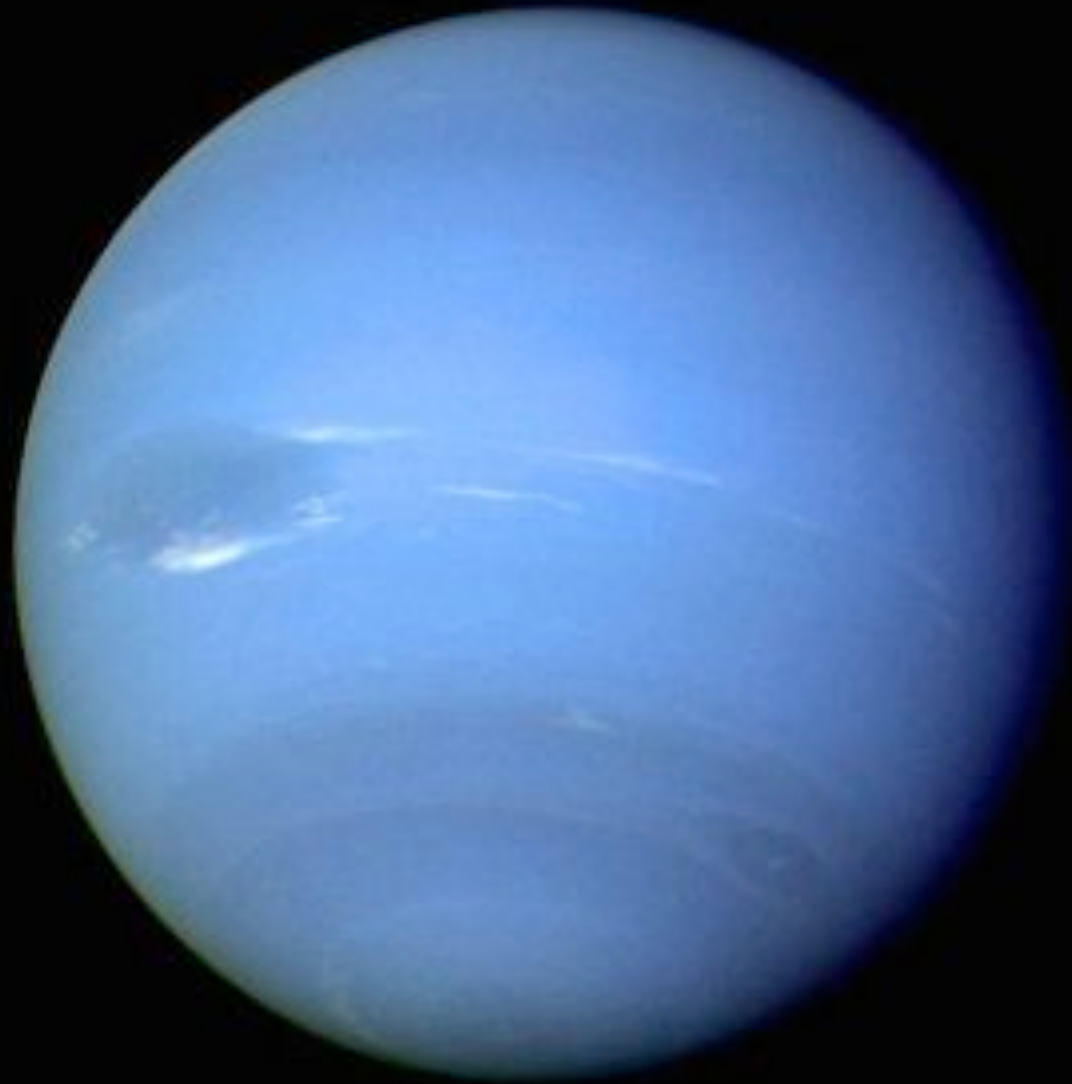
Astrea

Hebe

Iris

Flora

Metis

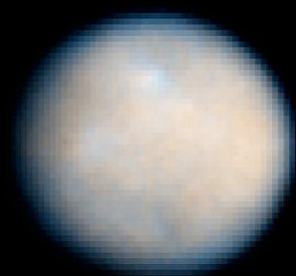


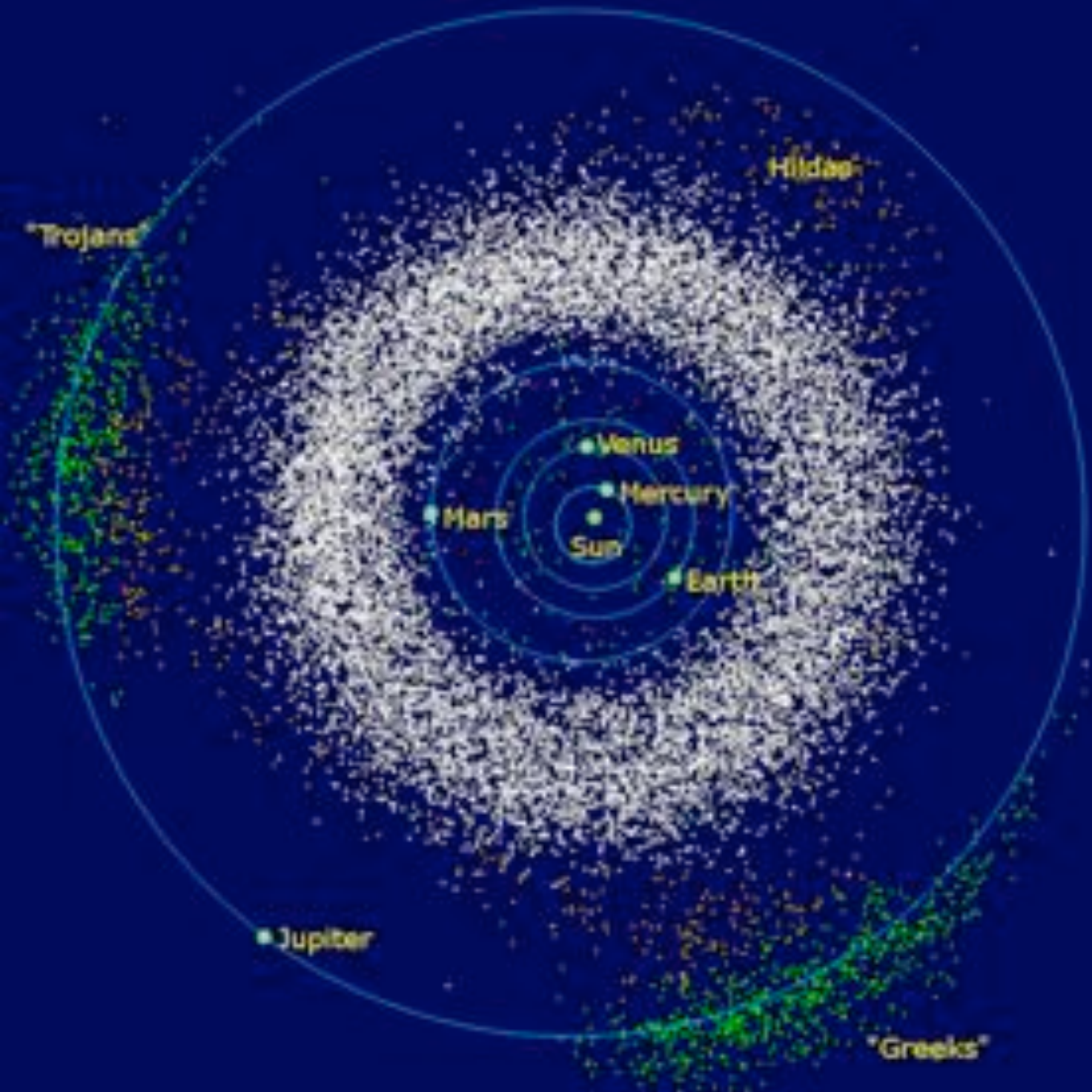
Neptune was found in 1846

Longitude of perihelion,	242 47 3.44
“ node,	285 32 29.72
Inclination,	3 46 51.27
Mean daily motion,	590".3784

This newly discovered planet belongs to the same group with *Astræa*, *Hebe*, *Iris*, *Flora*, and *Metis*, all of which are, as will be seen below, of very recent discovery. The planets known from high antiquity are *Mercury*, *Venus*, *Earth*, *Mars*, *Jupiter*, and *Saturn*. To these, in 1781, was added *Uranus*, or *Herschel*, as it is sometimes called, from the name of its discoverer. Early in the present century, astronomers became convinced that a planet existed between Mars and Jupiter, and an association of twenty-four observers was formed to examine the whole heavens. But, early in January, 1801, the present planet *Ceres* was accidentally discovered by Piazzi, in Sicily. In March, 1802, *Pallas* was discovered by Olbers, in Bremen, and this was followed, in 1804, by the discovery of *Juno*, and, in 1807, by that of *Vesta*. On December 8, 1845, *Astræa* was discovered by Professor Hencke, and on July 1, 1847, he also discovered *Hebe*. *Iris* was discovered August 13, 1847, and *Flora*, October 18 of the same year, both by Mr. Hind. *Metis* was, we believe, discovered by Mr. Graham, in Ireland, on April 25, 1848. The recent extraordinary discovery of *Neptune* is familiar to all. The total number of primary planets discovered, up to the present time, is, it will be seen, 18. Many of them are never visible to the naked eye. — *Editors.*

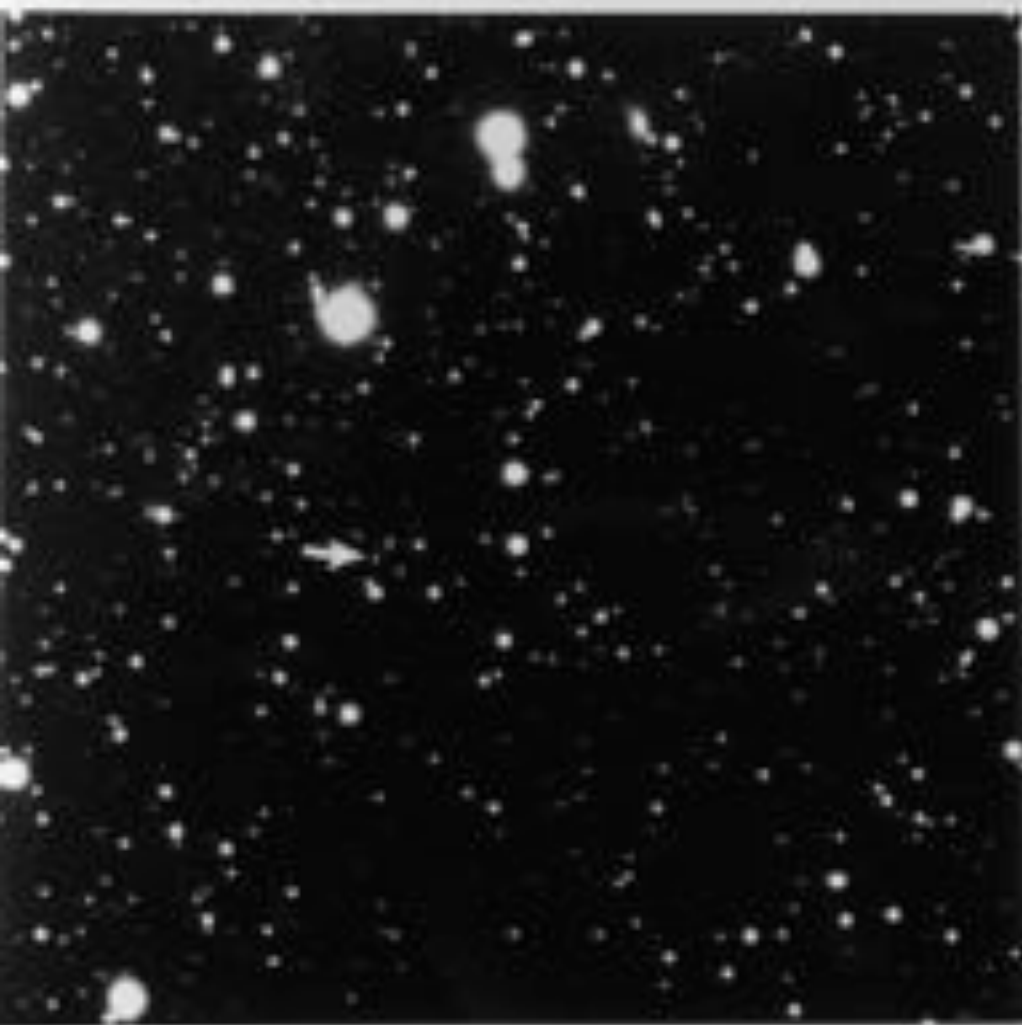
**new class of object:
the asteroid**



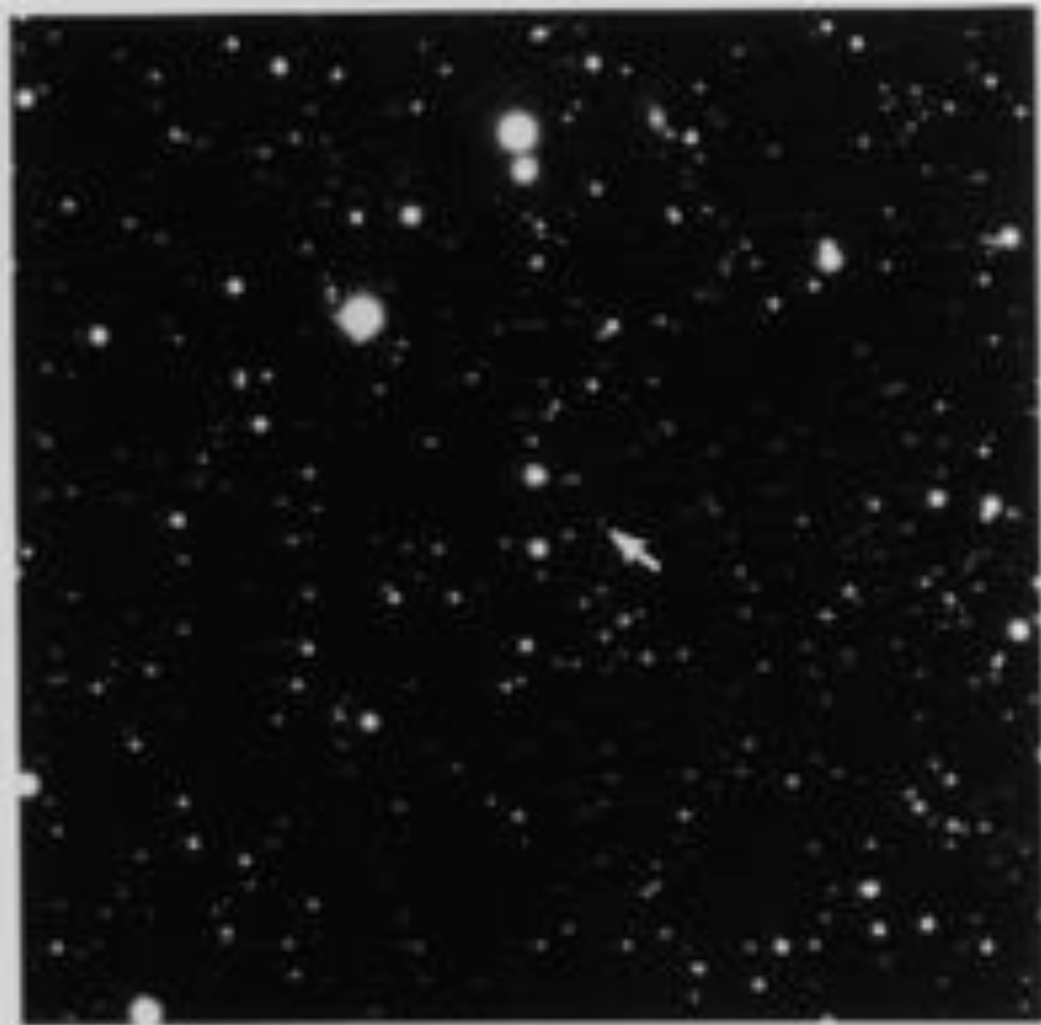


**so where does
this leave Pluto?**

DISCOVERY OF THE PLANET PLUTO



January 23, 1930



January 29, 1930

**In the 1990's
astronomers began to
discover other bodies
beyond Pluto's orbit**

here we go again!

Largest known trans-Neptunian objects (TNOs)



Eris



Pluto



Makemake



Haumea



Sedna



Orcus

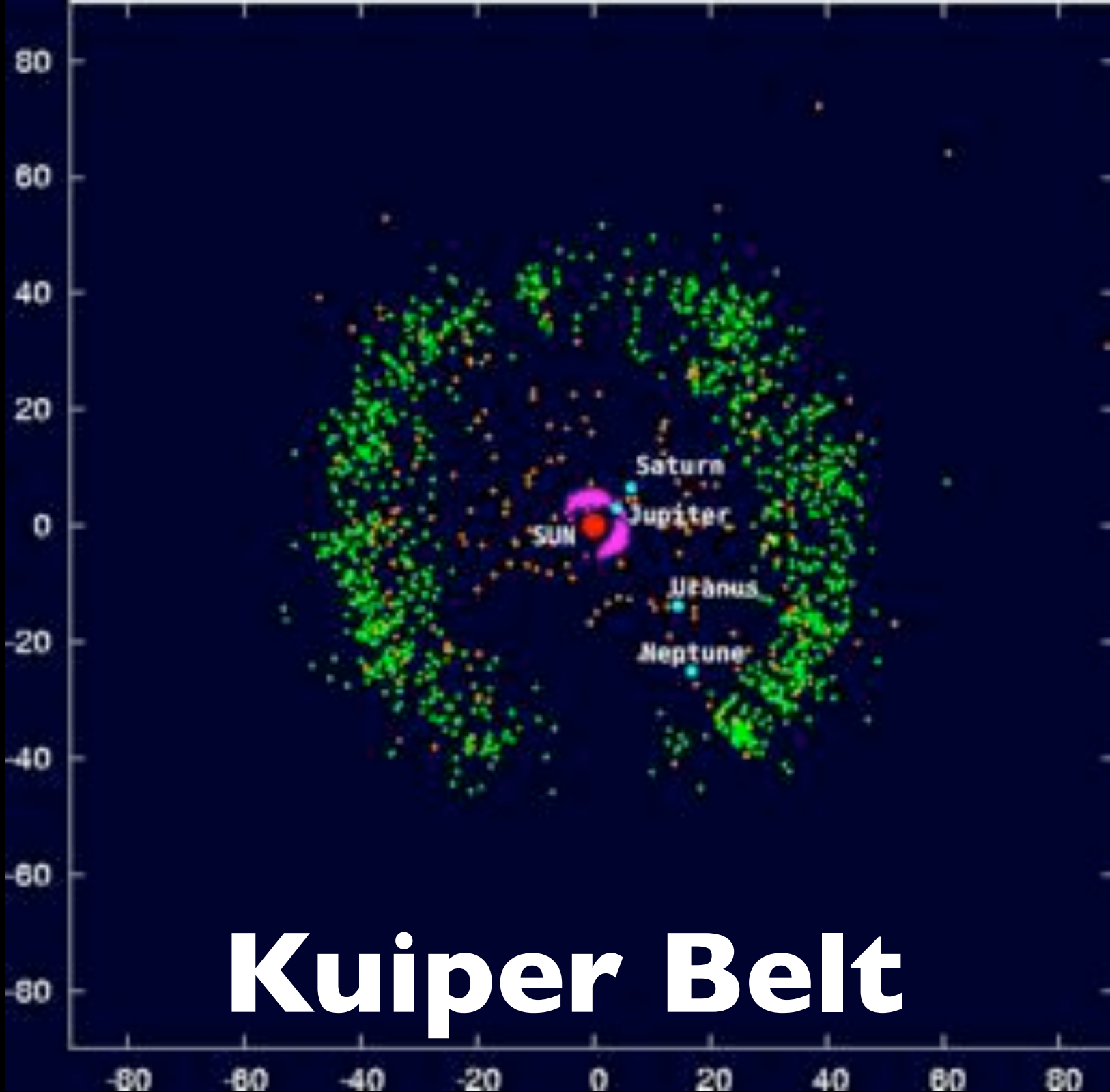


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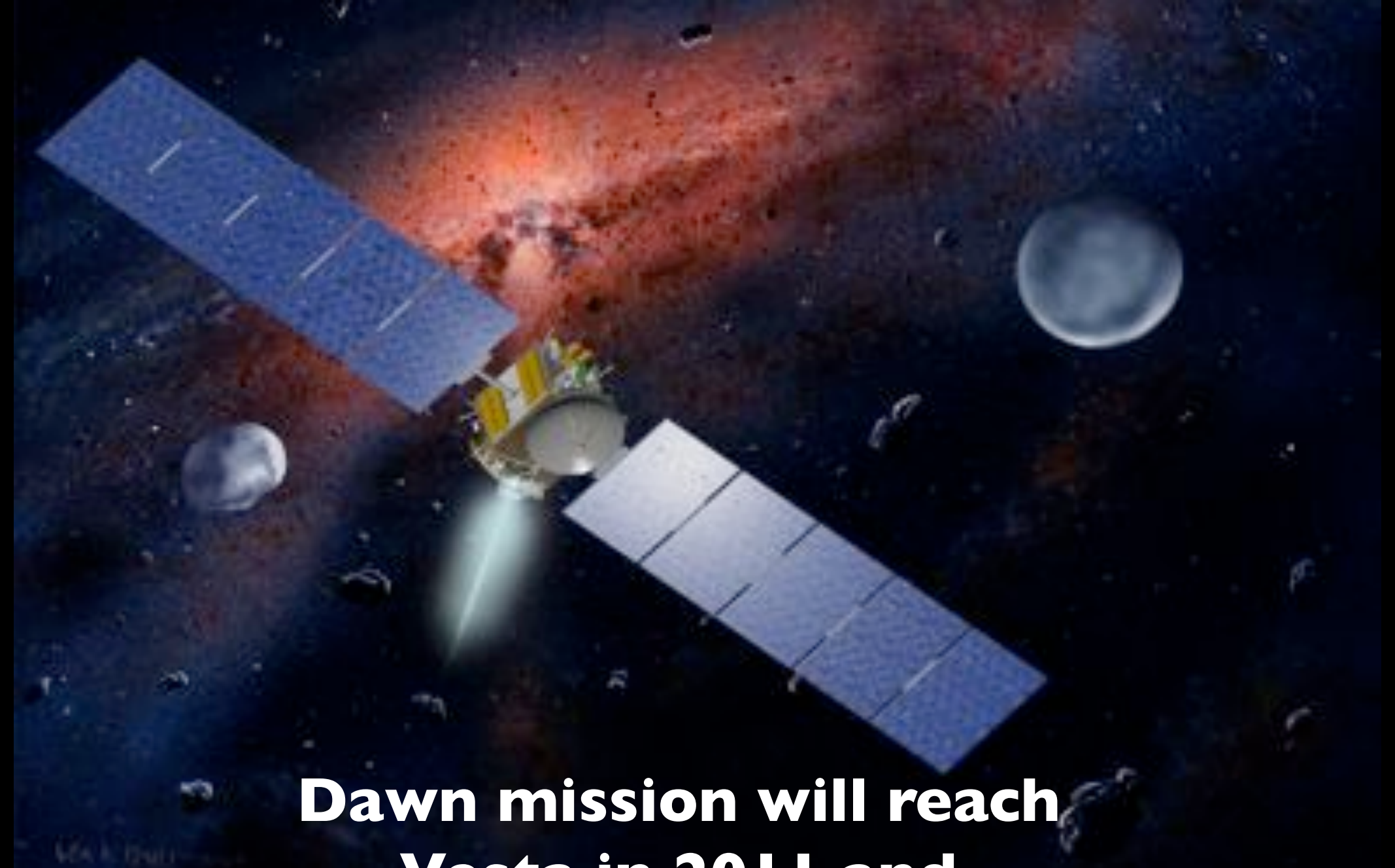


Quaoar





**Right now, spacecraft
are on their way to
both the asteroid belt
and the Kuiper belt.**



**Dawn mission will reach
Vesta in 2011 and
Ceres in 2015**



**New Horizons will reach
Pluto in 2015**

Planets
Dwarf Planets
Small Solar System
Bodies

Vulcanoids
Trans-Neptunian Objects
Plutoids
Satellites
Near Earth Asteroids
Comets
Trojan Asteroids
Scattered Disk Objects

Mercury	Jupiter	Puck	Eris, a dwarf planet
Mercury-crosser asteroids	Rings of Jupiter	Neptune	Dysnomia
Venus	Complete list of Jupiter's natural satellites	Rings of Neptune	(84522) 2002 TC302
Venus-crosser asteroids	Io	Complete list of Neptune's natural satellites	90377 Sedna (possibly inner Oort Cloud)
2002 VE68, Venus' quasi-satellite	Europa	Proteus	2000 OO67 comet?
Earth	Ganymede	Triton	Detached object
Moon (Luna)	Callisto	Nereid	Oort Cloud (hypothetical)
Possible Kordylewski Cloud	Jupiter's trojan asteroids	Neptune trojans	Hills cloud / Inner Oort cloud
Near-Earth asteroids (included 99942 Apophis)	Saturn	Non-trojan minor planets	Outer Oort cloud
Earth-crosser asteroids	Rings of Saturn	Centaurs	The Solar System also contains:
Earth's quasi-satellites	Complete list of Saturn's natural satellites	Damocloids	Comets (icy bodies with eccentric orbits).
Mars	Mimas	Trans-Neptunian objects beyond the orbit of Neptune	Periodic comets
Deimos	Enceladus	Kuiper belt objects (KBOs)	Non-periodic comets
Phobos	Tethys	Plutinos	Small objects, including:
Mars trojans	Dione	Pluto, a dwarf planet	Meteoroids
Mars-crosser asteroids	Rhea	Charon	Dust, including interstellar dust.
Asteroid belt and surrounds	Rings of Rhea	Nix	Helium Focusing Cone, around the Sun.
Ceres, a dwarf planet in the asteroid belt	Titan	Hydra	Heliosphere, a bubble in space produced by the solar wind.
Asteroids in the Main Asteroid Belt, between the orbits of Mars and Jupiter	Hyperion	90482 Orcus	Heliosheath
Pallas	Iapetus	Twotino	Heliopause
Juno	Saturn's Trojan moons	Cubewanos (classical objects)	Hydrogen wall, a pile up of hydrogen from the interstellar medium.
Vesta	Uranus	50000 Quaoar	
Asteroids Main Belt.	Rings of Uranus	20000 Varuna	
Asteroid moons	Complete list of Uranus' natural satellites	Haumea, a dwarf planet	
	Miranda	Namaka	
	Ariel	Hi'iaka	
	Umbriel	Makemake, a dwarf planet	
	Titania	Scattered disc objects	
	Oberon		

**What's in a name?
That which we call a rose
By any other name
would smell as sweet."**

Romeo and Juliet

**It only goes to
prove that there's
nothing new under
the sun!**

**(Or rather in orbit
around it...)**