

Name _____

Solar System Study Guide

***Star:** a hot sphere of gases that gives off energy *hottest* = blue *coldest* = red

Constellation: a number of stars that appear to form a pattern or picture- there are 88!

The Sun is the center of our Solar System! It is the **largest star** in our solar system.

It appears brighter because it is closer.

***Planets:**

Inner: Mercury, Venus, Earth, Mars

Outer: Jupiter, Saturn, Uranus, Neptune

♥ *Gas Giants* Jupiter, Saturn, Uranus, Neptune

♥ Venus is Earth's sister planet

♥ **Hottest Planet:** Venus

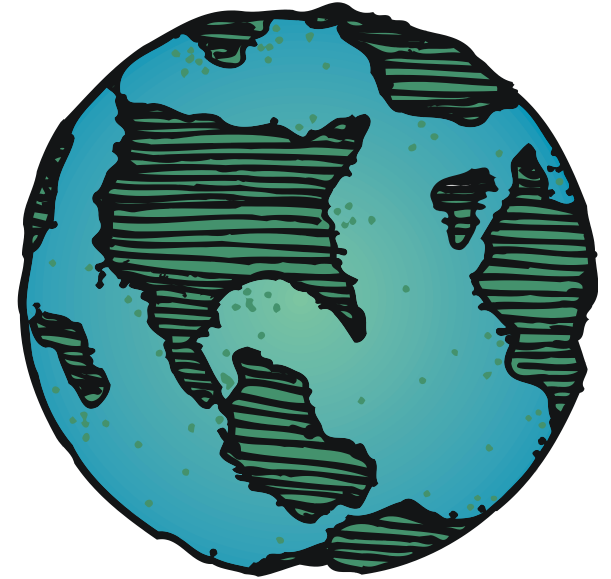
♥ Uranus rotates on its side!

♥ **Asteroid Belt:** area between the inner and outer planets

***List the planets in order from the sun:**

Mercury, Venus, Earth, Mars, Jupiter, Saturn, Uranus, Neptune

♥ Remember our trick: My Very Excellent Mother Just Served Us Nuggets!



*What are the differences between inner and outer planets?

Inner: closer to the sun, hard, rocky, smaller, hotter Outer: farther from the sun, gas giants, more moons

*List the planets from largest to smallest:

Jupiter Saturn Uranus Neptune Earth Venus Mars Mercury

*Earth: Earth spins on an imaginary line called an axis- A rotation is one complete spin on its axis- It takes 24 hours to make one complete rotation.

The Earth revolves around the sun. One complete revolution takes 365 $\frac{1}{4}$ days (one year).

Earth travels in a set path around the sun, called its orbit. Earth's orbit is shaped like an ellipse (a flattened circle). It is elliptical (oval shaped).

The tilt of the Earth on its axis causes us to have seasons. It is summer in the northern hemisphere when it is winter in the southern hemisphere.

Day and Night are caused by Earth spinning on its axis.

*Exploration in Space: Scientists use telescopes to see objects that are far away in great detail. They also use satellites and travel in spacecrafts.