Name: _____

Date: _____ Period: _____

Review: Earth In the Solar System

Directions: Carefully read over the checklist of items that you need to know for the "Earth In the Solar System" test. Be sure to attend extra help if you have any questions.

APPARENT TO ACTUAL MOTIONS

- ☐ Terms to Know: apparent motion, celestial object, horizon, zenith, altitude, azimuth
- ☐ Geocentric Model [Ptolemaic] - idea that Earth was at the center of the solar system
- ☐ Know the two major problems with respect to the Geocentric Model
- ☐ All objects [except Polaris] appear to move at 15º/hour
- ☐ The greater the Sun's path the increased amount of daylight hours an area receives
- ☐ The shorter the Sun's path the decreased amount of daylight hours an area received
- ☐ Heliocentric Model [Copernican] - current model of the solar system where the Sun is at the center

EARTH'S MOTIONS

- ☐ Terms to Know: rotation, revolution, ellipse, eccentricity, foci, major axis, perihelion, aphelion
- ☐ Earth's axis is tiled 23.5º
- ☐ Foucault's Pendulum provides evidence of rotation
- ☐ Coriolis Effect provides evidence of rotation
- ☐ Parallelism of Earth's axis [with revolution] gives us seasons… not distance!
- ☐ Dates for the winter solstice [December 21] and summer solstice [June 21]
- ☐ Dates for the vernal equinox [March 21] and autumnal equinoxes [September 21]
- ☐ Earths orbital velocity is fastest at the perihelion and slowest at the aphelion
- ☐ ESRT Chart: Formula for Eccentricity

THE MOON

- ☐ Terms to Know: crescent moon, gibbous moon, full moon, new moon, waxing, waning
- ☐ The leading theory for the formation of the moon is the Giant Impact Theory
- ☐ The Moon's axis is tilted 5º
- ☐ The Moon's revolution and rotation is equal [27.3 days]
- ☐ Solar Eclipse - the Moon gets in the way of the Sun's light and a shadow is projected on Earth
- ☐ Lunar Eclipse - Earth's shadow is projected onto the Moon when Earth gets in the way
- ☐ One tidal cycle is 12 hrs and 25 mins

THE SUN

- ☐ Terms to Know: sun, photosphere, chromosphere, corona, solar flare, sunspot
- ☐ Energy is produced on the Sun by nuclear fusion [combining light elements into a heavier element]

THE SOLAR SYSTEM

- ☐ Terms to Know: solar system, asteroids, Kuiper belt, comet, Oort Cloud, meteorites
- ☐ Solar System formed 4.5 billion years ago from a cloud of gas and dust
- ☐ Terrestrial Planet - solid, small diameters, high density planets
- ☐ Jovian planet - gaseous, large diameters, low density planets
- ☐ ESRT Chart: The Solar System Data Chart