**Space Science Semester Exam Study Guide**

**Space Science and Our Solar System**

Know the phases of the moon for the Northern and Southern Hemispheres

Know the following constellations: Cygnus, Ursa Major, Orion, Cassiopeia, Scorpio

What are Kepler’s 3 Laws? (…and don’t say 1, 2, and 3)

Know when the seasons occur: Vernal and Autumnal Equinoxes; Winter and Summer Solstices

Know the months per season

What is the tilt of the Earth?

What is the tilt of the moon?

How many days of light does the moon get?

When do you get highest tides? You need to know alignment and names for these tides.

When do you get the low tides?

What is a lunar eclipse?

What is a solar eclipse?

What is the corona?

What are solar flares?

What was the first American male in orbit? Who was the first person in orbit?

What was the first American female in orbit? Who was the first woman in orbit?

Who are Katherine Johnson, Dorothy Vaughn, and Mary Jackson?

What was the Heliocentric Theory? Who came up with it?

What was the Geocentric Theory? Who came up with it?

Where is the main asteroid belt? Where is the Kuiper belt? Know the main Dwarf Planets in each.

What is gravity?

What is the universe?

What is the name of the telescope currently being built in Chile (using the mirrors from the UA Mirror lab)?

What does LSST stand for?

What is the LSST such an amazing feat?

What are the processes for making the mirrors used for the Giant Magellan Telescope?