

Krittika

Interesting Astronomical Phenomena

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The Blue Marble



Facts

- Earth is Round
- Rotation
- Revolution
- The Heliocentric System

How do we verify them?

Lunar Eclipse!



Circular Earth!



Once in a red moon

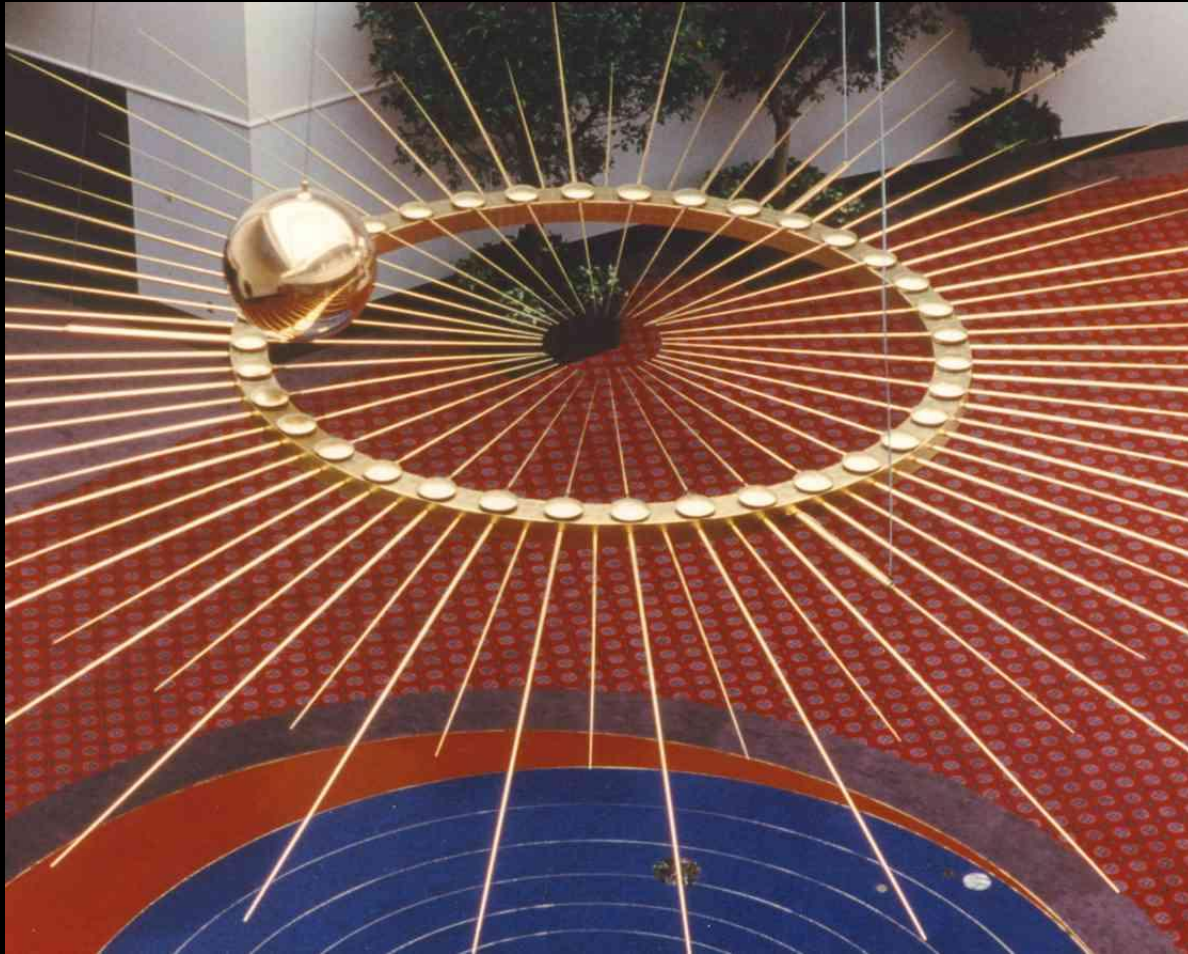


Why the red moon?

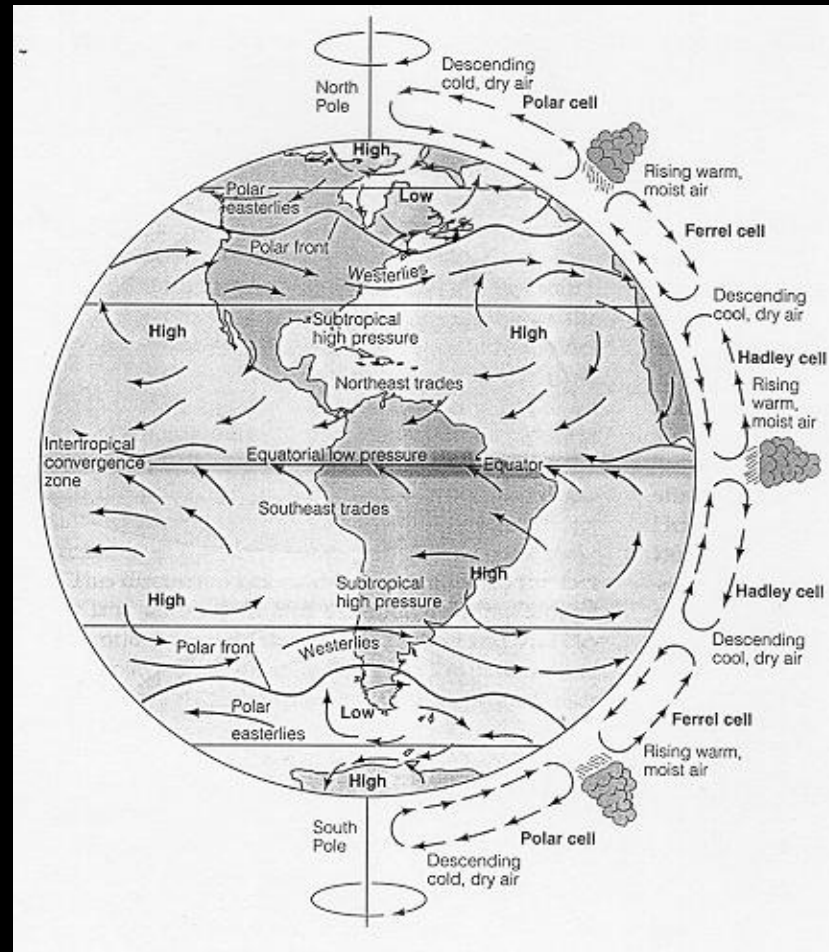
Earth's Rotation



Focault's Pendulum

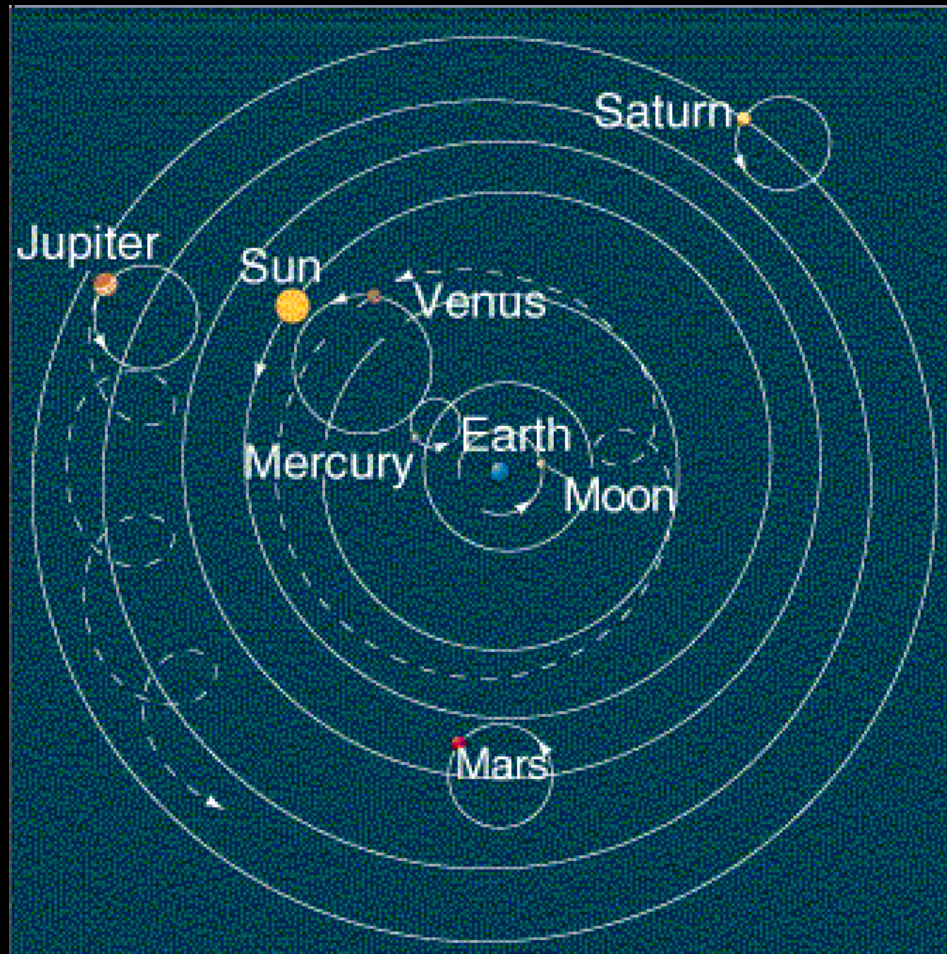


Wind Pattern



Coriolis Force?

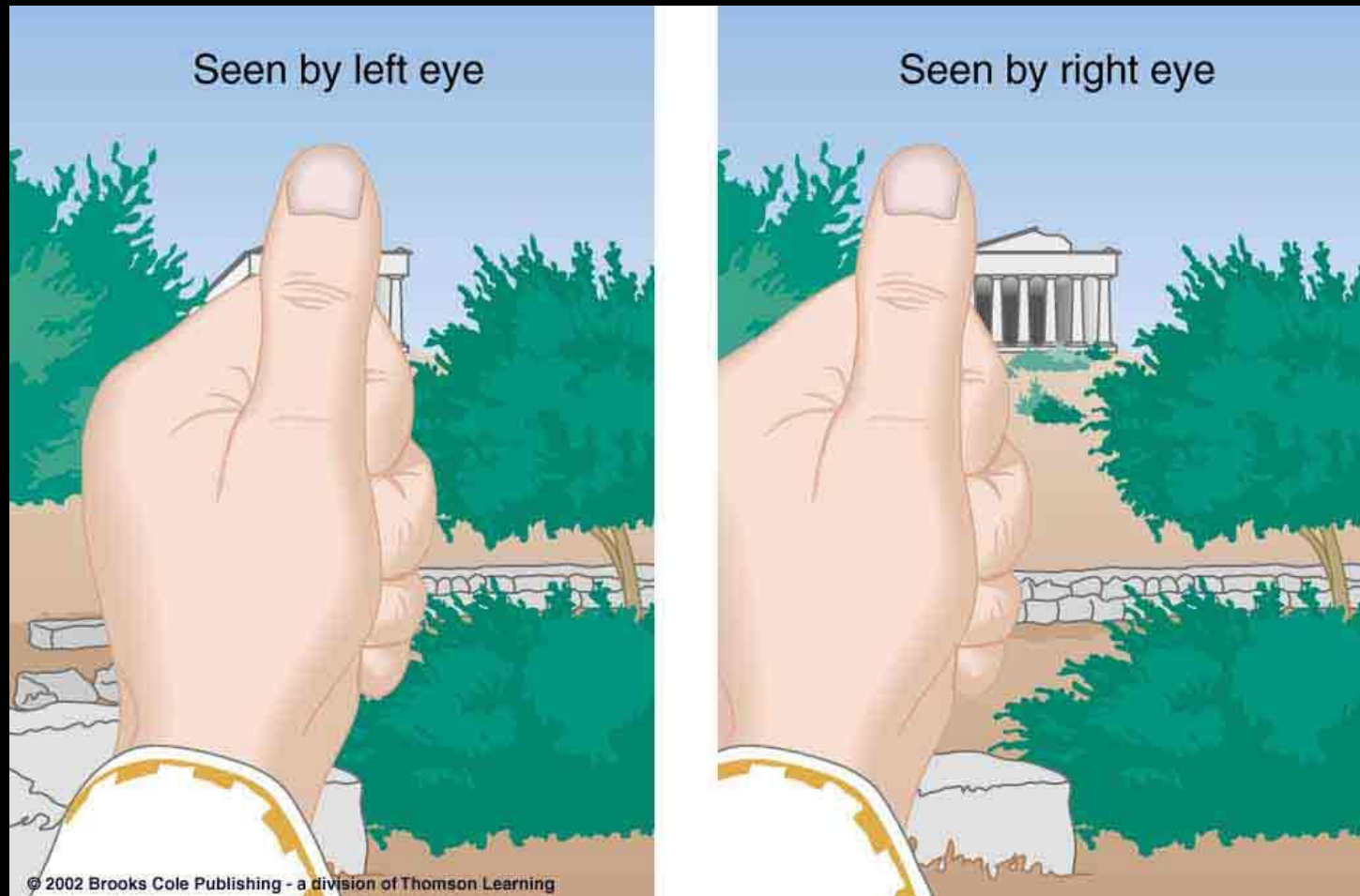
Geocentric Model



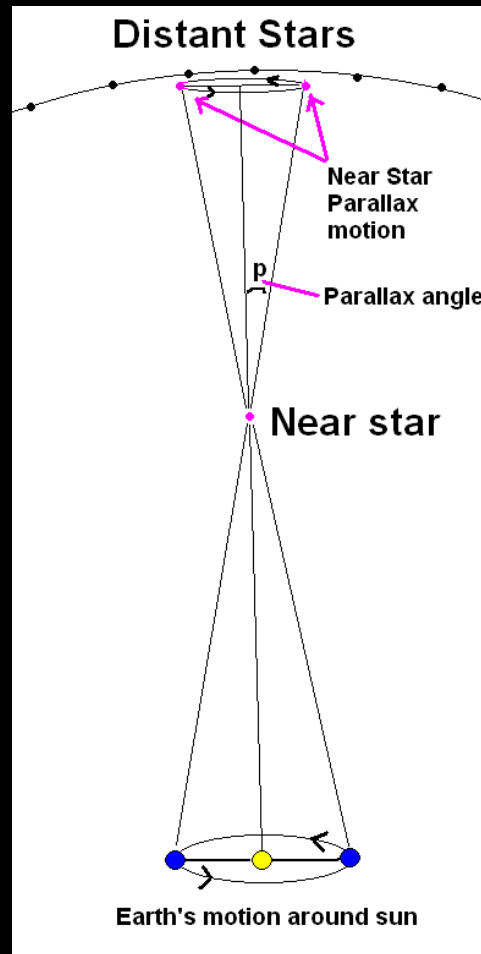
Earth's Revolution

- Movement of sun
- Stellar Parallax
- Starlight Aberration
- Spectral Shift in star's Spectrum.

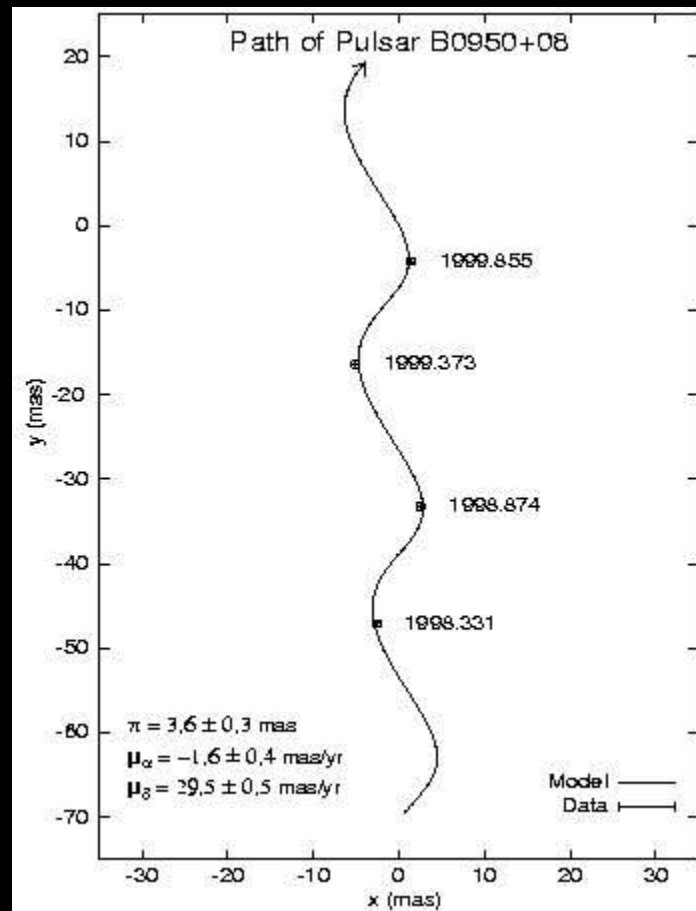
What is Parallax?



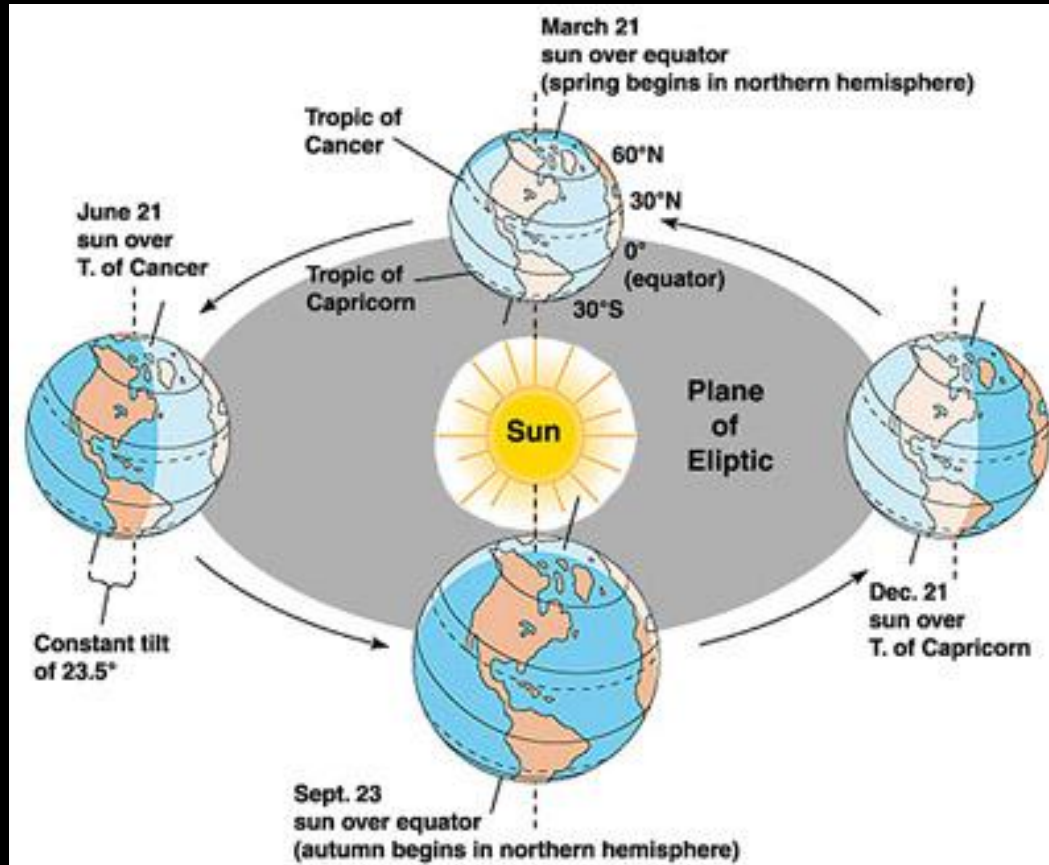
Stellar Parallax



Proper Motion + Parallax



Seasons



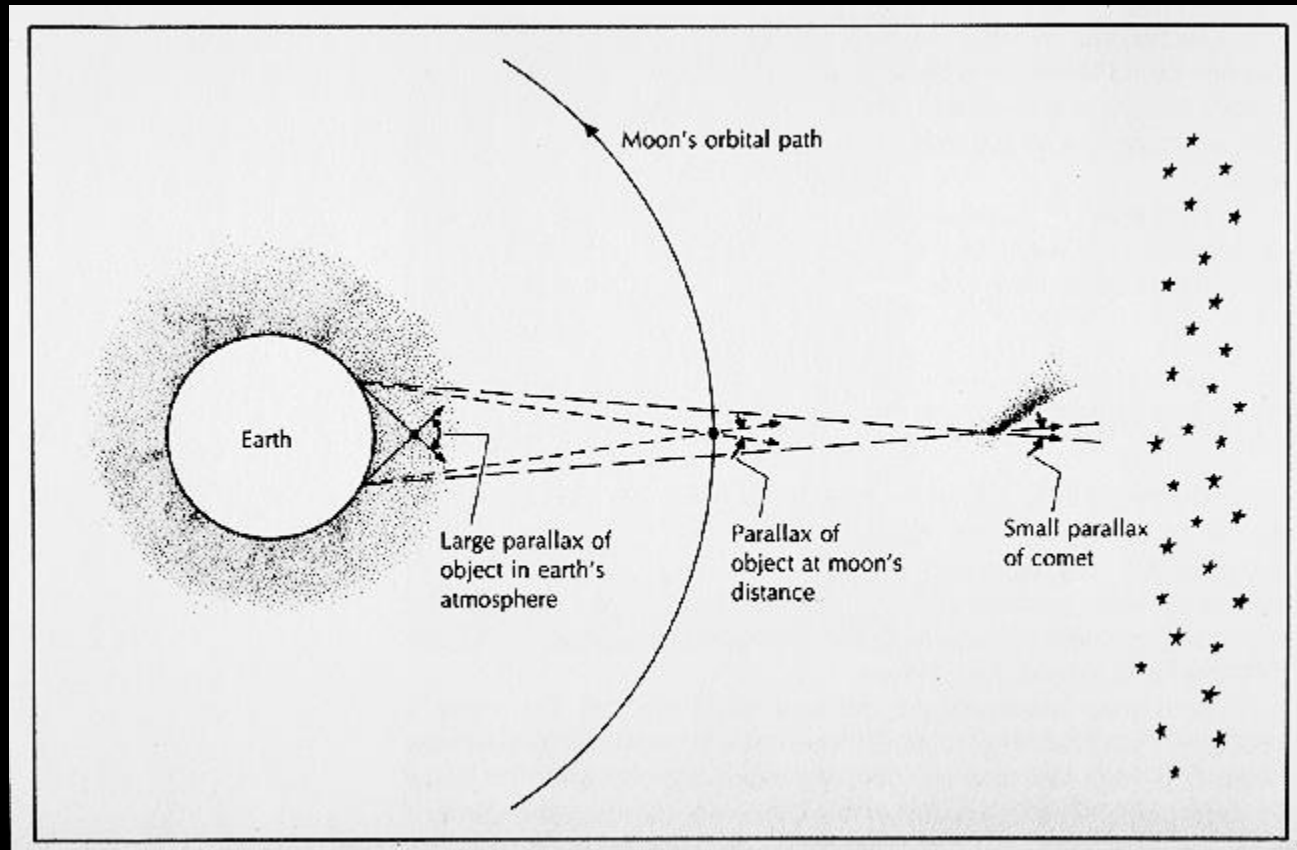
Why are Summers and Winters more extreme in the southern Hemisphere?

Moon

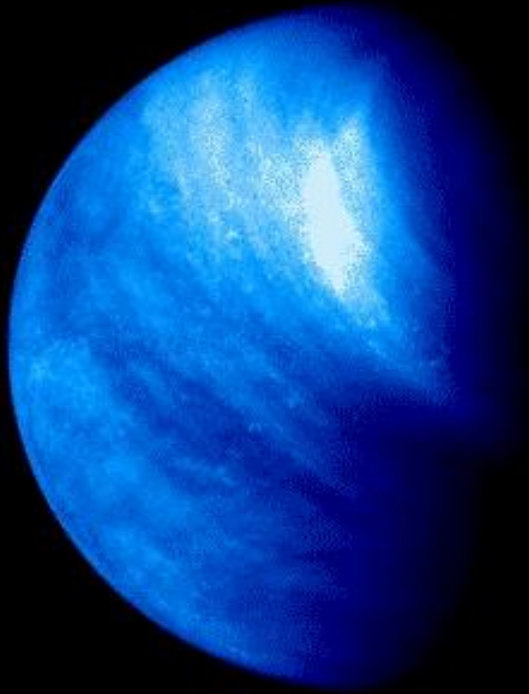


Does the Moon show the same Face?

Finding Distance to the Moon



Venus



Venus!

- Why does Venus show Crescent faces?
- Why is Venus an evening/Morning star?
- Why is Venus/Mercury always close to Sun
In the sky.

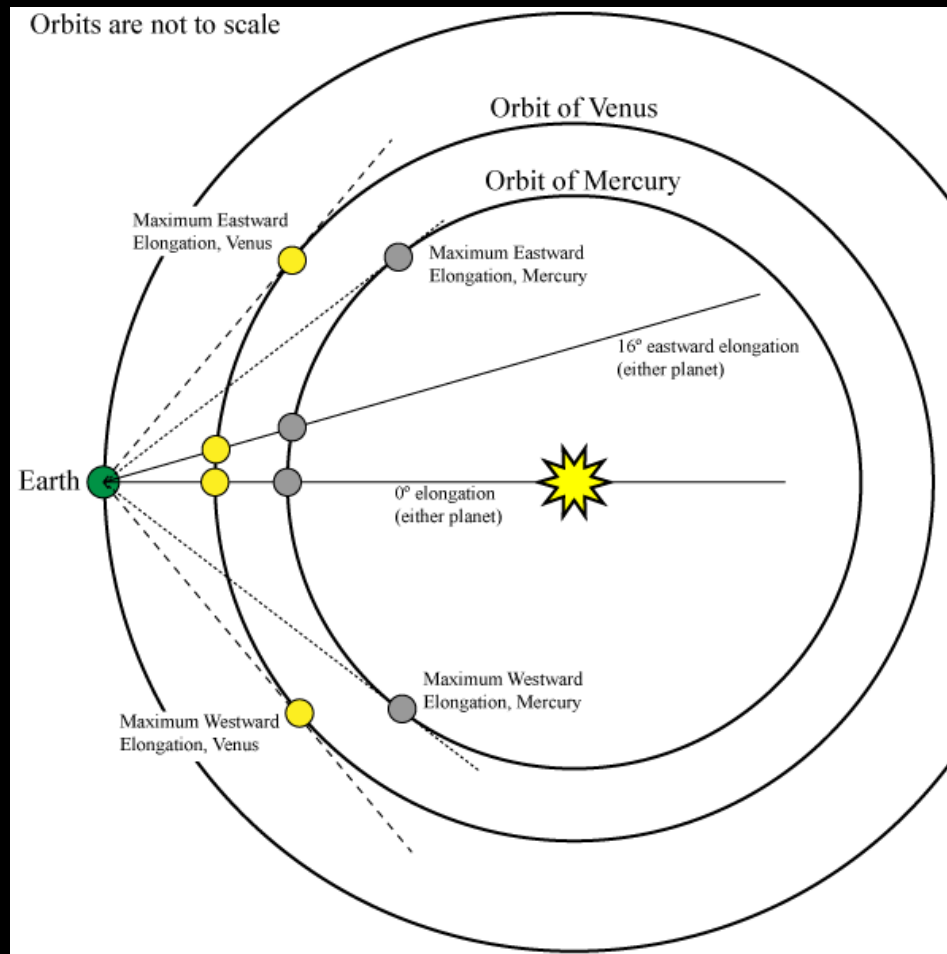
Venus Crescent



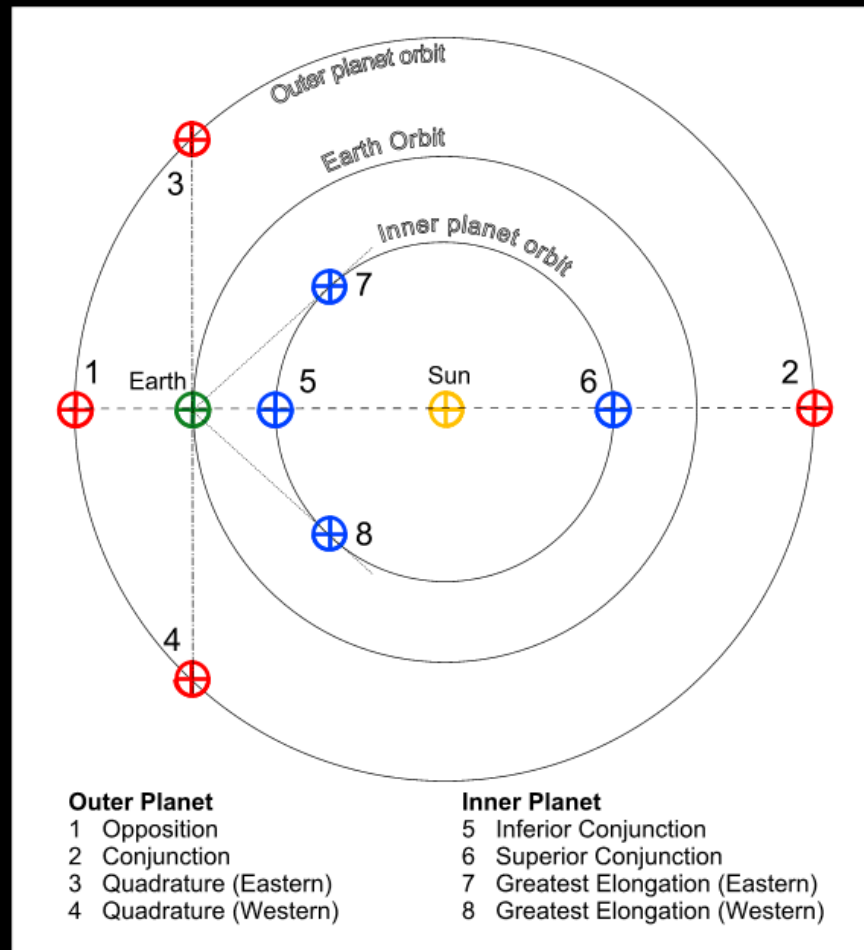
Venus,ISS Transit



Maximum elongation



Exterior Planets



Mars Retrograde

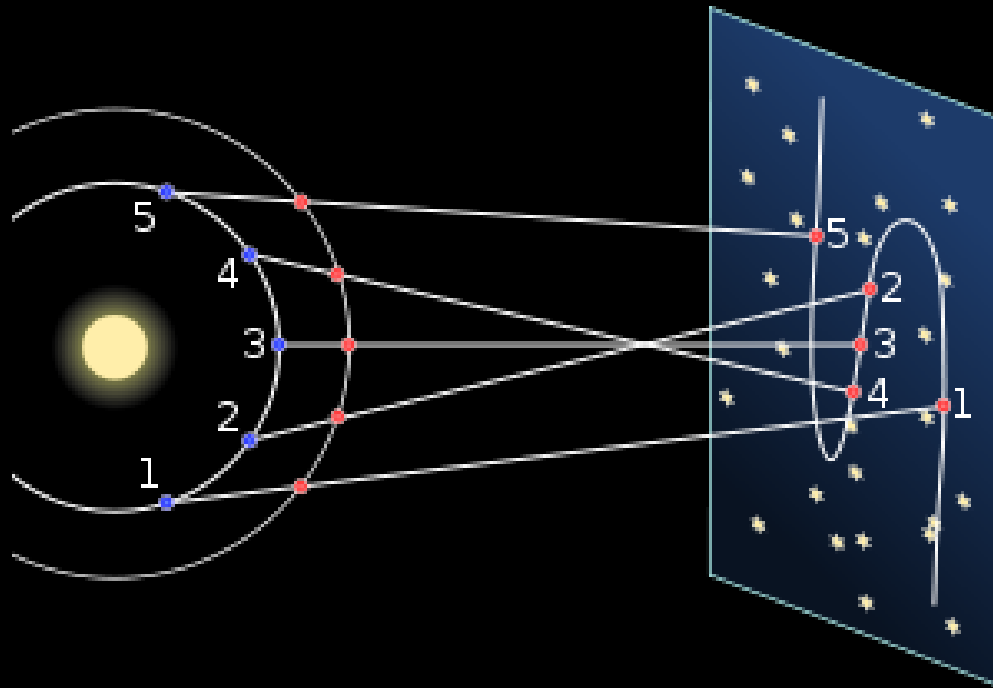


Mars retrograde



(C)2007-8 Tunç Tezel

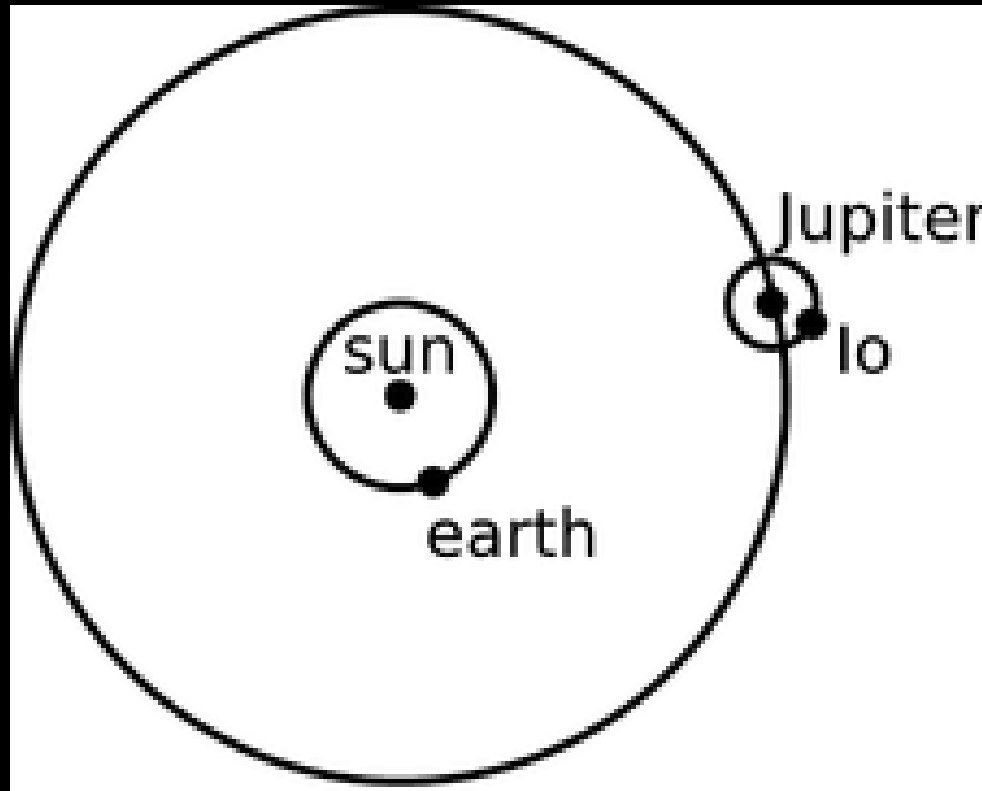
Retrograde Motion



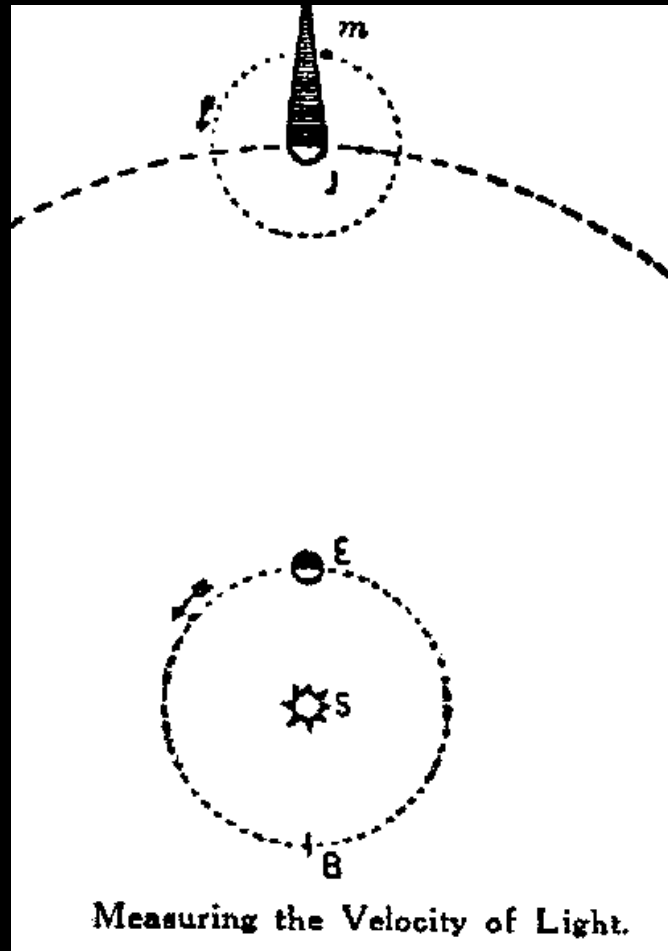
Jupiter, Galilean Satellites



Finding Speed of Light!



Roemer's Method of finding 'c'!

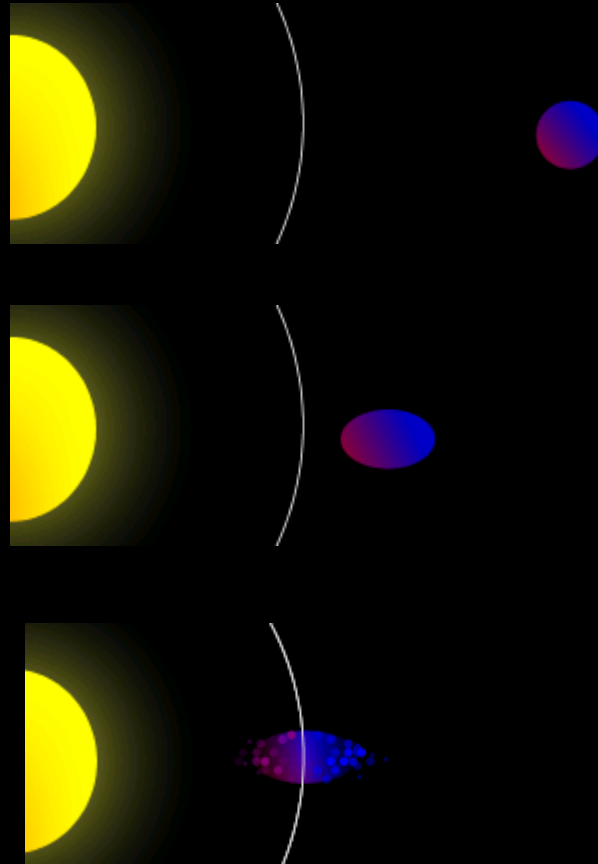


Saturn Rings

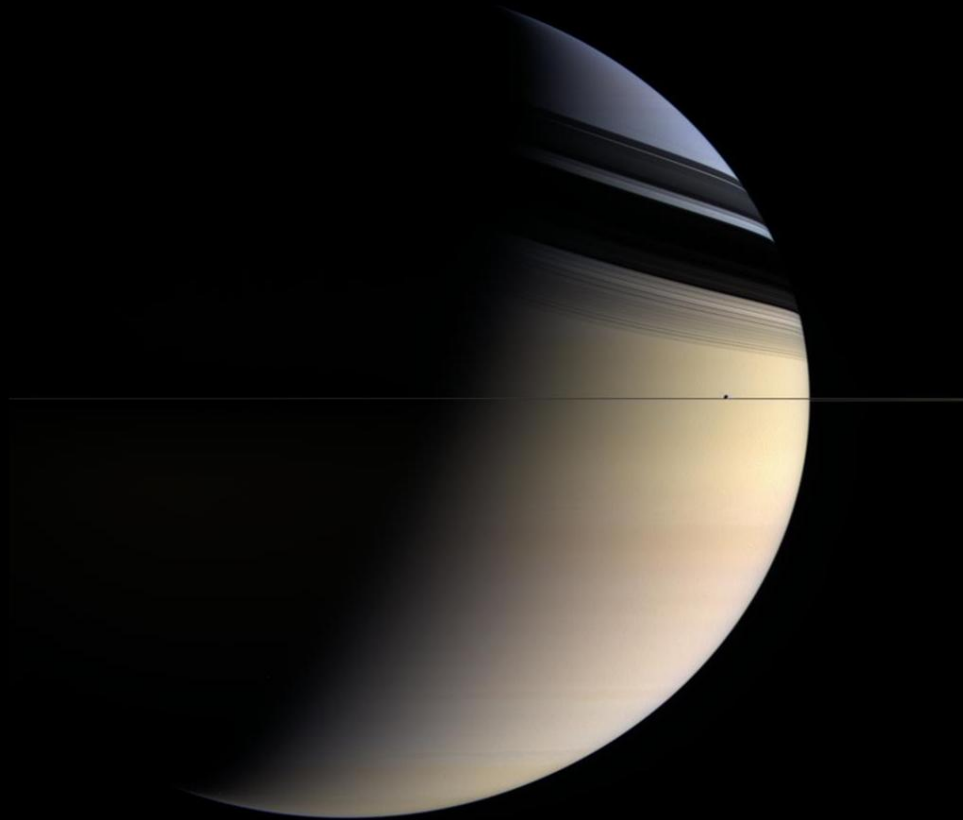


Why Saturn Has Rings?
And why the Gaps?

Roche Limit



Saturn Edge-on



Why Do Saturn's Rings Change Their Orientation?



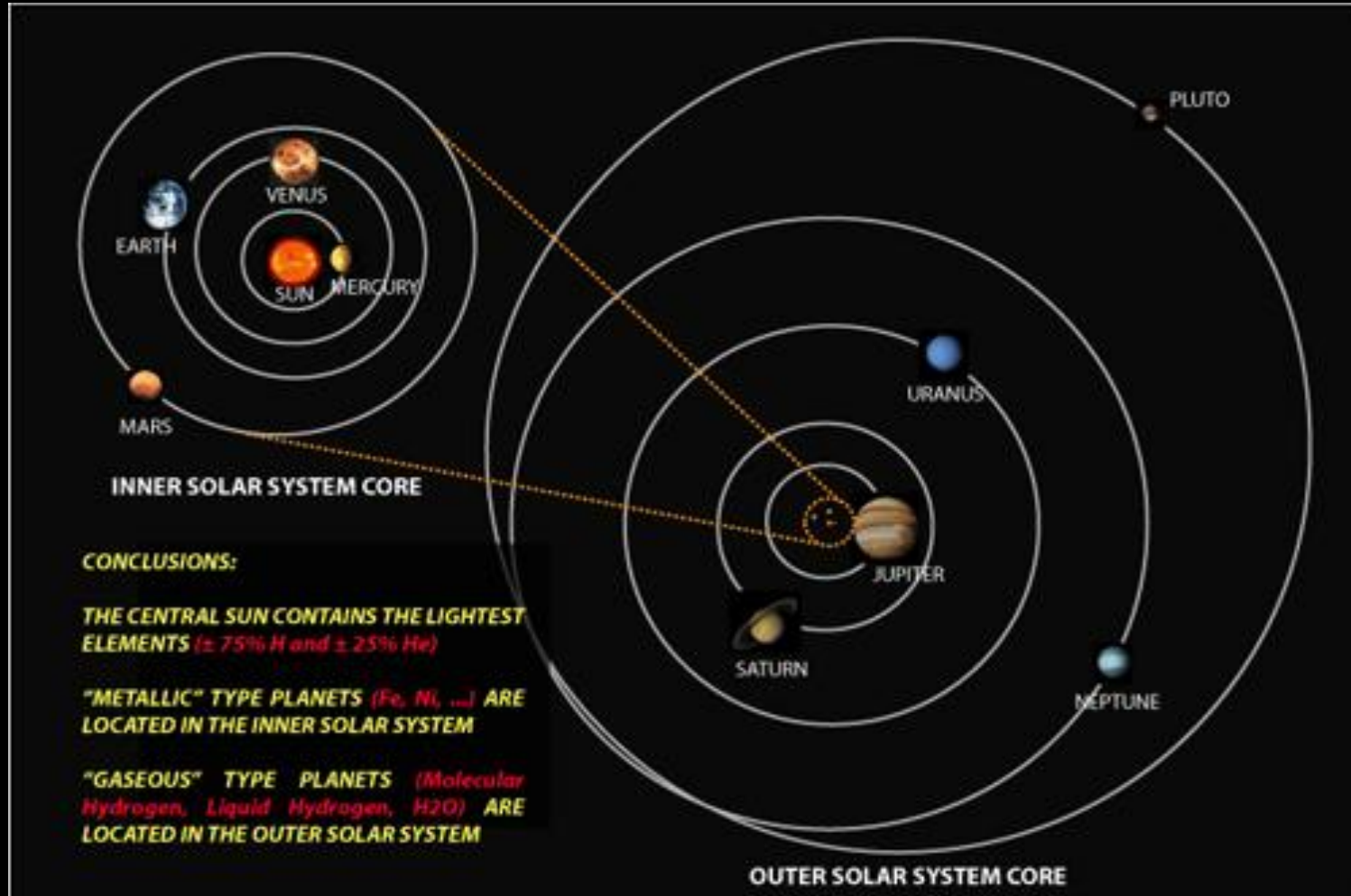
Meteor Shower



What are meteors?

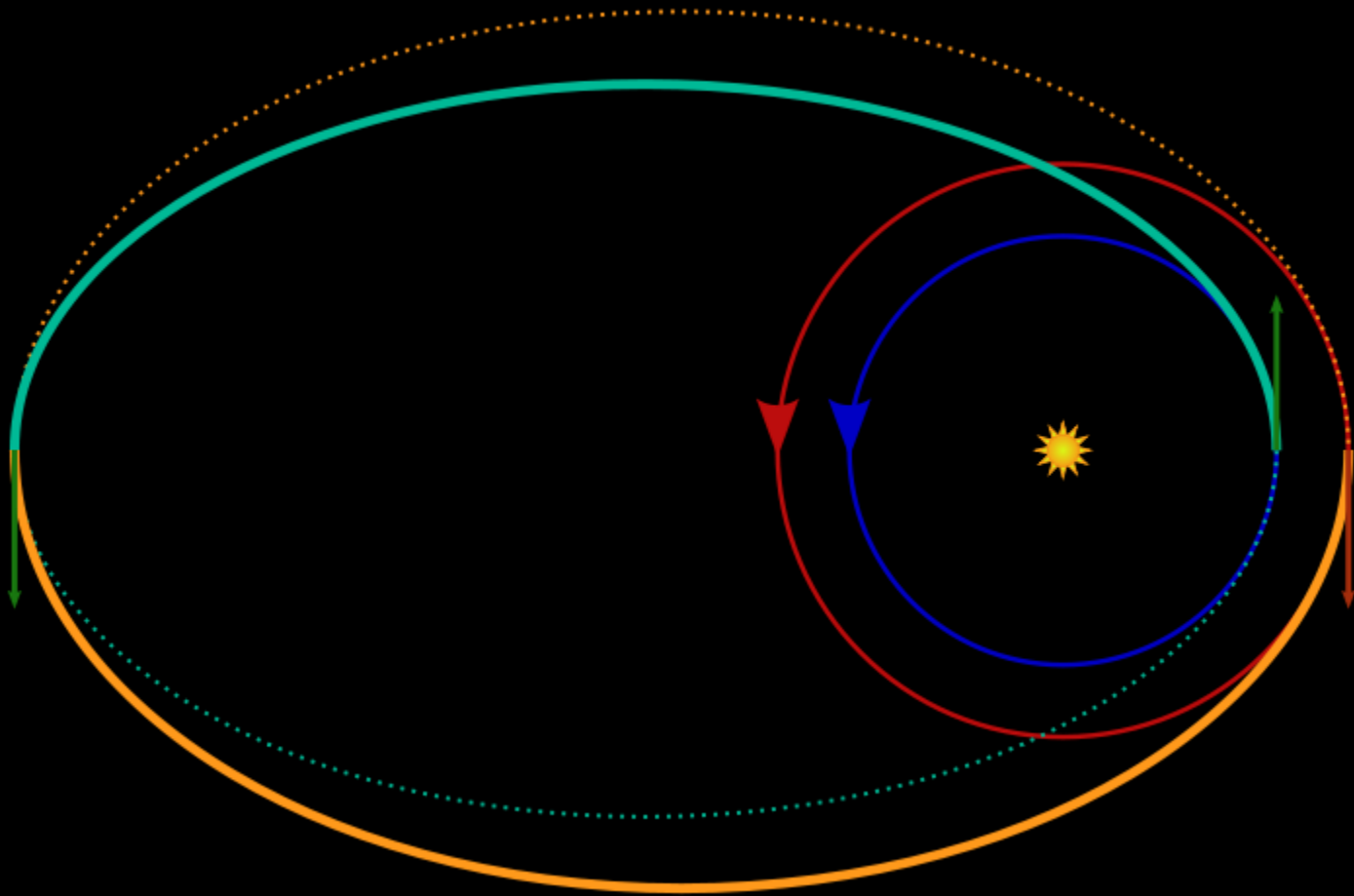
Why is the shower prominent in the Mornings than in the evenings?

Solar System ,the way it is

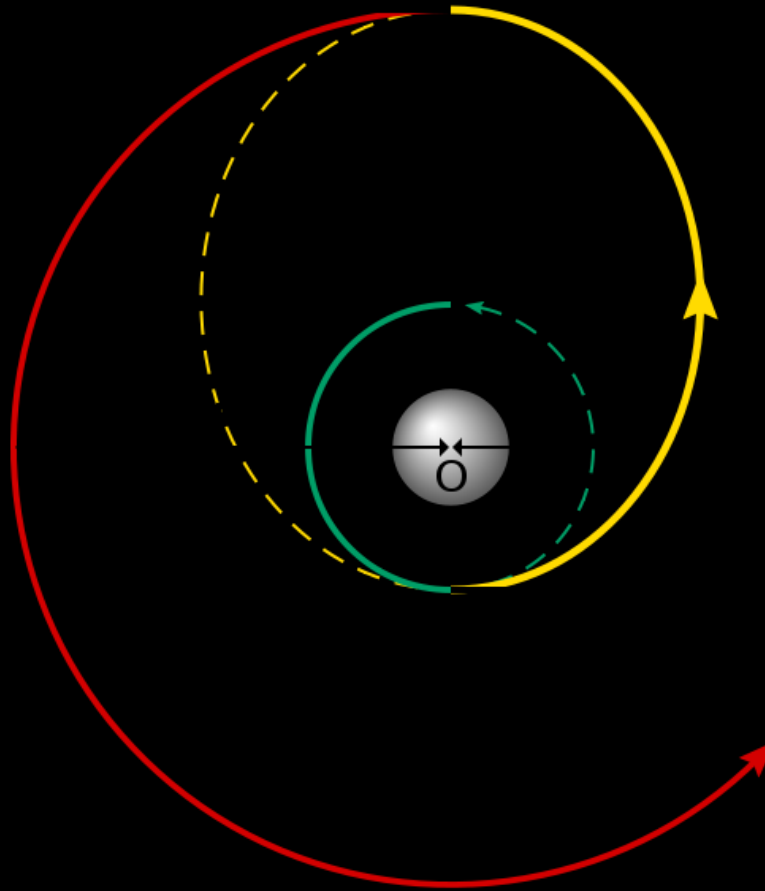


Oops, Pluto still there...!

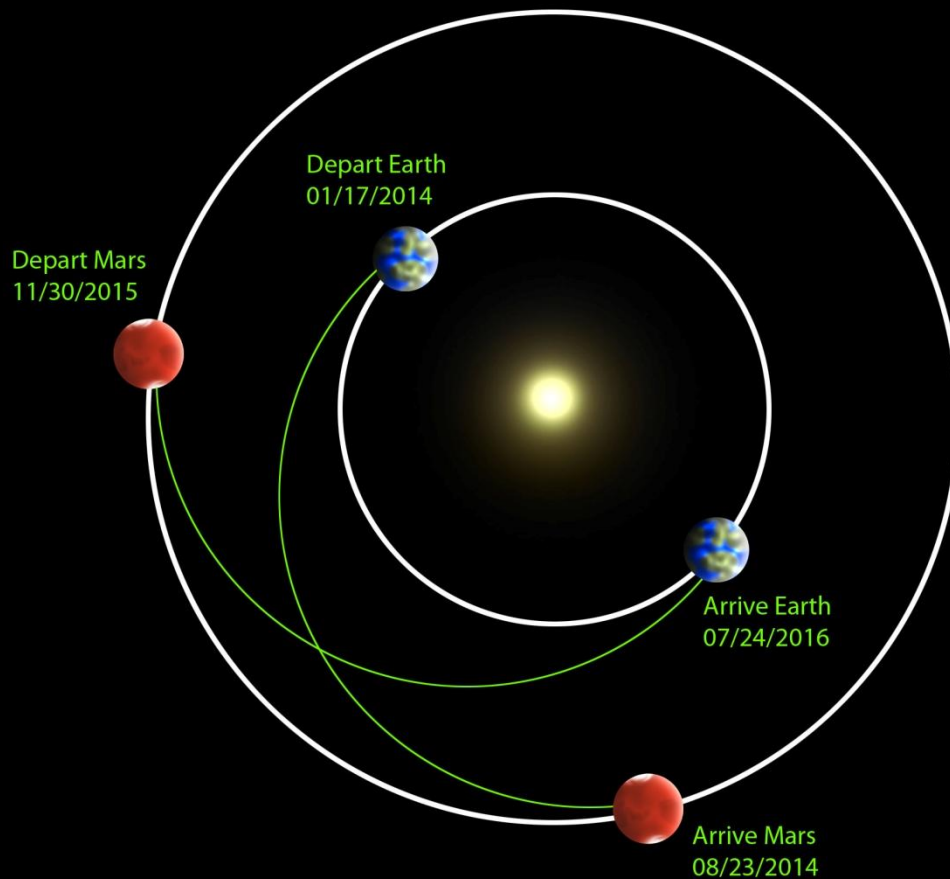
Transfer orbit



Hohmann Transfer Orbits



How to plan the Transfer?



Mission Times

Outbound 224 Days

Stay 458 Days

Return 237 Days

Total:

919 Days

