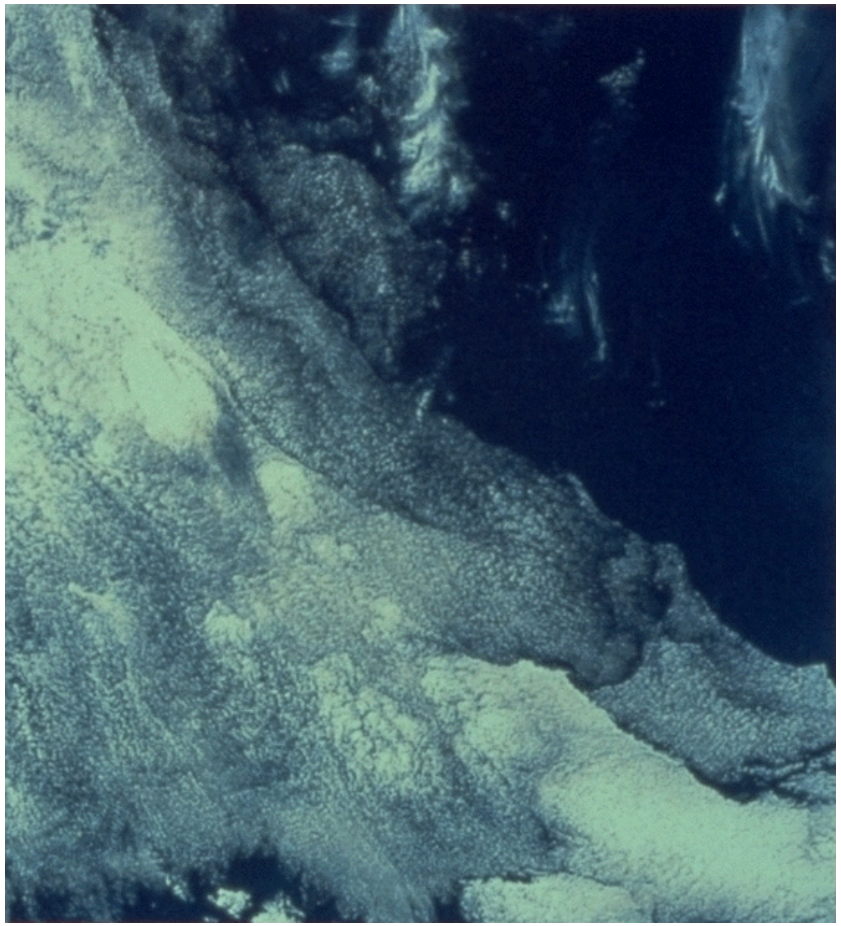
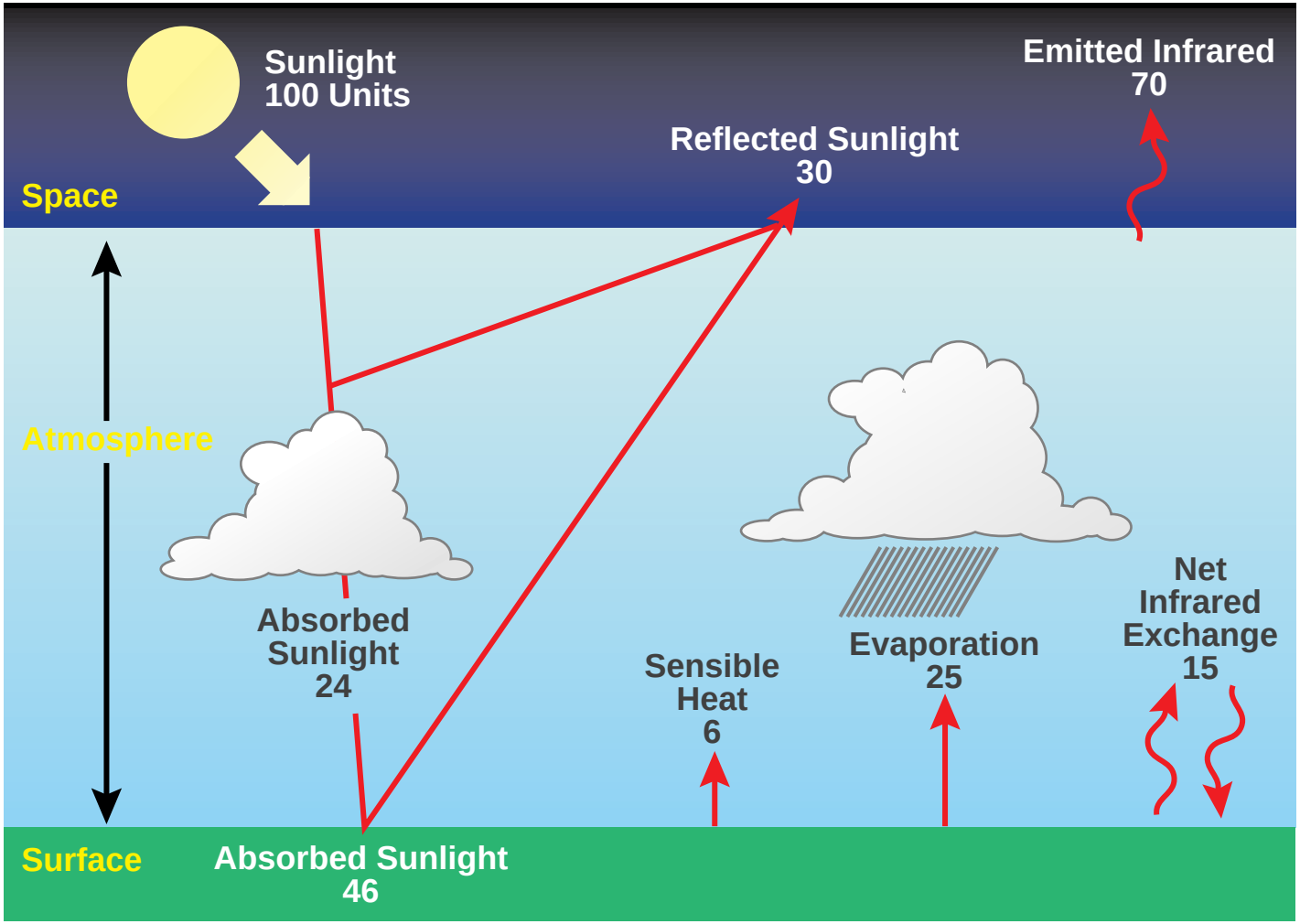
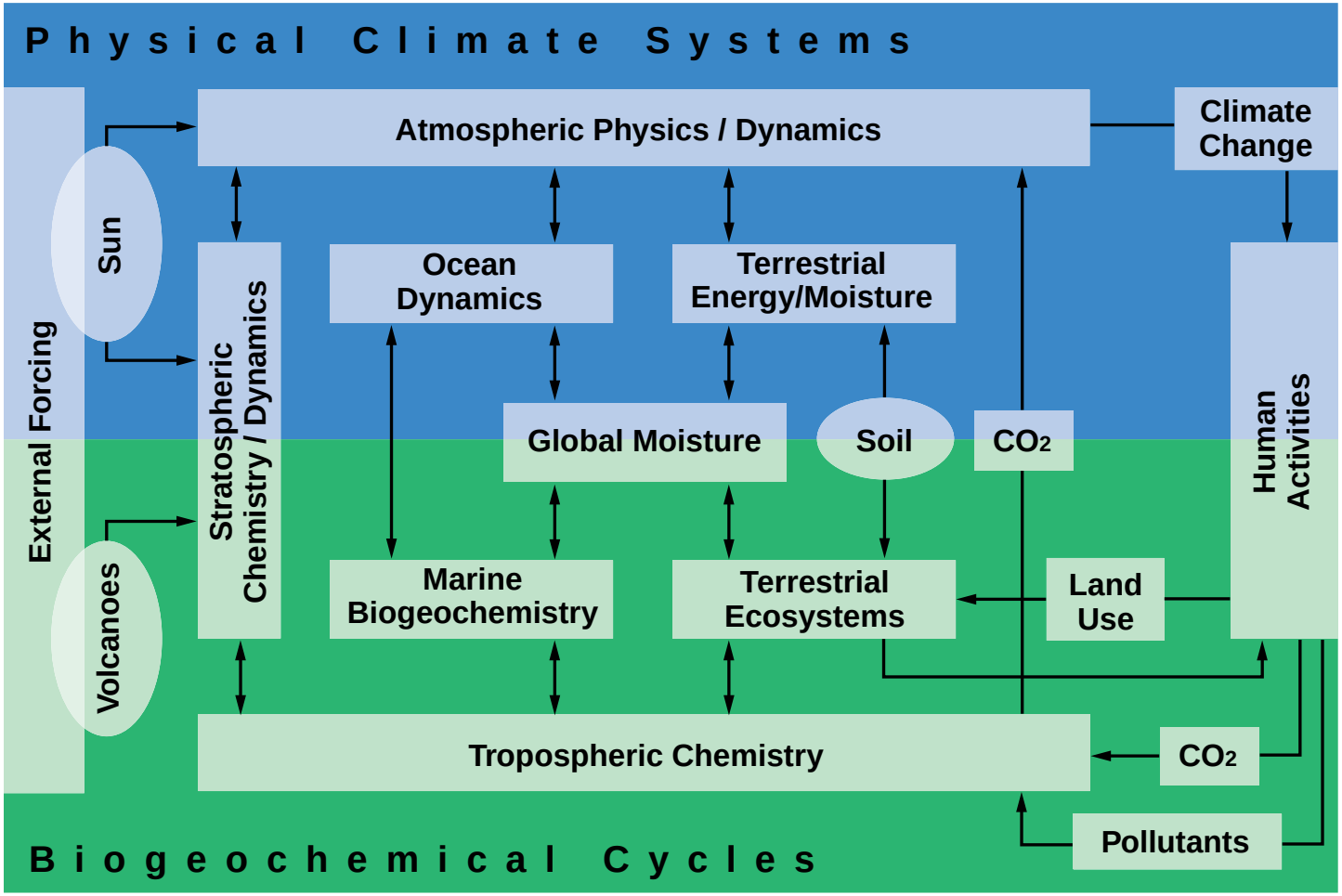
Marine Stratocumulus: Induced Cooling



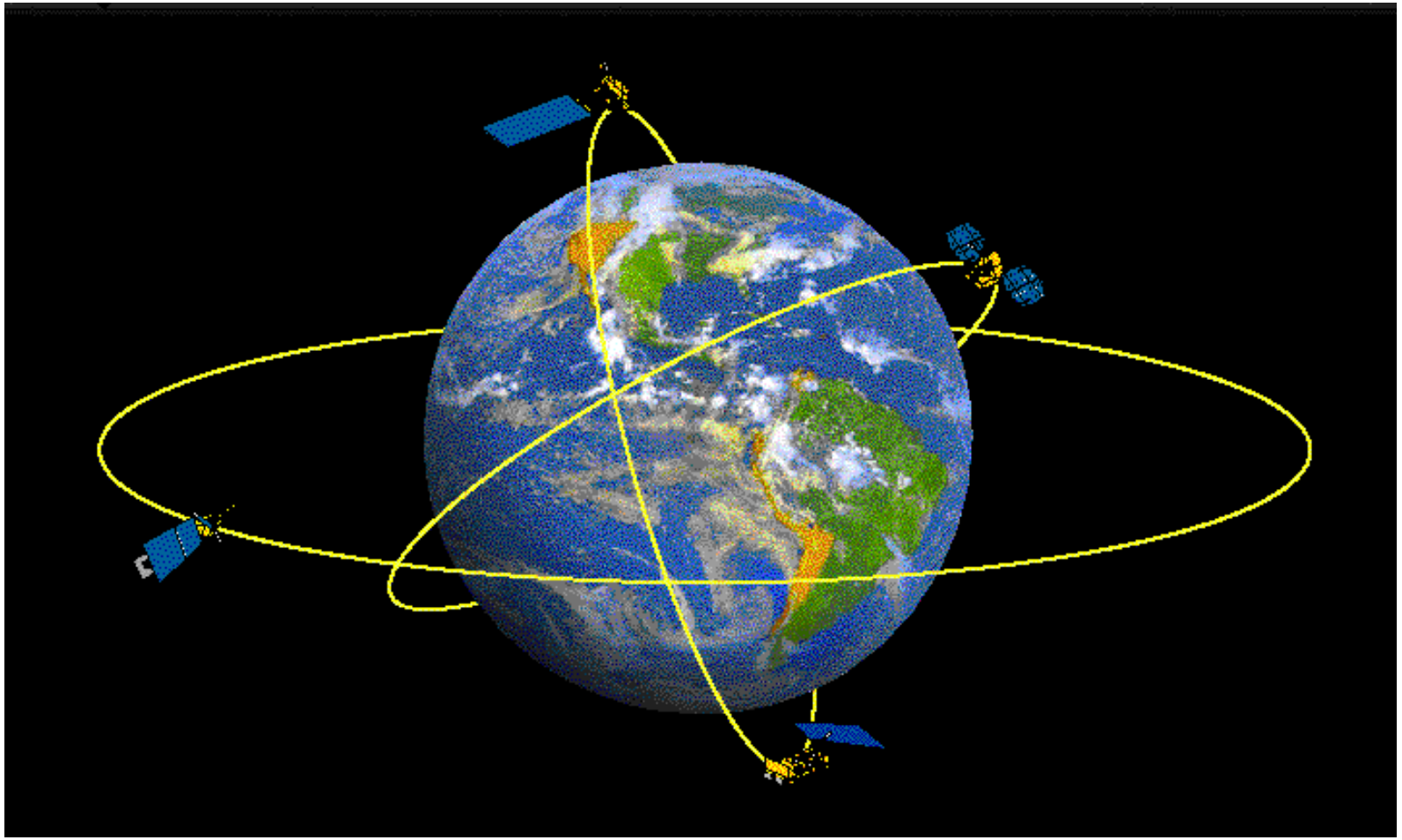
Global Energy Balance



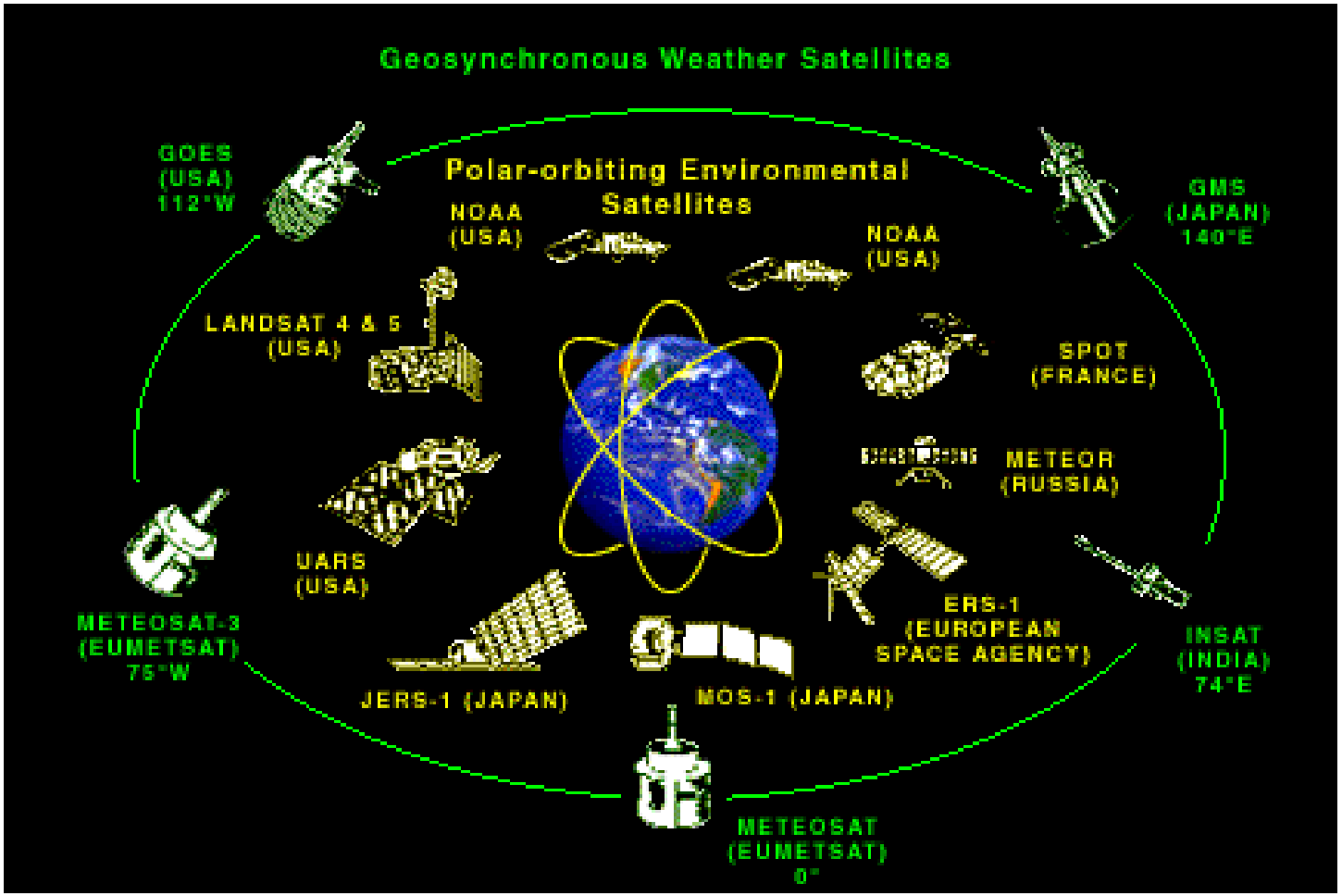
Earth System Wiring Diagram



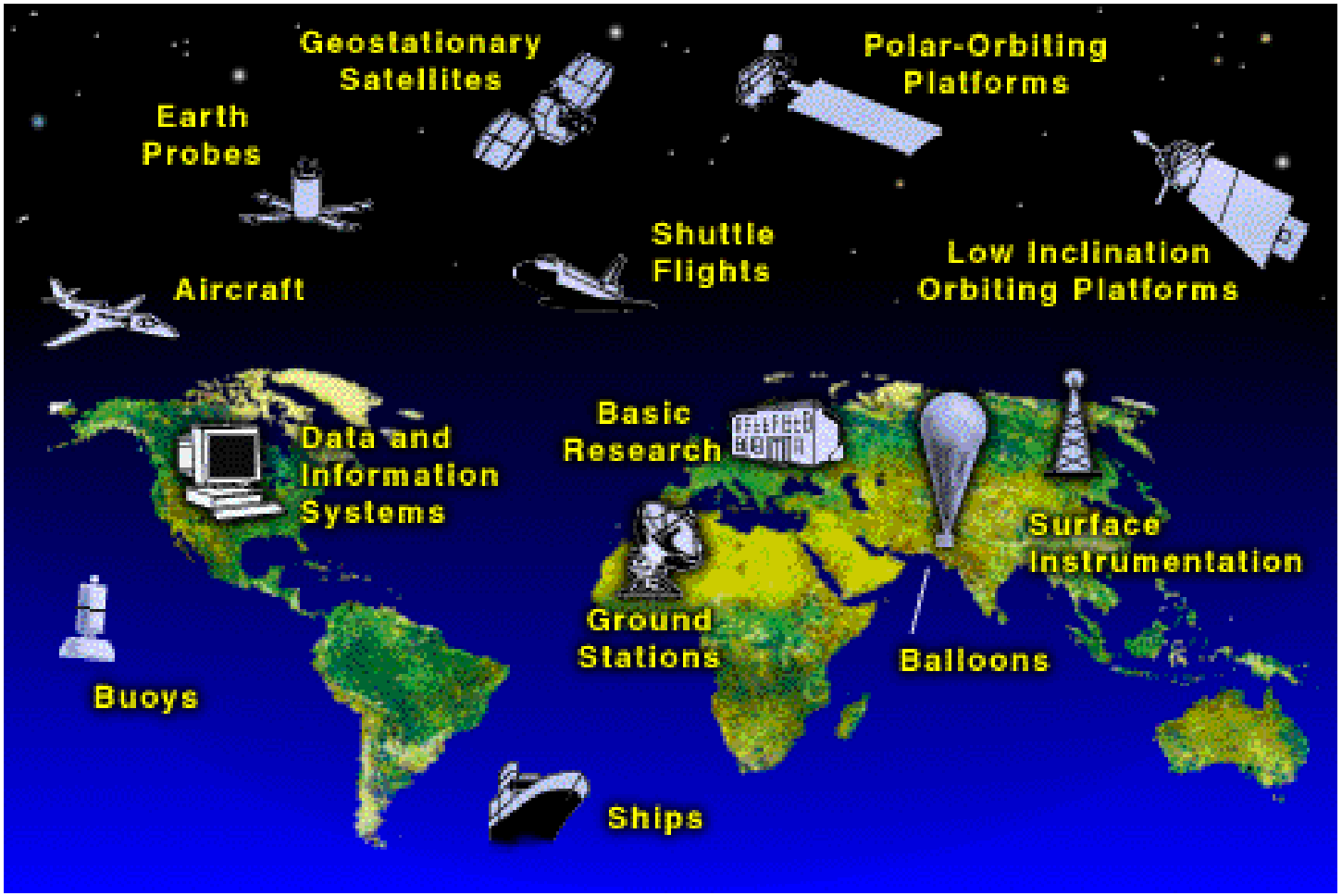
The Three Fundamental Orbits



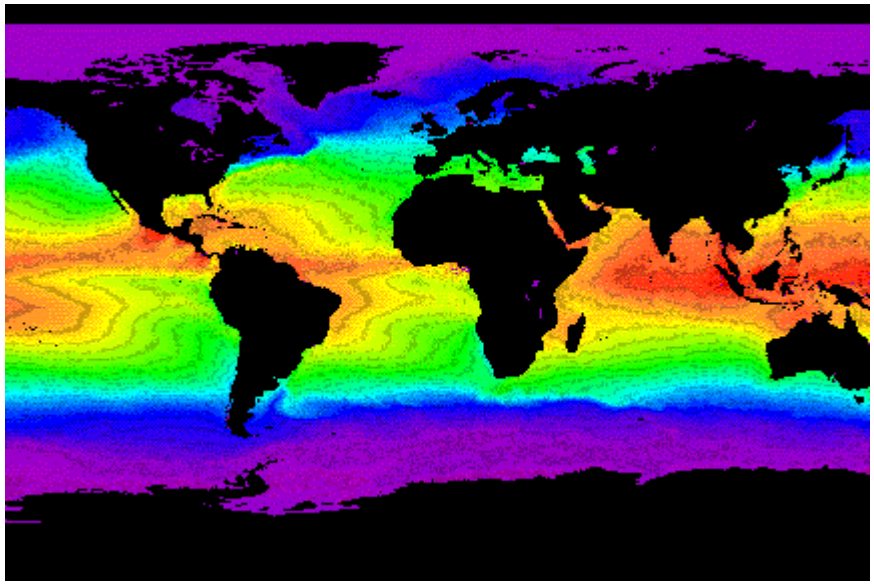
The Existing Constellation

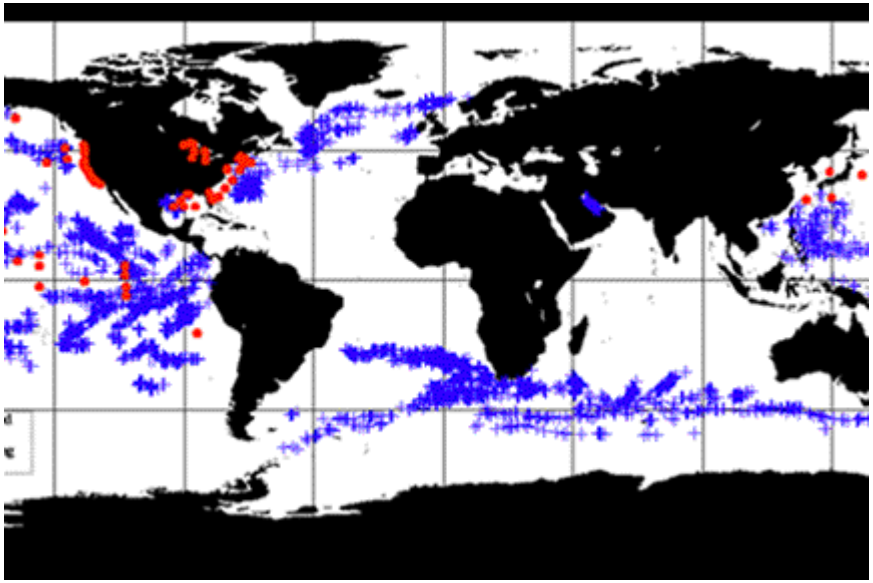


The Elements of MTPE

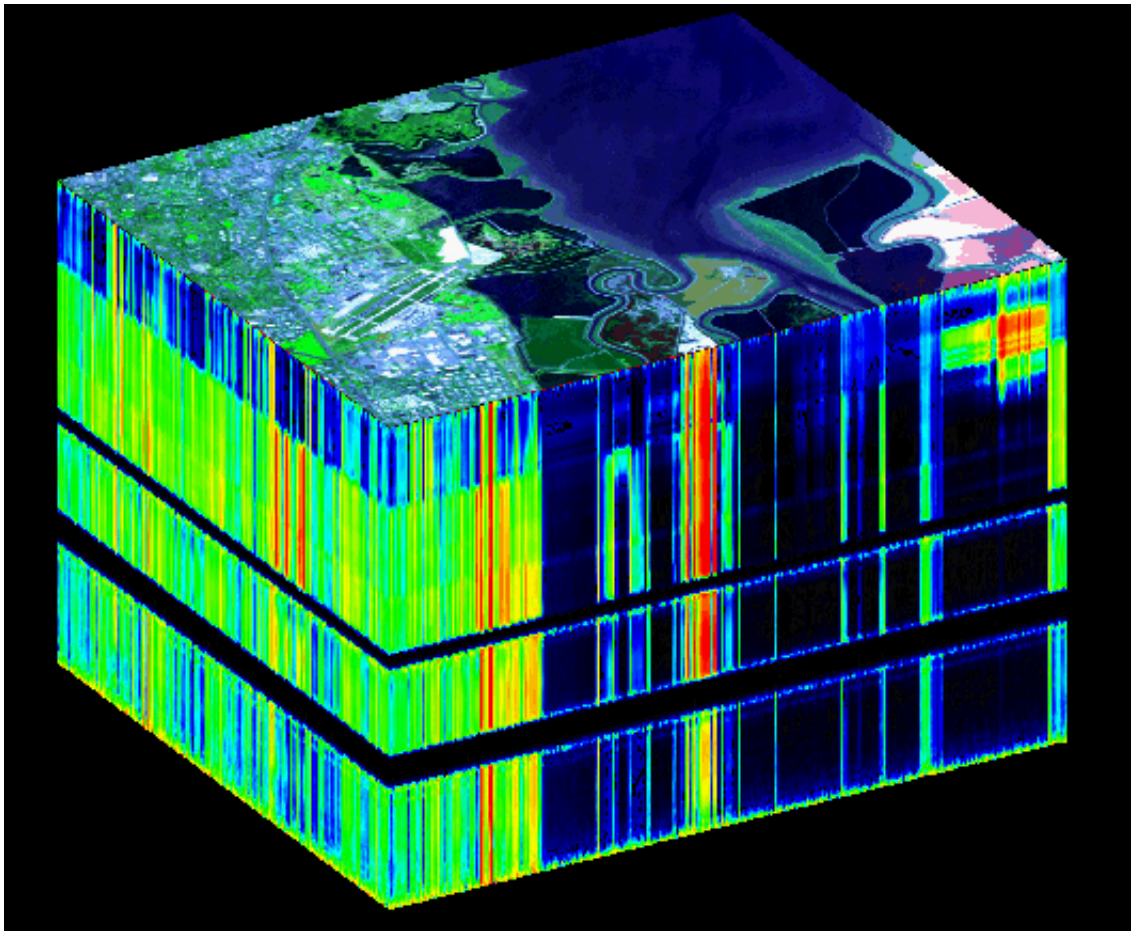


Advantages of EOS Satellites





Multispectral Sampling

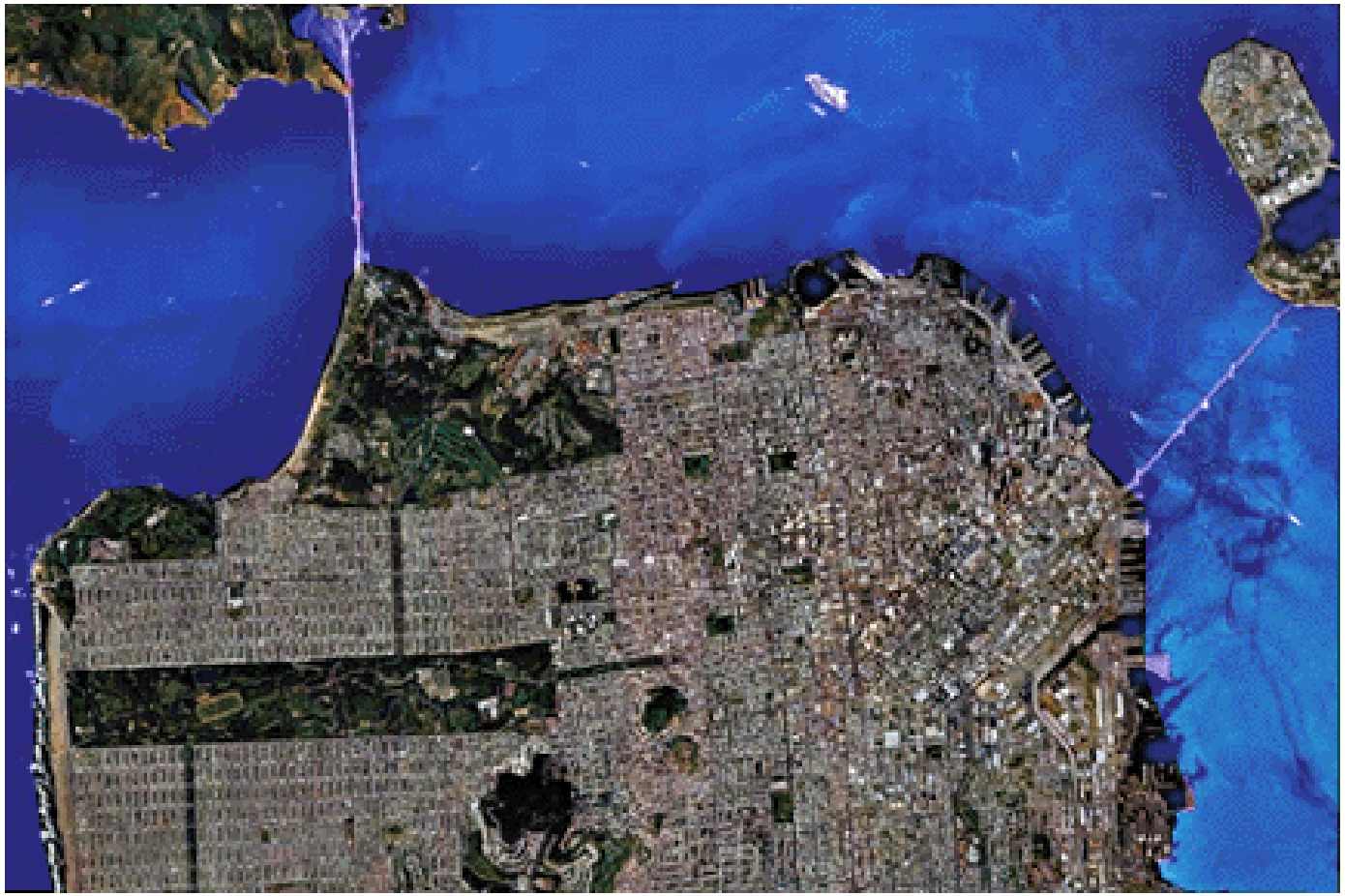


Multiscale Sampling 1

Multiscale Sampling 2

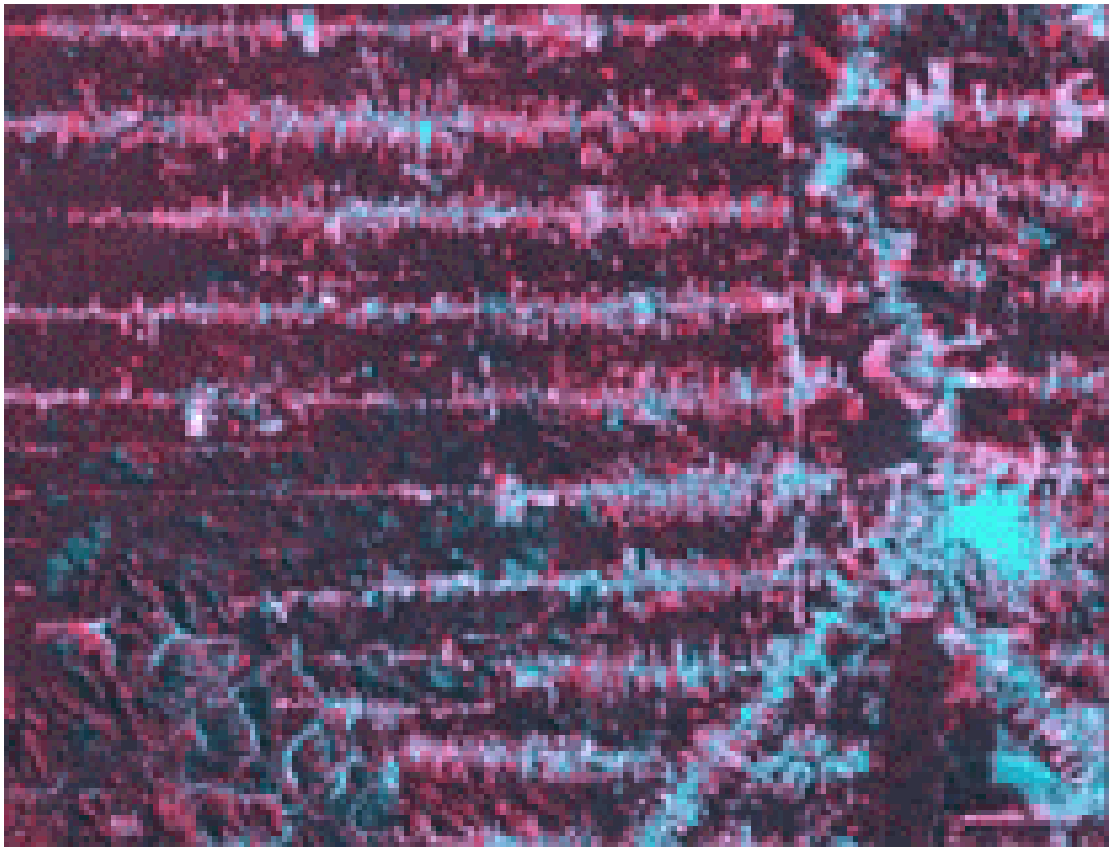
Multiscale Sampling 3

Multiscale Sampling 4

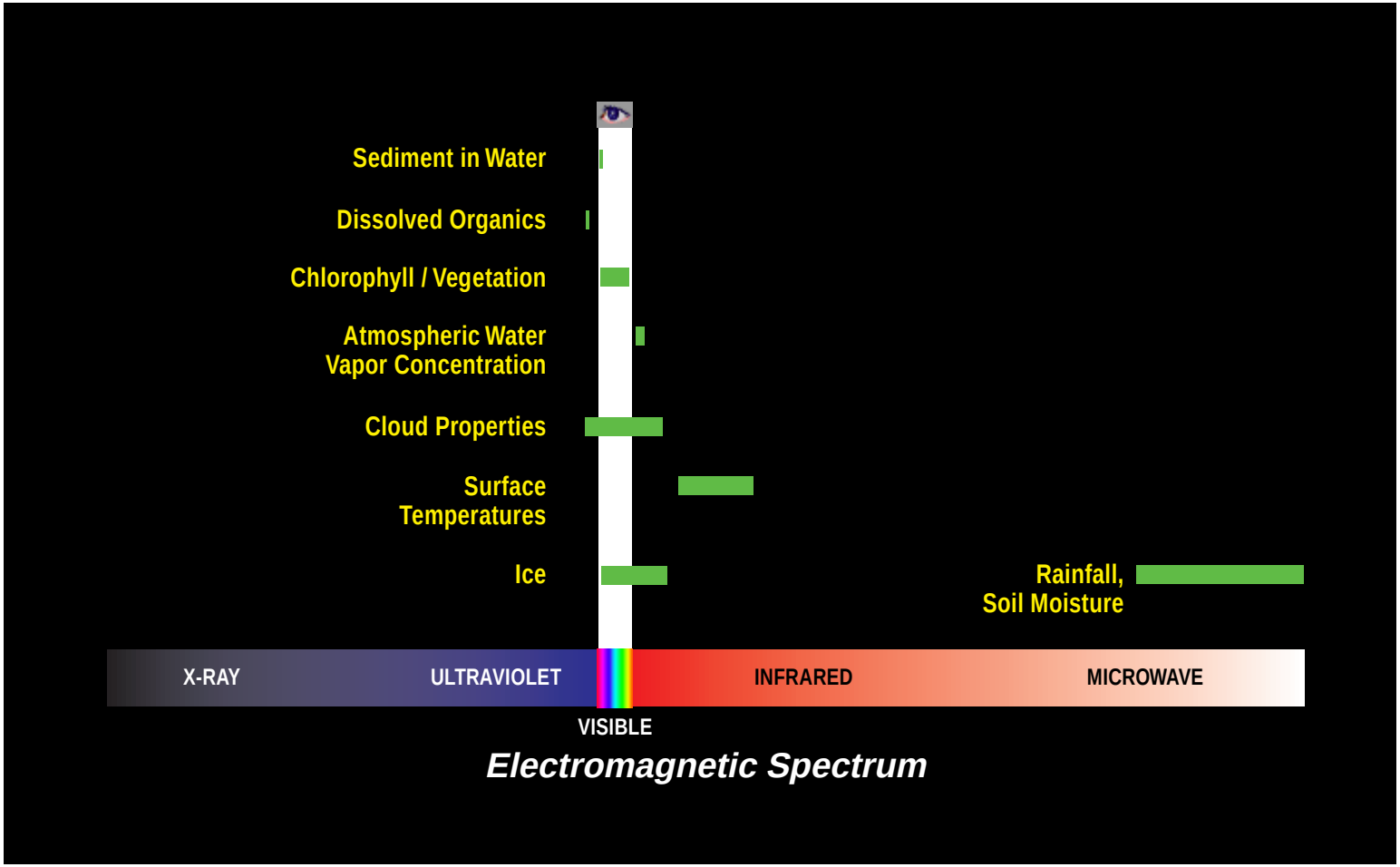


Multiscale Sampling 5

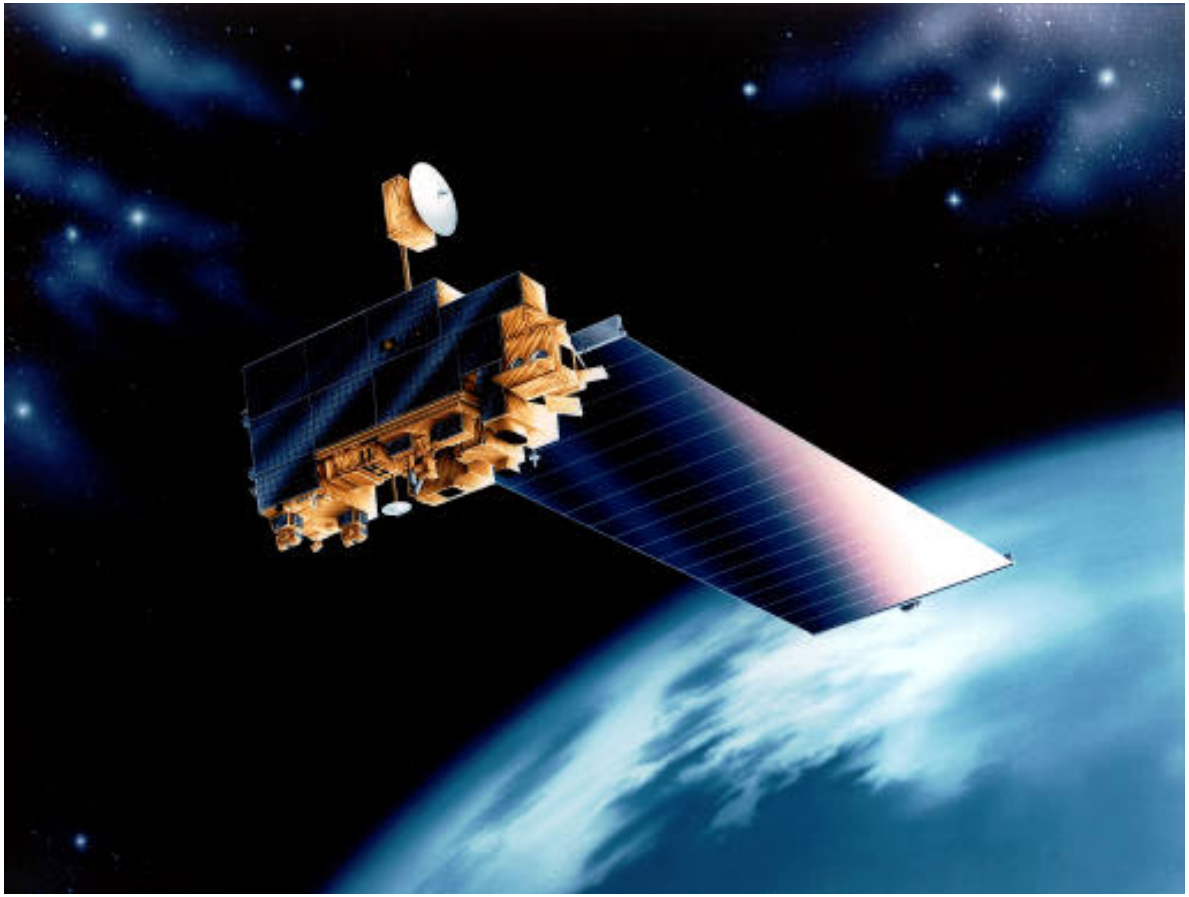
Multitemporal Sampling



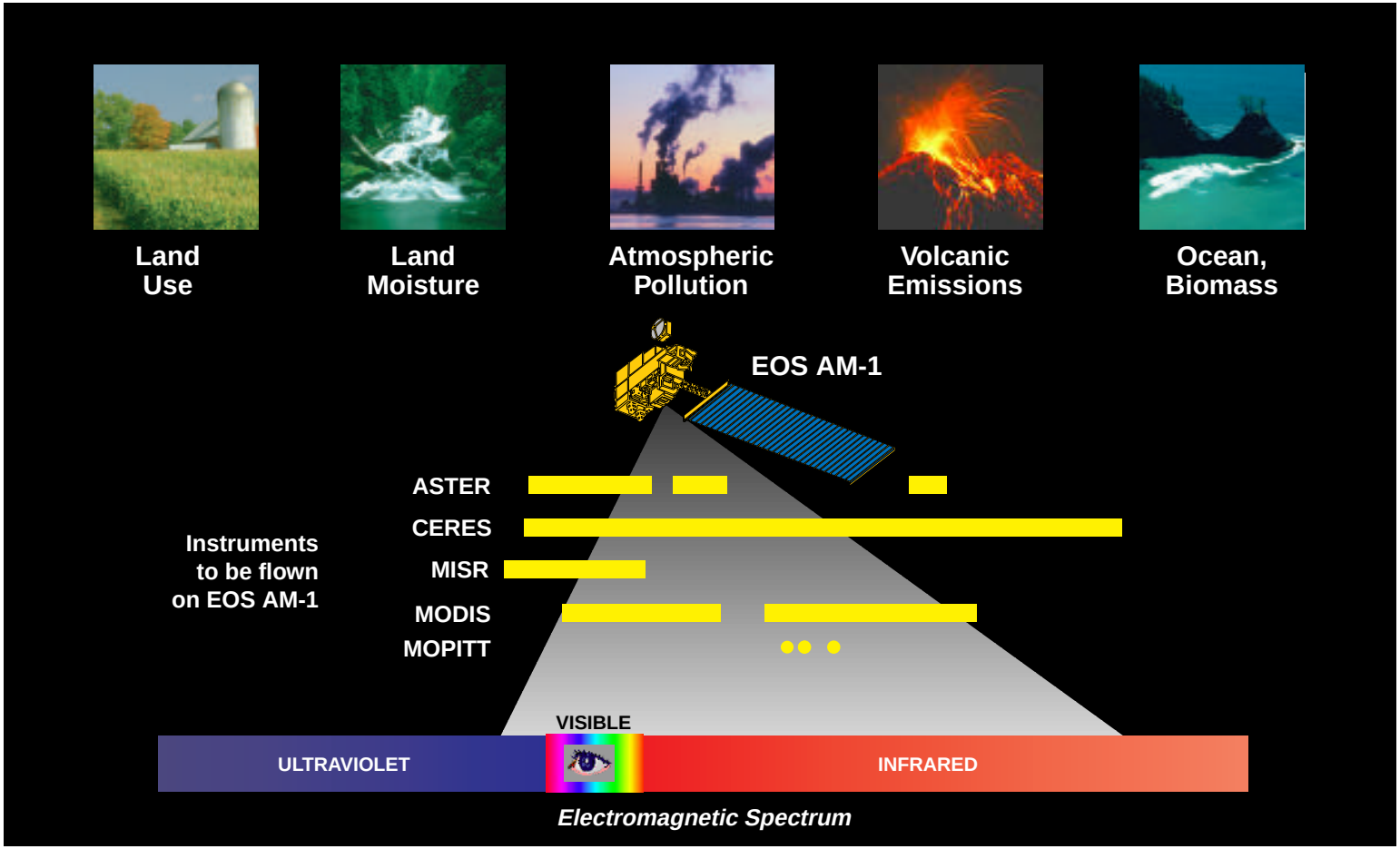
Remote Sensing and the Electromagnetic Spectrum



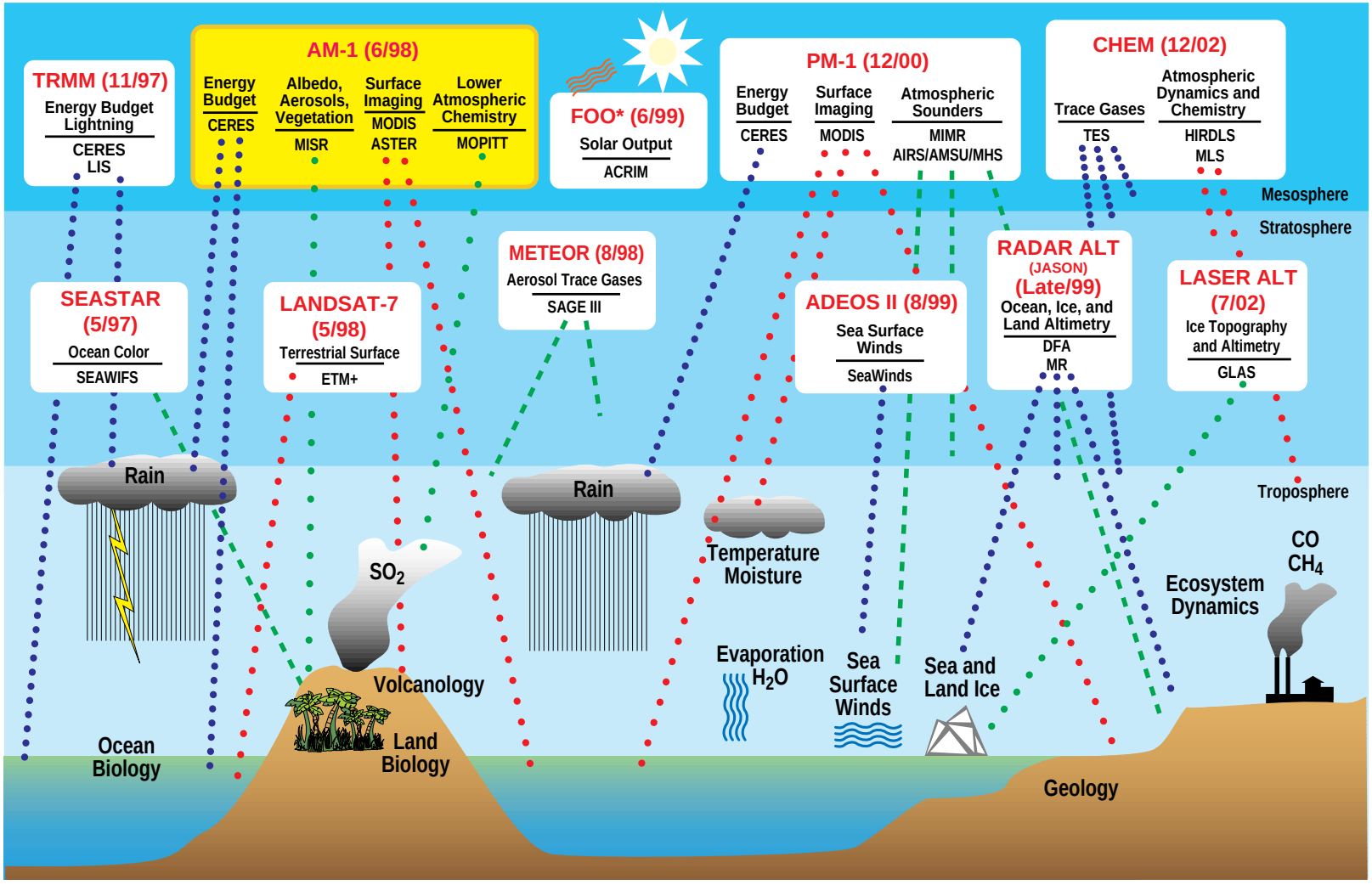
EOS AM-1



EOS Morning Crossing Mission - 1998



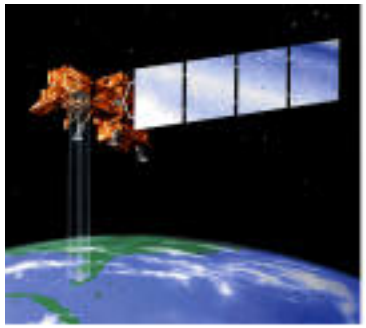
EOS Constellation



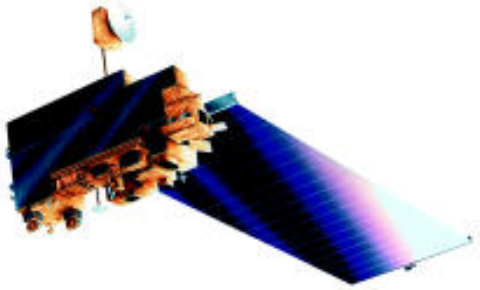
*FOO = Flight of Opportunity

Landsat 7 / EOS AM1 Common Orbit

Landsat 7 Launch - May 1998	EOS AM1 Launch - June 1998



Landsat 7 Launch - May 1998

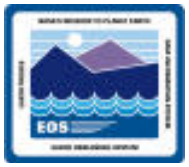


EOS AM1 Launch - June 1998

ORBITAL CHARACTERISTICS

Orbit:	**705 km altitude sun-sychronous**
Orbit Inclination:	**98.3 degrees from equator**
Oribit Period:	**98.8 minutes**
Equator Crossing:	**Landsat 7 - 10:00 AM; EOS AM1 - 10:30 AM**
Ground Track Repeat Cycle:	**16 days**

The Landsat 7 and EOS AM1 Instruments



Landsat 7

ETM+ Enhanced Thematic Mapper

EOS AM1

ASTER Advanced Spaceborne Thermal Emission and Reflection Radiometer

MODIS Moderate-Resolution Imaging Spectroradiometer

MISR Multi-angle Imaging Spectroradiometer

MOPITT Measurements of Pollution in the Troposphere

CERES Clouds and the Earths Radiant Energy System