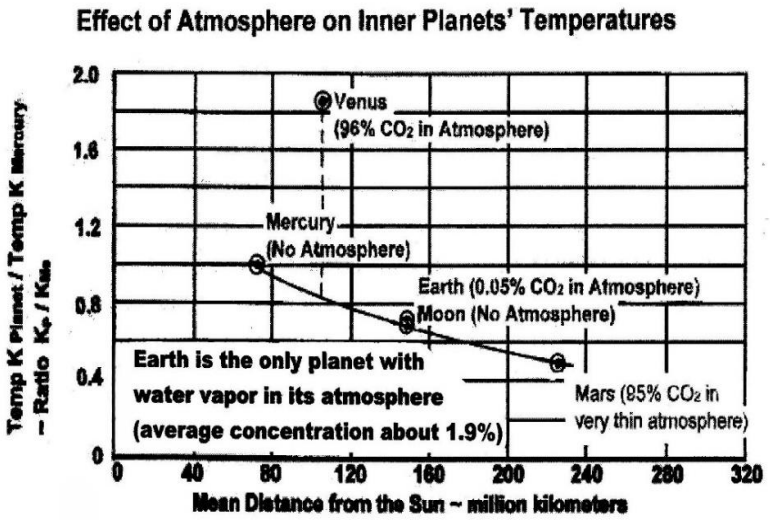
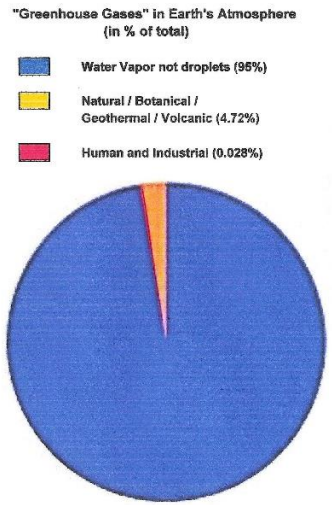
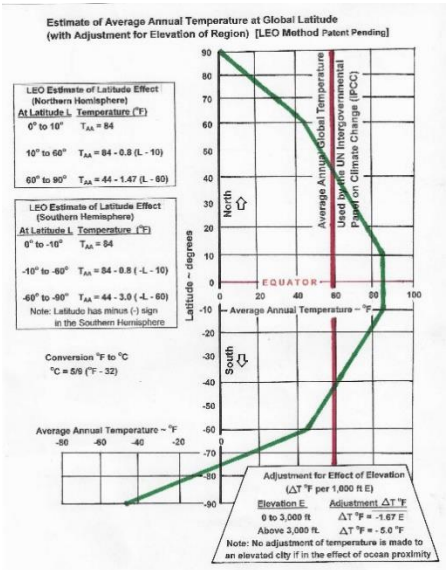
Using the temperatures (in Kelvin units) and concentrations (in %) of carbon dioxide in their respective atmospheres (as measured by NASA), the astrophysics of the four inner planets (Mercury, Venus, Earth, and Mars) led the Author to conclude that only if the carbon dioxide concentration in a planet's atmosphere is higher than about 20% (Venus has 96% CO_2) will it have a significant effect on the surface temperature of the planet. Water vapor is the dominant factor.

The angle of obliquity at which the Sun's heat energy waves impinge on the surface of Earth – a different angle depending on latitude - causes seasonal temperature variations. Average annual temperature at the gamut of latitudes between 90° North and South varies as follows:







Distances of the planets from the Sun, and the planets' surface conditions were measured with the Galileo, Kepler, Hubble and Webb space astronomical telescopes.

(Average annual temperature at latitudes are deduced from the UN World Meteorological Organization database – with water vapor)

Compared to astrophysical and geophysical factors, anthropogenic (human and industrial) greenhouse gases - presently at a NOAA-measured CO_2 concentration level of about 0.014% in Earth's atmosphere – "man-made" emissions are of negligible significance presently and in the near future.