

ADITYA-MISSION



Uniqueness - Aditya-L1 is the first space-based Indian observatory to study the Sun. It will be launched by the PSLV-C57.



Note - The solar mission will not see the spacecraft actually go to the sun, it will instead create a space observatory at a point from which the sun can be observed even during an eclipse.



The spacecraft is planned to be placed in a **halo orbit around the Lagrange point 1 (L1)**, around 1.5 million km from the Earth, of the Sun-Earth system.



Halo Orbit Around L1



MAJOR OBJECTIVES OF THE MISSION



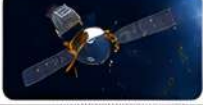
The mission will focus on study of the Solar upper atmospheric (chromosphere and corona) dynamics.



It will also identify what drives space weather, along with the origin, composition and dynamics of the solar wind.



ADDITIONAL INFORMATION - INTERNATIONAL SOLAR MISSIONS

Mission	Space Agency	Key Feature
 Parker Solar Probe (2018)	 NASA	 Closest mission to the Sun; first spacecraft to "touch" the corona.
 Solar Orbiter (2020)	 &  ESA & NASA	 Focuses on high-resolution images of the Sun's poles.
 SOHO (1995)	 &  ESA & NASA	 An older observatory at L1 that has provided over two decades of solar data.
 PUNCH (2025)	 NASA	 A constellation of four small satellites studying how the corona becomes solar wind.
 ASO-S (Kuaifu-1) (2022)	 CNSA (China)	 Studies the relationship between the solar magnetic field, solar flares, and CMEs.