

5 CubeSats selected for Low Cost Access to Space program

Five CubeSats have been recently selected as part of the Low Cost Access to Space Program. They include:

Daily Atmospheric Ionospheric Limb Imager (DAILI), PI: James Hecht , Aerospace Corporation

A three year 6U CubeSat to study O₂ density in the 140 to 290 km altitude. The observations will fill in gaps for operational models of the thermosphere and ionosphere.

CubeSat: Inner Radiation Belt Experiment (CIRBE), PI: Xinlin Li, University of Colorado at Boulder

CIRBE will use a miniaturized version of an instrument on the Van Allen Probes to understand the formation and decay of inner belt electrons, and the intensity and dynamic variations of these electrons.

The Relativistic Electron Atmospheric Loss (REAL) Cubesat, PI: Robyn Millan, Dartmouth College.

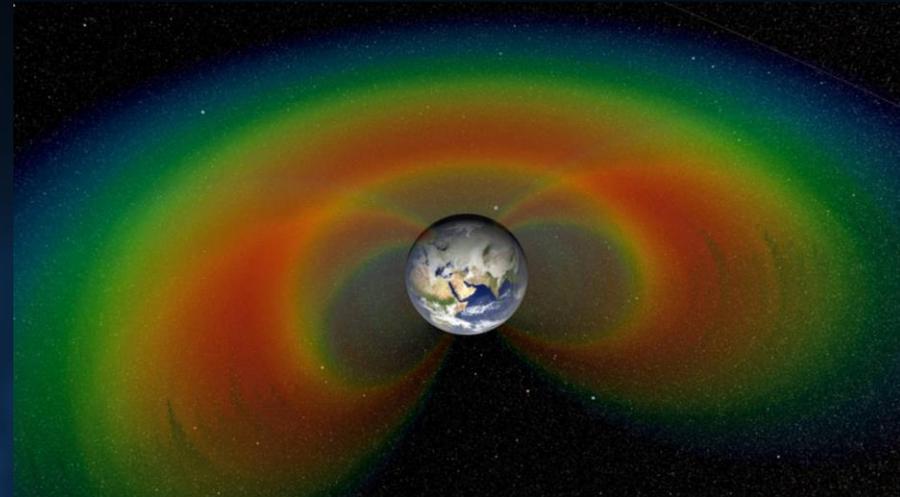
REAL will characterize the mechanisms responsible for scattering radiation belt electrons, by making high time resolution measurements of electron pitch angle and energy distributions in low Earth orbit over a wide energy range.

Auroral Emissions Radio Observer (AERO), PI: Phillip Erickson, MIT Haystack Observatory

AERO is a one-year CubeSat mission that will determine if auroral kilometric radiation penetrates into the lower atmosphere, which will assist in remotely sensing the auroral acceleration region.

Geosynchronous Transfer Orbit to Study Radiation Belt Dynamics (GTOSat), PI: Lauren Blum, NASA Goddard

A 6U CubeSat, GTOSat will observe the acceleration and loss of relativistic electrons in Earth's outer radiation belt through a four-year mission.



Several of the newest CubeSat selections will take advantage of their Earth orbits to study fundamental processes in the Van Allen radiation belts.