

An Info Session on Careers Exploring the Sun, Planetary Magnetospheres, Space Weather, and Space Plasma Physics

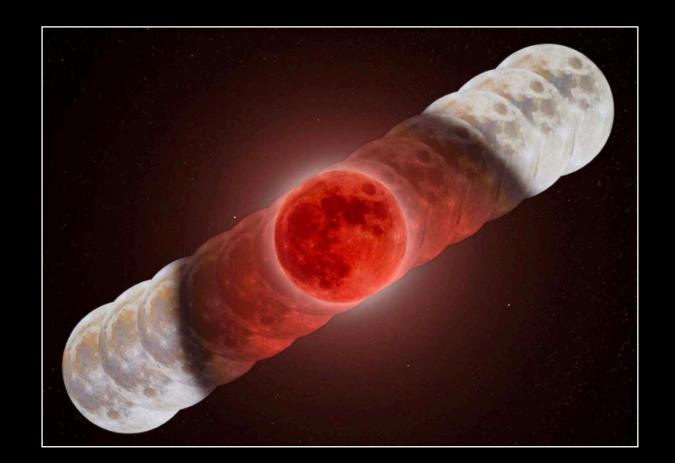
Plan for Today

- Announcements (~5 min)
- Introduction to Heliophysics (~5 min)
- Panel Member Presentations (~5 min each)
 - Academic
 - David Malaspina (CU Boulder)
 - Civilian Government
 - Alexa Halford (Goddard Space Flight Center)
 - Space Weather
 - Richard Sheppard (NOAA Space Weather Prediction Center)
 - Military
 - Alex Fletcher (US Naval Research Lab)
 - Commercial
 - Connie Spittler (Ball Aerospace)
- Open for discussion

The space environment touches our lives, every day

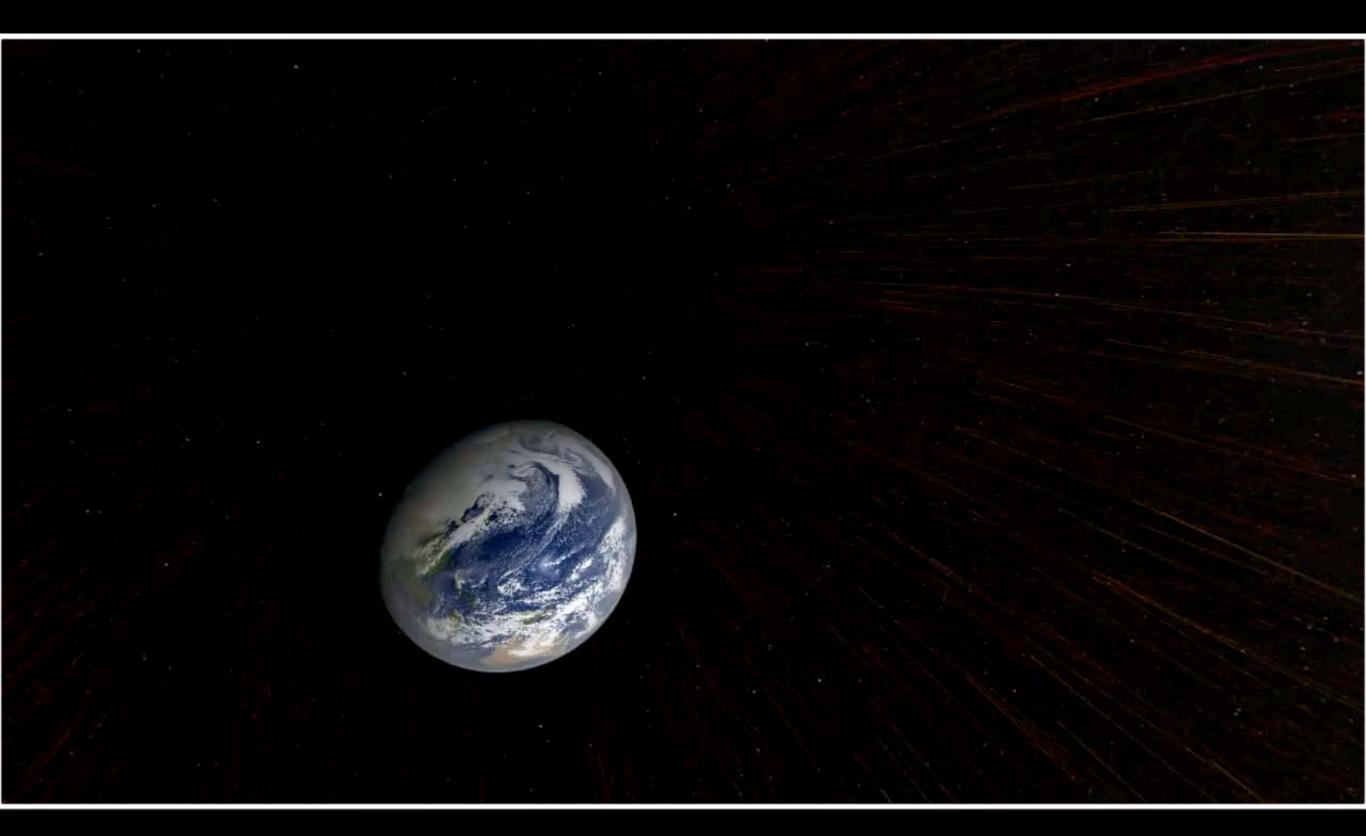








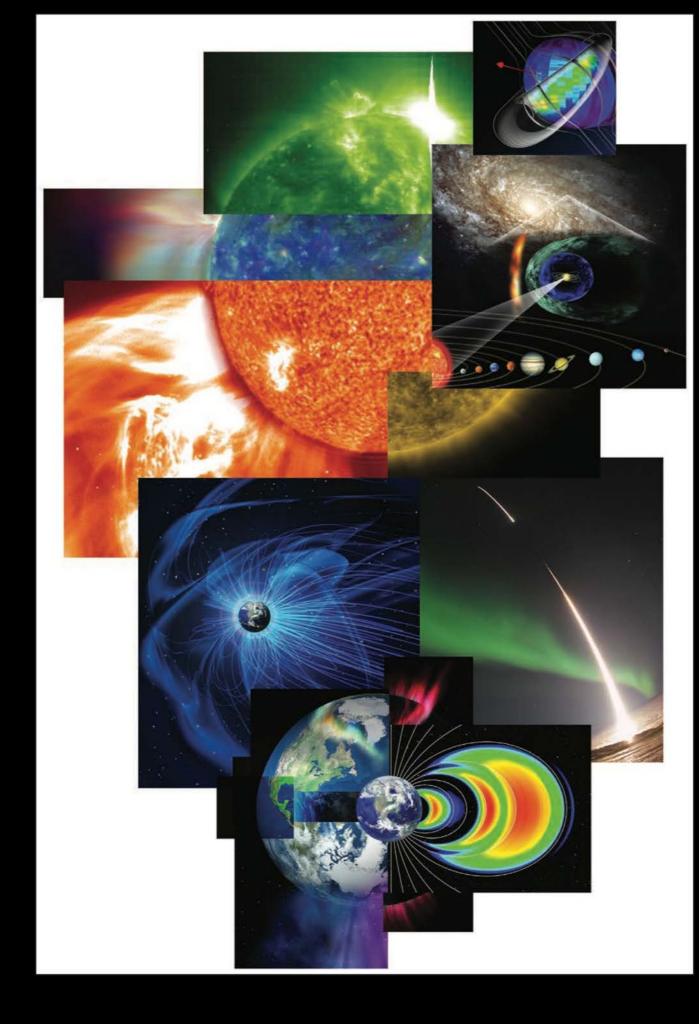
The space environment touches our lives, every day



What is Heliophysics?

Heliophysics seeks to understand the nature of the space environment

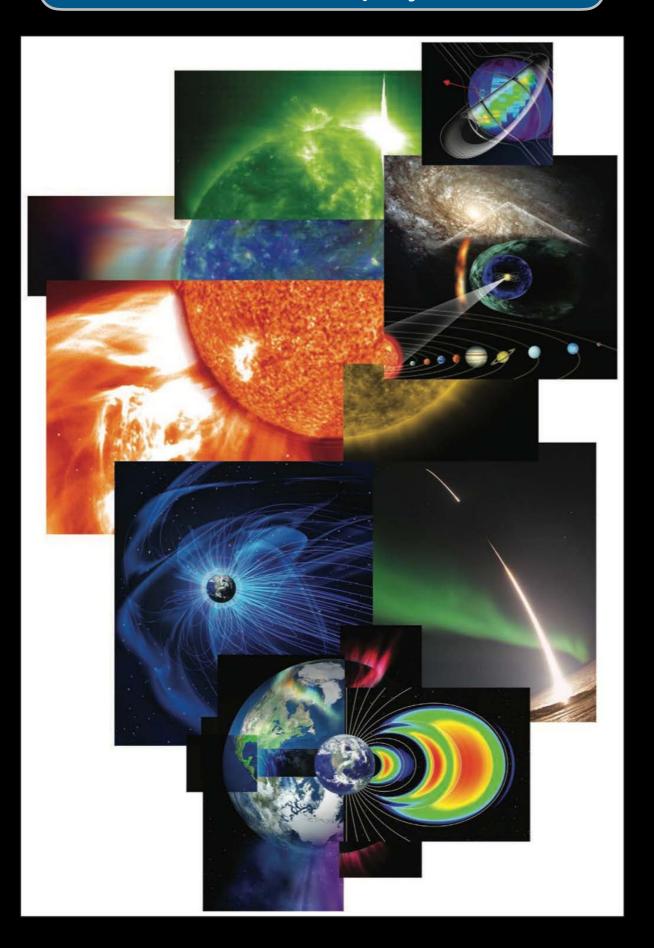
Heliophysics seeks to detect, predict, and adapt to extreme conditions in space, to protect life and society and to safeguard exploration beyond Earth



What is Heliophysics?

The Sun (center of the solar system)

The Solar Wind (the space between solar system objects)



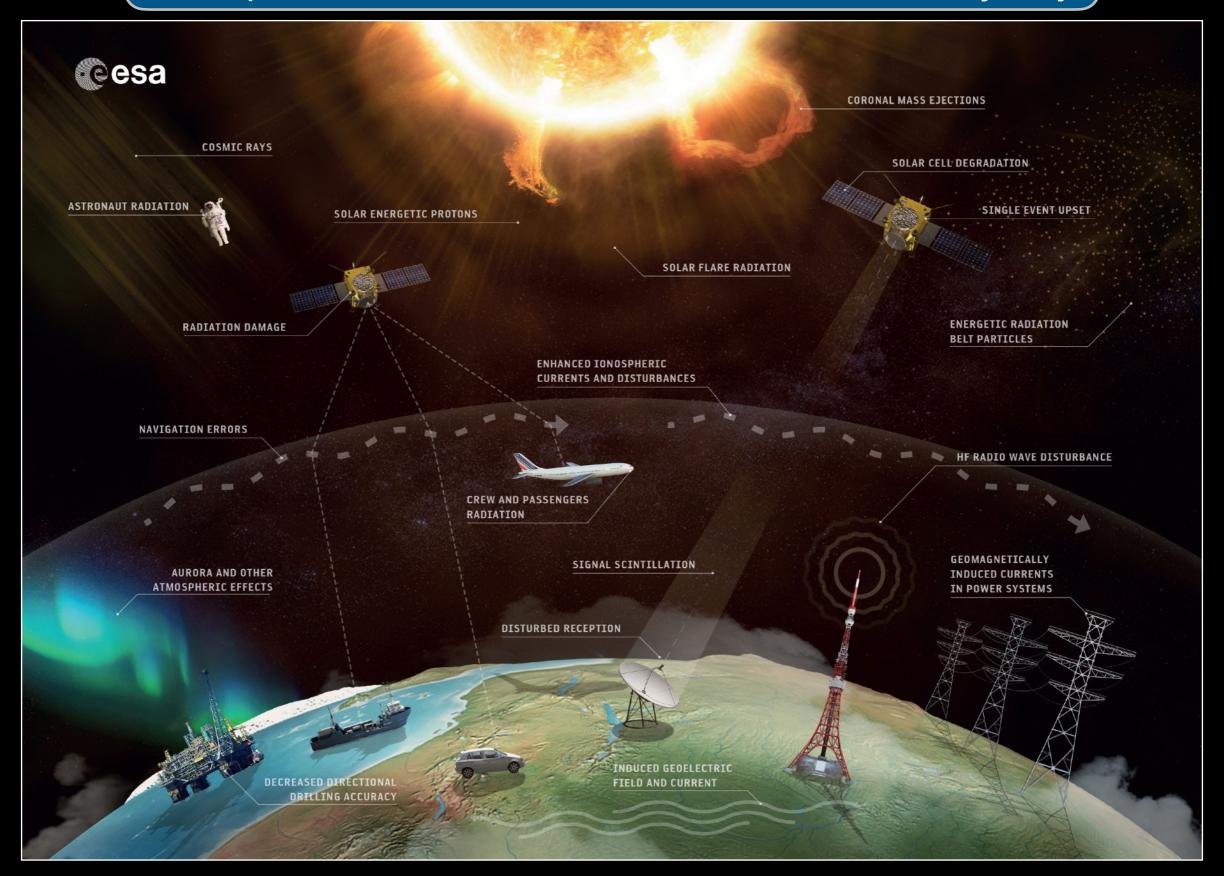
The Edge of the Solar System (outer edge of the solar system)

lonospheres (outer edge of a

planetary atmosphere)

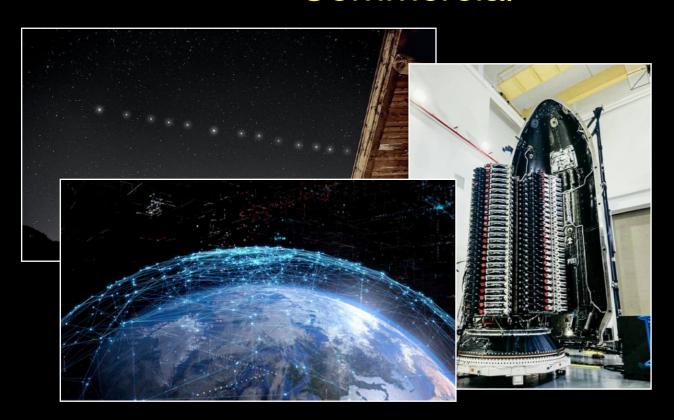
Magnetospheres (regions of space influenced by planets)

The space environment touches our lives, every day



Types of Heliophysics Careers

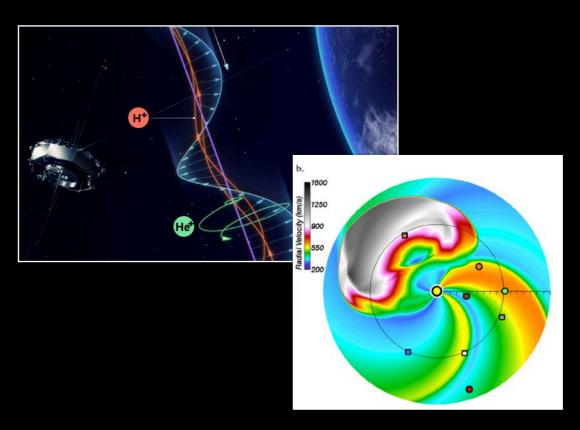
Commercial



Military



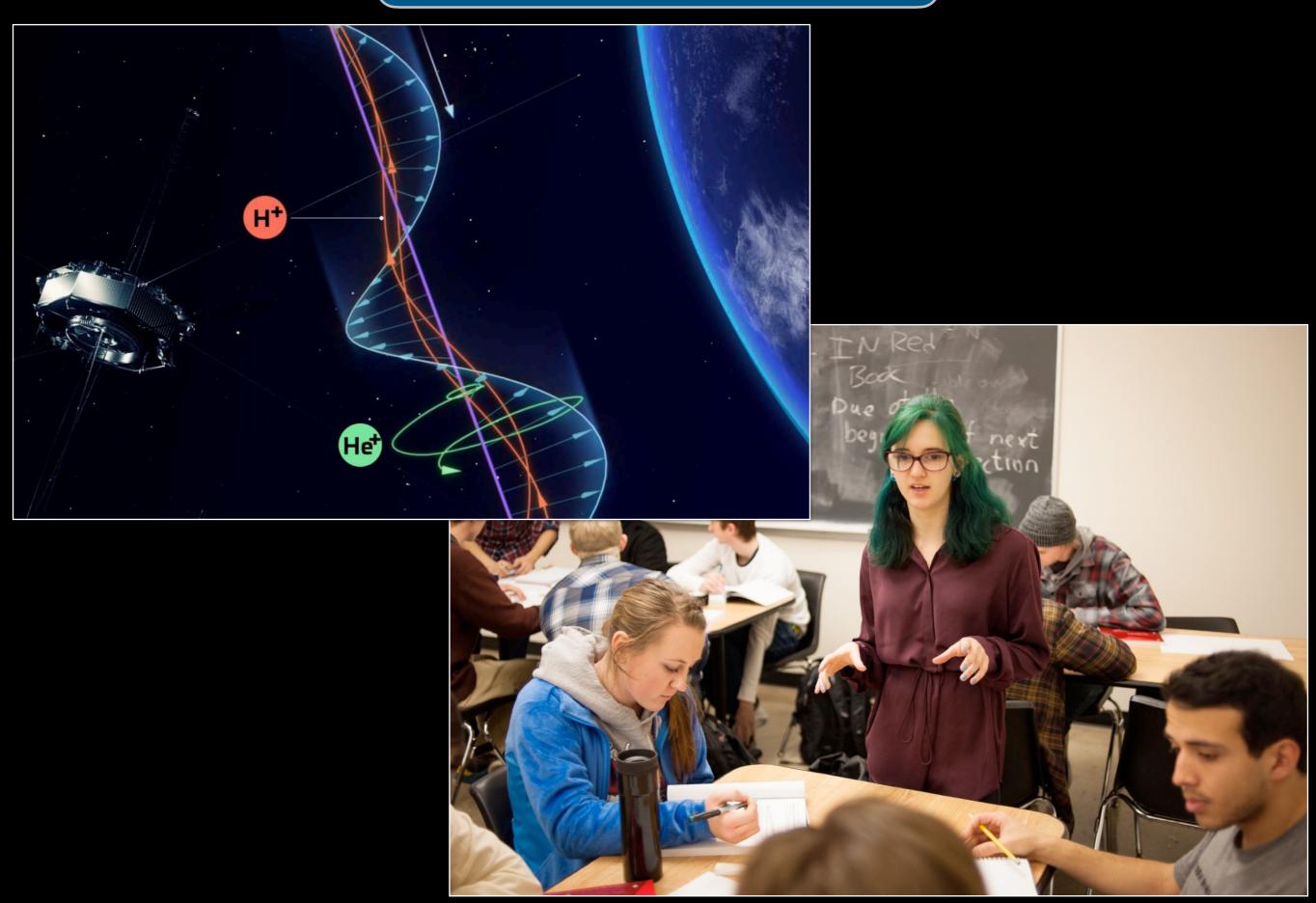
Academic



Civilian Government



Heliophysics: Academic



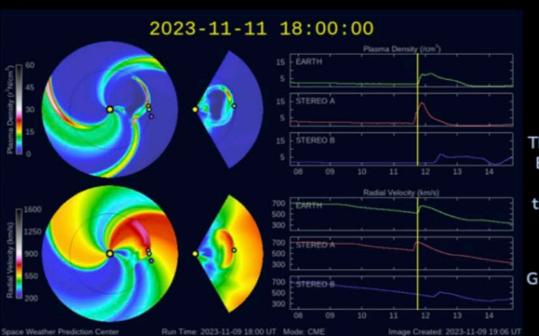
Heliophysics: Civilian Government



Heliophysics: Space Weather

MODERATE Geomagnetic Storm WATCH Valid for 11-12 Nov G2

WHAT: A Coronal Mass Ejection (CME) is expected to arrive at Earth on 11 Nov



EVENT:

A halo CME associated with a solar eruption located near S15W15 at 09/1115 UTC

TIMING:

The CME is expected to arrive at Earth around 1800 UTC on Nov 11, with effects persisting into the early hours of 12 Nov (UTC)

EFFECTS:

G2 storm levels are likely on 11-12 Nov



Space Weather Prediction Center: Boulder, CO

Heliophysics: Military



Counterinsurgency / Counterterrorism



A2/AD Environments / Multi-Domain

Communications

ISR



Safety of Flight

PNT



Polar Operations



Ballistic Missile Defense

Heliophysics: Commercial





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