

**Opportunity Title:** Aerosol Long-range Transport and Effects in the Earth System

**Opportunity Reference Code:** 0181-NPP-NOV23-GSFC-EarthSci

**Organization** National Aeronautics and Space Administration (NASA)

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**Application Deadline** 11/1/2023 6:00:59 PM Eastern Time Zone

**Description** Mineral dust and pollution aerosol can transport on hemispherical and global scale. They exert far-reaching effects on the Earth system via a variety of pathways, including (a) degrading air quality and adversely affecting human health, (b) perturbing the Earth's energy balance through directly interacting with radiation and indirectly modifying cloud properties, and (c) influencing marine and terrestrial ecosystems through depositing co-transported nutrients and microbes. Our research focuses on how to integrate a variety of satellite measurements to obtain observation-based estimates of aerosol transport and deposition and to assess the roles of the long-range transported aerosol in the Earth system. The study also involves the use of model simulations and field campaign data to complement the satellite observations.

**Location:**

Goddard Space Flight Center  
Greenbelt, Maryland

**Field of Science:**Earth Science

**Advisors:**

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**Applications with citizens from Designated Countries will not be accepted at this time, unless they are Legal Permanent Residents of the United States.** A complete list of Designated Countries can be found at: <https://www.nasa.gov/oiiir/export-control>.

Eligibility is currently open to:

- U.S. Citizens;
- U.S. Lawful Permanent Residents (LPR);
- Foreign Nationals eligible for an Exchange Visitor J-1 visa status; and,
- Applicants for LPR, asylees, or refugees in the U.S. at the time of application with 1) a valid EAD card and 2) I-485 or I-589 forms in pending status

**Eligibility Requirements** • **Degree:** Doctoral Degree.



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