



United States Department of Agriculture  
Forest Service

# USFS - NASA Applications Workshop

Satellite Data to Support Natural Resource  
Management  
April 30-May 2, 2019

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Geospatial Management Office



# Welcome!

Welcome to the USFS-NASA Applications Workshop: Satellite Data to Support Natural Resource Management, hosted by the Geospatial Technology and Applications Center here in Salt Lake City.

The USFS-NASA Applications Workshop is a collaborative effort between the U.S. Forest Service (USFS) and NASA. The workshop is intended to serve as a forum where the attendees can discuss how NASA data products can serve (or better serve) the operational goals of the USFS by providing timely synthesized information to support management decisions and project prioritization.



# Welcome!

The planning team is bringing together FS and NASA professionals who are currently supporting natural resource management and who are using or planning to use satellite data product(s) from SMAP, NISAR, ICESat-2, CMS, and GEDI. We are here to learn about these missions/projects and for NASA to share with us how their work can support USFS's operational goals.

- Soil Moisture Active Passive (SMAP),
- ISRO Synthetic Aperture Radar (NISAR),
- Ice, Cloud, and Land Elevation Satellite-2 (ICESat-2),
- Carbon Monitoring System (CMS)
- Global Ecosystem Dynamics Investigation (GEDI).

# Introductions

**Deb Oakeson** – GTAC Director and Acting GIO, and your senior host at this facility

## **Workshop Planning Team**

- **Leads:**
  - Chalita (Sriladda) Forgotson, PhD** - NASA Hydrological Sciences Lab., Science Systems and Applications, Inc.
  - Erik Johnson** - USDA Forest Service – Program Analyst, Office of Sustainability & Climate
- **Planning & Logistics:**
  - Ana Wilson** - Electrosoft
- **Support Team /SMEs:**

Forest Service	NASA / USGS	Academia / NSIDC
Justin Epting Jess Clark Carlos Ramirez Raha Hakimdavar Stacie Bender James Ellenwood Everett Hinkley	Sabrina Delgado Arias, Goddard Edil Sepulveda Carlo, Goddard Temilola Fatoyinbo, Goddard Andreas Colliander, JPL Natasha Stavros, JPL Narendra Das, JPL Birgit Peterson, USGS	Laura Innice Duncanson, Univ. of Maryland Nancy Glenn, Boise State Amy Neuenschwander, University of Texas Yaxing Wei, Univ. of Alaska - Fairbanks Heidi Kristenson, Univ. of Alaska Paul Moth, Nat'l Snow & Ice Data Center Amy Fitzgerrell, Nat'l Snow & Ice Data Center





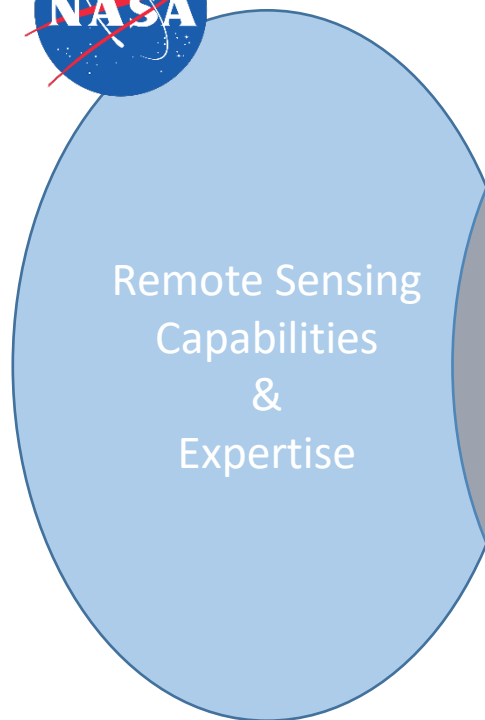
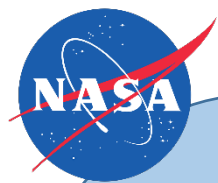
# Housekeeping

- Safety briefing & Logistics
- LincPass - A reminder to everyone to keep your LincPass with you and wear it when you are moving around the building or exiting the building. Getting through security is a piece of cake with it. Without it, it's metal detector each time
- *The Forest Service has a Chief's All Employees call at noon MST today. The call will occur during our scheduled lunch.*

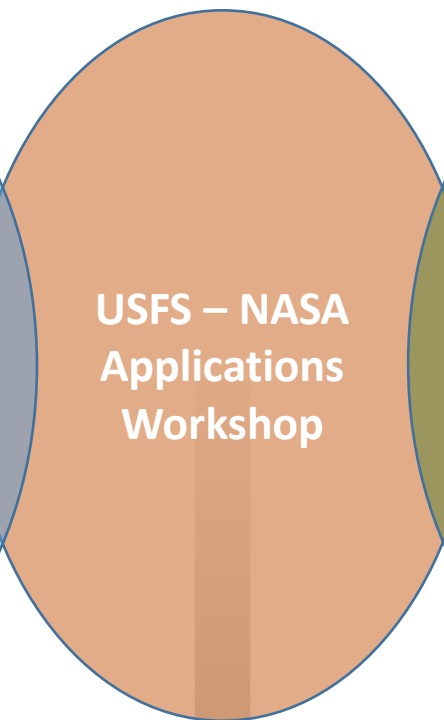


# Workshop Goals & Objectives

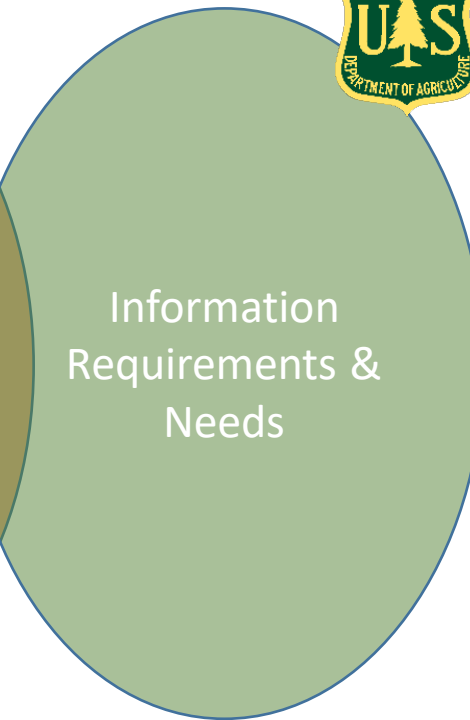
- **Goals:** To share and demonstrate the capabilities of NASA data products, as well as to develop connections and strengthen partnerships between NASA and the USDA Forest Service.
- **Objectives:**
  1. To provide an overview of NASA missions and projects, data, and tools supporting natural resource management;
  2. To share and prioritize USDA Forest Service operational needs with NASA;
  3. To identify opportunities for collaboration; and
  4. To expand USDA Forest Service awareness of NASA data sources and tools and mutually explore ways to advance information delivery.



Remote Sensing  
Capabilities  
&  
Expertise



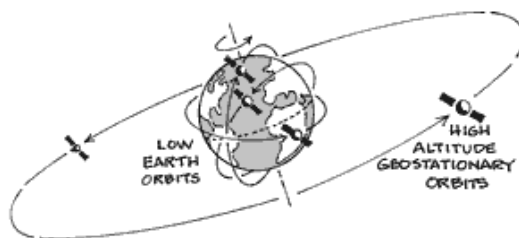
**USFS – NASA  
Applications  
Workshop**



Information  
Requirements &  
Needs



Outputs: realized/identified “gaps” between  
existing capabilities and needs





# Agenda

- **April 30, 2019 (Tuesday)**

Day 1 Goal: Overview of USFS management goals and NASA missions and data product functionalities, poster session, and tools to visualize NASA data

- **May 1, 2019 (Wednesday)**

Day 2 Goal: NASA data applications, concurrent sessions to identify gaps and ways to fill gaps, and NASA data access tutorials

- **May 2, 2019 (Thursday)**

Day 3 Goal: Hands on data tutorials and group discussion to prioritize ways to fill the gaps/next steps





United States Department of Agriculture  
**Forest Service**

# Thank You!



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