



Atmospheric Chemistry Observations & Modeling

## **ACOM Seminar**

## CISL Cyberinfrastructure: Empowering Earth System Science Research

NSF NCAR Computational and Information Systems Lab

Date: Thursday, November 7<sup>th</sup>, 2024, 11:00 am – 12:00 pm (MT) FL2-1022

## ABSTRACT

NSF NCAR's Computational and Information Systems Lab (CISL) offers a wide range of resources extending far beyond its well-known supercomputing systems (Derecho, Casper, Glade). CISL's mission is to empower Earth System Science (ESS) research excellence through software, services, data, training, and computational science expertise. Examples of the some of the many ways that CISL can help advance the scientific discovery process include:

- Data-Driven Insights: Access and analyze curated geoscience data collections.
- Visualization Support: Communicate complex data effectively through compelling visualizations.
- Open Science Education: Become proficient in the tools of Open Science.
- Code Optimization: Boost the performance of your code on GPUs.
- AI/ML Consultation: Explore the potential of artificial intelligence and machine learning.
- Specialized Software: Simplify analysis, visualization, and data assimilation with software developed for the ESS community.
- HPC: High-performance computing resources and expertise in support of the development and execution of large, long-running numerical simulations.

Join us and learn more about how CISL's integrated cyberinfrastructure can help advance your science.

For more information, please contact Qing Ye (qingye@ucar.edu ) or Kyle Zarzana (kzarzana@ucar.edu). The NSF National Center for Atmospheric Research is operated by the University Corporation for Atmospheric Research under the sponsorship of the National Science Foundation