

#### **Atmospheric Science Data Center**

#### John Kusterer – Head, ASDC CERES Science Team Meeting May 6-8, 2008



#### ASDC CERES Support Overview

- ASDC produces CERES data using Instrument Team code (Instrument, Level 2 and Level 3 data)
- ASDC responsible for data ingest, archive and distribution of CERES data.
  - Currently ~300 Terrabytes of CERES data in archive
  - Four options for searching/ordering data using ASDC Order Tool
  - New ingest/archive/distribution system (ANGe) being deployed

#### ASDC provides CERES user and data services

- CERES/FLASHFlux/SRB support
- Peer and public communication of CERES products and tools
- CERES data and user metrics compiled
- Support parameter/spatial/temporal subsetting



#### **CERES/FLASHFlux Production**





#### **CERES** Production



#### • Langley Atmospheric Science Data Center•



#### **FLASHFlux Production**





# ASDC User Working Group

- Utilized to gain ASDC user feedback on ASDC activities and strategic direction
- Representatives from ASDC data projects and user community
- Chartered to meet annually
  - Hiatus in 2007
- Membership being finalized
- Plan meeting for Summer 2008



# ASDC Evolution (1 of 2)

- ANGe (Archive Next Generation)
  - Originally planned to replace two existing archives at the ASDC
    - EOS Core System (ECS)
    - Langley TRMM and Terra Information System (LATIS)
- Insufficient progress and budget constraints have scaled back ANGe efforts

- Currently planned to replace only LATIS



# ASDC Evolution (2 of 2)

- CERES will be supported by ANGe
  - Scheduled completion by August 2008
  - FLASHFlux & SRB supported by Fall 2008
- CERES Automation placed in hold
  - Design was not going to meet customer expectations
  - Hardware acquisitions should improve CERES production issues
  - Resources utilized to support other activities
  - Reformulate requirements in conjunction with subsystem working groups and DMT



### Hardware Acquisitions (1 of 2)

- Funding availability in FY08 providing opportunity to improve ASDC performance for CERES
  - Future funding to be much less
- Aim to enhance architecture to support current and future (>2 years) CERES requirements
  - NPP
  - Increase production throughput
  - Improve access by Science Team to data



### Hardware Acquisitions (2 of 2)

- Migrate from tape based system to disc based system
  - Tape breakage issues
  - File system issues relating to tape drives
  - Reduce time to stage/access data
- Provide production support for both IBM970 and x86 based PGEs

- Migrating off of existing SGI platform



### ASDC Goals

- Improve collaboration with Instrument Teams
- Improve processes and rigor
- Improve documentation
- Do what's best for NASA
  - Consolidate hardware where it makes sense
  - Share resources where it makes sense
- Be a high performing organization