



# LIGO Support Center

Open Science Grid Operations & Support Centers Meeting May 16-17, 2006

- The LIGO Experiment
- LIGO Participation
- The LIGO Support Center



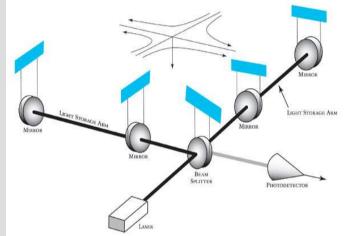






# The LIGO Experiment

- LIGO is currently in its one year long science run (S5) at design sensitivity
- Generates about 1TB of raw data per day
- Four focus groups analyze data:
  - Burst (unmodeled astrophysical GW sources)
  - Inspiral (compact binary system of neutron stars and black holes)
  - Periodic (Doppler modulated periodic signals from pulsars)
  - Stochastic (gravitational analogy to EM background)
- Currently able to run some binary inspiral searches on OSG resources
- LIGO's Caltech group is active in OSG ITB activities













# LIGO Participation

- Caltech
  - OSG Testbed: LIGO-CIT-ITB
  - Porting LIGO software to work with the OSG model
- PSU
  - Maintain the LIGO VOMS
  - LIGO Account Management
  - Production Cluster: OSG\_LIGO\_PSU
  - LIGO Support Center
- UW Milwaukee
  - Production Cluster: UWMilwaukee



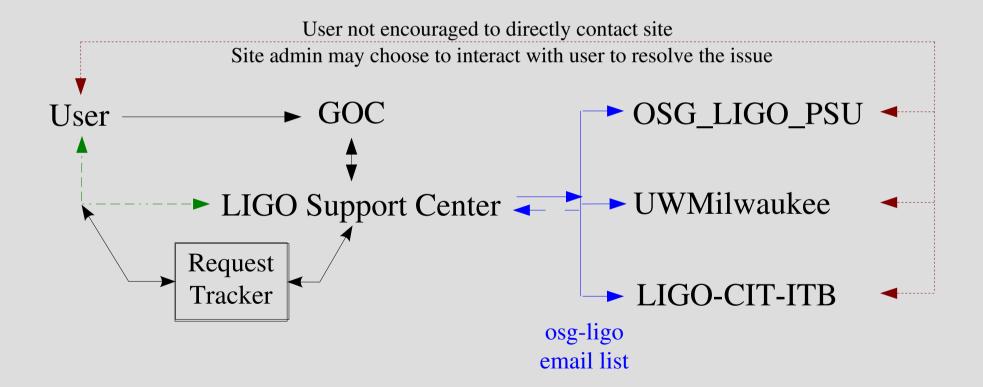






## The LIGO Support Center

#### **Communication Channels**











# The LIGO Support Center

- What the support center would like would like...
  - Use GOC footprints / ticket system (web) directly to manage tickets and communicate with users
    - OR, have better interaction with other ticketing systems
  - Cluster status (maintenance) message sent out to users?
  - Easier upgrades, OR, have binary snapshots of install for platforms
  - Better upgrade instructions and safeguards (UWMilwaukee incident)
  - How to do the LIGO CA roll-out and support
- For LIGO....
  - Data requirements
    - disk space / resource reservation
    - data security?
  - Software/Application roll-out
  - Meta Schedulers?









# ¿Questions?

Thank You



