Overview

LSST has two apparently conflicting goals:

1. **Openness** - public access to scientific data
2. **Security** - reliable infrastructure and long-term data integrity

We will need to find a balance between these two, for each component and participant of LSST.

Realms

1. Physical Security
2. System-level Security
3. Applications Security
4. Public Access

Sites

- Mountaintop
  - Network access **strictly through base facility**
  - Important roles: Buffering, Network transfer to Base Facility
- Base facility (at La Serena)
  - *Who can access?*
  - **No public access** (all through collocated Data Access Center)
  - Nightly processing (real-time)
  - Data transferred to Archive Center
- Archive Center (at NCSA)
  - *Who can access?*
  - Data Archive
  - Primary data processing
- Data access Centers
  - Operated by LSST
    1. Collocated with the Archive Center (NCSA)
    2. Collocated with Base Facility (La Serena)
    3. San Diego
    4. Education and Public Outreach (EPO)
  - Possibly others, independently funded

Shared Facilities

Where LSST shares a site, we can expect to collaborate with other organizations on security, especially physical security.

- NCSA
  - LSST will share a major new data center with NCSA, whose most notable resident will be the NSF supercomputing cluster ?Blue Waters which is expected to come online in 2011.

[Needed: list of other organizations whose facilities we will share]

Source Documentation

?NCSA Security Policies