DM DOCUMENTATION

How to follow & interact with DM & Platforms you can use in your own teams

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LSST/AURA, Data Management, SQuaRE Team
Relevant DM Design Documents

- **DM Applications Design**
  
  `ls.st/ldm-151`

  Look out for an up-coming refresh.

- **Data Products Definition Document**
  
  `ls.st/dpdd`
LSST Community forum
community.lsst.org

One year old.
280 registered members.
680 topics.
3702 posts.
... and growing.
LSST Community forum
community.lsst.org

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Support category
community.lsst.org/c/support

A place to get help with LSST software from Data Management and Simulations.

Resolved posts have checkmarks.
Data Management category
community.lsst.org/c/dm

DM openly collaborates in the ‘Data Management’ category.

Follow our progress; give us feedback.

‘DM Notifications’ sub-category has mini-announcements.
DM Highlights tag

community.lsst.org/tags/dm-highlights

Posts tagged ‘dm-highlights’ are weekly summaries of shipped features, new documentation, and decision making (RFCs)
Simulations category
community.lsst.org/c/sims

Open collaboration category for the Simulations team.

Relevant for scientists interested in using Simulations software and defining the observing cadence!
Science category
community.lsst.org/c/science

You might have posted Workshop breakout suggestions here.

Science category is new, let’s see where it goes!
LSST Community forum
community.lsst.org

You can browse without an account, but LSST Community forum is better if you sign-up:

- create and reply to posts
- follow categories to get notifications
### Community

<table>
<thead>
<tr>
<th>Topic</th>
<th>Unread</th>
<th>My Posts</th>
<th>New Topic</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Watching</strong></td>
<td>1</td>
<td>44</td>
<td>12d</td>
</tr>
<tr>
<td>You will automatically watch all topics in these categories. You will be notified of every new post in every topic, and a count of new replies will be shown.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Tracking</strong></td>
<td>1</td>
<td>50</td>
<td>13d</td>
</tr>
<tr>
<td>You will automatically track all topics in these categories. You will be notified if someone mentions your @name or replies to you, and a count of new replies will be shown.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Watching First Post</strong></td>
<td>1</td>
<td>65</td>
<td>14d</td>
</tr>
<tr>
<td>You will only be notified of the first post in each new topic in these categories.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Normal</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>You will be notified if someone mentions your @name or replies to you.</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Muted</strong></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>You will never be notified of anything about new topics in these categories, and they will not appear in latest.</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

### LSST the Docs (lsst.io) now provides courtesy directory redirects
doc-dev

| Builds are now optimised by default
| scms, dm-dev |

| Jenkins maintenance 2016-07-26 @ 18:00
| ci, Jenkins |

| Current-Infrastructure Meeting 7/22/16 1PM PST
| dm-infrastructure |

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**Subscribe to categories & tags**
Settings, like email frequency
DM Technical Notes

Listing: [http://ls.st/nre](http://ls.st/nre)

- Complement our ‘change-controlled’ documentation and software user docs.
- Help us communicate ideas faster:
  - Data/algorithm experiments
  - Design proposals
  - Implementation overviews
- Published as websites from GitHub
- Soon, will be **registered on NASA/SAO ADS**, making them easy to cite in your papers.
DM Technical Notes

- [dmtn-001.lsst.io](http://dmtn-001.lsst.io) — Porting the Stack to OS X El Capitan
- [dmtn-002.lsst.io](http://dmtn-002.lsst.io) — SuperTask and Activator Notes
- [dmtn-003.lsst.io](http://dmtn-003.lsst.io) — Description of v1.0 of the Alert Production Simulator
- [dmtn-004.lsst.io](http://dmtn-004.lsst.io) — Debugging in Docker Containers
- [dmtn-005.lsst.io](http://dmtn-005.lsst.io) — Current LSST Stack WCS Usage
- [dmtn-006.lsst.io](http://dmtn-006.lsst.io) — False Positive Rates in the LSST Image Differencing Pipeline
- [dmtn-007.lsst.io](http://dmtn-007.lsst.io) — Dipole Characterization for image differencing
- [dmtn-008.lsst.io](http://dmtn-008.lsst.io) — Introducing validate_drp: Validate an output repository against SRD Key Performance Metrics
DM Technical Notes

- dmtn-009.lsst.io — Vertical-partition Join Performance in MySQL
- dmtn-010.lsst.io — WCS and Distortion Requirements and Existing Options
- dmtn-013.lsst.io — Wrapping C++ with Cython
- dmtn-014.lsst.io — Wrapping C++ with Pybind11
- dmtn-015.lsst.io — Flavors of Coadds
- dmtn-016.lsst.io — Towards LSE-63 and Beyond: A technical roadmap from QA to Level 3
- dmtn-017.lsst.io — Differential Chromatic Refraction: Literature Overview
DM Technical Notes

- dmtn-018.lsst.io — Re-visiting L1 Database Design
- dmtn-019.lsst.io — Dipoles in difference imaging from DCR
- dmtn-020.lsst.io — Project Management Guide
- dmtn-021.lsst.io — Implementation of Image Difference Decorrelation
- dmtn-023.lsst.io — Pipeline Command-line Drivers
- sqr-000.lsst.io — The LSST DM Technical Note Publishing Platform
- sqr-001.lsst.io — Git LFS Architecture Note
- sqr-002.lsst.io — Binary Pipeline Software Distribution
- sqr-005.lsst.io — Publication Board JIRA Project
DM Technical Notes

- sqr-006.lsst.io — The LSST the Docs Platform for Continuous Documentation Delivery
- sqr-008.lsst.io — SQuaRE QA Database
- sqr-009.lsst.io — SQUASH Dashboard Prototype
- sqr-011.lsst.io — DM Communication & Publication Platforms
- sqr-012.lsst.io — Migrating LSST Tests to py.test
- And more technotes from Simulations: http://ls.st/t12
Science Pipelines Docs
pipelines.lsst.io

*In progress, a guide to LSST's Stack, which you’ll use in Level 3:*
- tutorials
- user guides
- programming references

Also look for Qserv DB and Firefly documentation sites.
DM Developer Guide
developer.lsst.io

How DM works:
- collaboration processes
- coding style guides
- developer tips
- doc writing practices
DM Tools for your team

We build communication tools and services for DM, but LSST sub-systems and Science Collaborations are welcome to use these services.

Idea:

We build communication tools and services for DM, but LSST sub-systems and Science Collaborations are welcome to use these services.

1. Set up public/private categories on Community
2. Publish versioned documentation sites with LSST the Docs
Community forum categories for your team

**Public categories** to host community science discussions and make announcements.

**Private categories** to have team discussions.
Why use Community forum? (Discourse)

It’s better than email lists for groups.

- **Rich formatting**
  - Markdown
  - Rendered LaTeX math
  - Inline images, also attachment

- **Quoting that works**
  - Quotes link to original context
  - Link between topic threads

- **On-site search**

- **Browsable archive**
  - New team members can get up-to-speed more easily

- **Tag conversations, ‘@’ mentions**
  - Works well with notifications

- **Link to public posts from Twitter, Facebook, …**

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**Parameters**

**Fitted**
- Mapping from Pixel to Tanger polynomial, it’s coefficients are $X_0$, $Y_0$, and $g_0$, only explicit of $M_0$, in journal.
- Star positions on the sky.

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**ESPs**

- `eups`
  - Search this topic

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**Eups**

- Change of behavior in `eups`
  - Support
  - Feb 12: Up to recently, we used to use the 'new', situation: `eups` decline + `t` bypassing.
  - Jan 12: A bunch of us on the team seem to use `eups` packages differently than did so.

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**Eups distr**

- Distribute needed writeup
  - Support
  - Why is `eups` distr needed writeup?
Setting up a private category: how it works.

1. Get in contact, jsick@lsst.org

2. We’ll create a category

3. We’ll create a group with permissions to use the category

4. The team’s leader(s) can maintain the group’s membership.
Community Mailbot

- Service that forwards content of new posts to an email address
- Message includes a link to the topic on the Community forum
- Great for transitioning your team to the Community forum without leaving mailing list subscribers behind.
LSST the Docs

A platform for publishing versioned documentation (static web sites)

* .lsst.io

Background: https://sqr-006.lsst.io

git tag -a 1.0
git push --tags

git checkout -b my-branch
git push

* .lsst.io/v/1.0

* .lsst.io/v/my-branch

Background: https://sqr-006.lsst.io
Links:

- LSST Community forum: community.lsst.org
- Data Management Technotes: ls.st/nre
- Developer Guide: developer.lsst.io
- LSST Science Pipelines Documentation: pipelines.lsst.io (in development)
- DM Applications Design: ls.st/ldm-151
- Data Products Definition Document: ls.st/dpdd

In the works:

- Slack for LSST Project & Science Collaborations

Talk to me or email jsick@lsst.org

- Adopt LSST Community forum for your group.
- Publish with LSST the Docs.
- Collaborate on open source documentation tools.