



DM Science Status & Plans

DMLT vF2F meeting
2023-10-24/26

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U.S. DEPARTMENT OF
ENERGY

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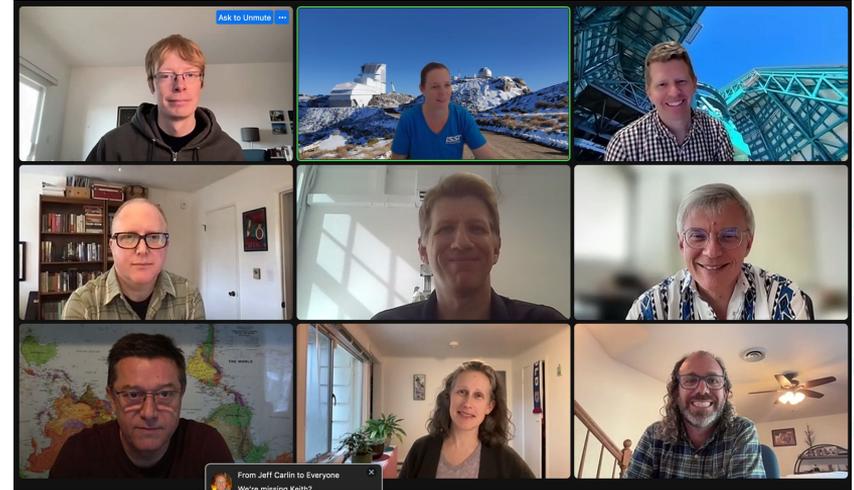
DM Science Team Meeting 2023-10-23

Focus on

- Path to P1a verification completion
- Remaining RSP work to be done

Key takeaways

- Some P1a can be de-prioritized, others need to be de-aggregated so that that completed parts and/or P1a elements can be claimed. Jeff Carlin will put together an RFC
- Large amount of remaining RSP work needs a science-driven prioritization
- Several topics require more detailed future discussion



DM Science Past 3 months

- DM Fall 2023 Acceptance Test Campaign: [DMTR-401](#) – Jeff
 - 9 new verification elements / 3 new requirements claimed since JSR
 - Expect to complete several more by end Nov.
- Definition of “minimal calibration system” that will form the basis of construction delivered system and what we will use in year 1 – Eli
- Updates to “Special Programs” in light of the Phase 2 SCOC recommendations in PSTN-055 – [DMTN-065](#) - Melissa
 - Rename “Special Programs” to “Special Processing” for the DM processing of data
- Updated status on crowded field processing prototype – Colin
 - Looking to get some extra effort

DM Science Past 3 months

- Evaluated community proposal for Multi resolution postage stamps – Eric
 - Main driver is to identify and remove glints.
 - Concluded that we should try to better identify glints on project and keep this as a risk mitigation
- Reviewed challenges associated with retrieving alert history for DDFs – highlighted by the ELAsTiCC (Extended LSST Astronomical Time-Series Classification Challenge) data challenge, which is sending alerts to Brokers. Brokers are doing classification tests including DDF field alerts with 1-yr history.
 - Eric following up with Brokers to understand their needs for Alert history

DM Science Next 3 months

- Calibration Plan will be completed- Eli
- Complete DM Fall acceptance test campaign end Nov. - Jeff
- P1a requirements review - some we propose to de-prioritise, others need to be de-aggregated to separate out the P1a components from other work
- Plan for the “All P1a verified” milestone
 - Plan to use ComCam Installed on TMA” (June 2024) milestone as our deadline to deliver priority 1a requirements
 - Will use the Commissioning ops rehearsal in March 2024 to verify requirements where possible
- Science-driven prioritization of a large amount of remaining RSP work.
- DM considerations for 1x30 v 2x15 snaps – quantitative criteria for PST

DM Science Next 3 months

- Focus meeting to review the vision for user interaction model for user tables, e.g.
 - Ability to work with user databases from the notebook aspect
 - Writeable schema
 - Means to federate user databases with DP databases
- Focus meeting between science platform and middleware regarding user storage for butler purposes.
- Resources to save lossy compressed PVIs from alert production until a DRP produced PVI is available. Will need in Y1 operations before DR1 then throughout the survey to cover the period until a DRP PVI is produced.