

Gemini Observatory Commentary on the UCG 2015 Report June 10, 2016

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Gemini thanks the UCG for their report from their June 2015 meeting at the Future & Science of Gemini conference in Toronto. We provide here some updates and responses to the issues raised.

Communication

- Communication continues to be a high priority for both Gemni and the UCG.
- A new process to inform users in the event of operational problems was discussed and implemented in 2015. This process will be further reviewed at the 2016 meeting.
- We explicitly encourage additional communication between NGOs and UCG members and ask that UCG members describe these interactions each annual UCG meeting.

Getting Gemini Data Published

- Gemini recognizes the incentive provided by the availability of "quick-look" reduction products and is exploring their addition to the Gemini Observatory Archive. Balanced with other priorities for data reduction software and availability of staff effort, some modes for some instruments may be made available.
- Addition of the capability to provide previous telescope allocations and publications to the PIT is possible but as it requires significant effort, the work will need to be prioritized with other PIT and OT upgrades.

Data Reduction Cookbooks

- Gemini agrees that the production of cookbooks is an essential part of supporting our users in their data reduction efforts. We are collaborating with NGOs on this.
- The US NGO has released a new GMOS cookbook in May 2016 (http://ast.noao.edu/sites/default/files/GMOS_Cookbook/).
- The International Telescopes Support Office in Australia hosted an Observational Techniques workshop in May 2016 at which Kathleen Labrie gave an introduction to IRAF and PyRAF as well as a tutorial on GMOS imaging data reduction (http://www.gemini.edu/sciops/data-and-results/data-workshops).

DR Forum

• We have implemented many of the UCG suggestions for improvements and will be relaunching and advertising this new-and-improved DR forum in mid-2016.



Archive

• The new Gemini Observatory Archive is now open for business (<u>https://archive.gemini.edu</u>)

The Adaptive Optics User Experience

- Providing a solution for distortion correction of GSAOI data remains a priority. A partial (static distortion correction only), manually intensive, solution using msred in IRAF presented by Instrument Scientist Rodrigo Carrasco is available from the Getting Started GSAOI page (http://www.gemini.edu/node/10793?q=node/10883#gsaoi). A full solution requires additional work to account for the variable distortion due to flexure and the peculiarities of each asterism. We are exploring the possibility of the installation of a pinhole mask and calibration source inside Canopus in order to provide distortion corrected images with correct WCS in the FITS headers. Finally, we have begun incentivizing GSAOI users to post their data reduction experiences on the DR Forum (http://drforum.gemini.edu/topic/tips-for-precise-stellar-photometry-with-gemsgsaoi/).
- GeMS/GSAOI overheads documented on the website while possibly on the conservative side do represent the best current knowledge for actual overheads. There are no other instruments of similar complexity in operation elsewhere. As operations of GeMS/GSAOI become more routine, there is room for improving the overheads due to setup and possibly a small amount for offsets. When this happens, web pages will be updated accordingly.
- LGS+P1 "superseeing" mode could be better advertised. Many of the users informally polled at the Future and Science of Gemini 2015 Meeting did not know the sky coverage is near 100% for this mode. It is discussed on the Altair webpages in detail, including the limitations of the mode (flexure is currently an issue). It is also mentioned on the Altair section of the CfP. We could expand the call slightly so it is clear that the sky coverage is so high. In addition we can contact the NGOs directly so that they can circulate this information and work with PIO to create a Gemini focus article about it.

Fast Turnaround Program

- We are contacting PIs who receive data to find out about the status of their data and request that they mention the FT program if they give talks etc. about the data. We also request that they get in touch if they have results that Gemini could use for publicity. Note that we have already done a <u>web feature</u> and lead science story in the GeminiFocus <u>newsletter</u> about the first paper to include FT data. We have also been contacted by another PI who has very striking data that we can use after they have submitted a follow-up proposal to another facility. Finally, the demand at the September and October deadlines was strong; 16 proposals at each deadline (and the opening of the program to Gemini staff was only a small factor in the increased demand; 5 proposals)
- Rather than make the review process more elaborate as this goes against the ethos to keep the system as simple as possible and would require software effort as well as more effort on the part of the reviewers, we have edited the text in the initial email sent to



participants and on the page where they review the proposals, stressing that the need for rapid response is only important when all else is equal.

Eavesdropping

- We have clarified to the NGOs and on our web page
 - (https://www.gemini.edu/sciops/observing-gemini/observing-modes/queue-mode/remoteeavesdropping) that a request for eavesdropping does not apriori signify a guarantee for a call (this was a misunderstanding of the original guidelines). We are also testing the idea of ensuring that eavesdropping occurs for programs that ask for it. Although it may be feasible to send an email to users if their program is in the planned queue for the night, this may act at cross purposes and in fact, lead users to be more expectant and thus waiting for a call that may not come.

Priority Visitor Mode

- Priority Visitor Mode is the default for LLPs, however, other modes (queue and classical) are also allowed (<u>http://www.gemini.edu/sciops/observing-gemini/observing-modes/large-and-long-programs</u>).
- Band 1 LLP programs have had little impact on queue balance in terms of their effect on other band 1 programs reaching completion in their requested conditions.
- Although we will continue to offer the bring-on-get-one program, there are no plans to introduce any new funding to support visiting observers.
- Remote observing is a long term goal, but it is not something we are actively pursuing now except that some of the efforts put into the Base Facility Observing project may make the step to remote observing easier.

Proposing and the OT

• While reinstating the update feature for OT is desirable, it is a relatively big job in the current OCS infrastructure and thus lower down in the priorities. In 2016 we are hoping to prototype a new infrastructure that may allow the OT to be a web application, thus eliminating the need to install a stand-alone application.

Next meeting

• August 16-17, 2016 in Hilo.