

ECSV Discussion

15 May 2012, at 10am in room 317.

Attendees:

Andreas Brunthaler, Claire Chandler, Vivek Dhawan, Barry Clark, Miller Goss, Eric Greisen, Jeff Kern, Minnie Mao, Josh Marvil, Drew Medlin, Heidi Medlin, Amy Mioduszewski, Carolina Mora (working with Theresa), Steve Myers, Kristina Nyland, Frazer Owen, Nirupam Roy, Lorant Sjouwerman, Deb Shepherd, Gustaaf van Moorsel, Theresa van Vliet Wiegert, Joan Wrobel,

Minutes:

Synthesis Imaging school

- Starts 2 weeks from today – 29may to 5june
- We have enough tutors for the tutorials – thanks to all who have volunteered.
- There are going to be a couple of 2 hour tutorials, one for the for the ALMA OT (Mon, 4jun) and one for the JVLA OPT (Thursday, 31may)
 - We need 6 more tutors for the OPT & OT – new volunteers are:
 - JVLA OPT – Deb, Kristina
 - ALMA OT – Steve, Jeff, Juergen

Correlator and general system health (Vivek)

- We had a correlator reboot this morning to bring in wide-band phasing, DC removal to set 3-bit gains, fix for the 2nd stage mixer to tune the sub-bands. Ken has been working on this.
- A new MCAF (Meta data Capturing and Formatting) software is being installed by Rich.
 - Ken is looking for volunteers to look at data to make sure that simple things can be retrieved and looks reasonable.
 - Vivek will help on this.
- Barry will continue to do wide-band phased array testing once the new correlator software .
- We made some progress on writing 4 streams of data to the Mk5C correlator for preparation of doing phased array VLBI. There are still some issues that need to be worked out.
- The 3-bit sampler system that allows for 8 GHz of total bandwidth continues to be tested: 80% of the samplers are working fine, 10% look “iffy” and 10% look bad and need work to fix installation testing.
 - 3-bit SBs can be set up in the OPT with some hand editing. Vivek knows how to do the editing with Michael gone until next week.
 - Claire took an Orion dataset
 - We could do a longer C-band testing. Vivek has been doing K and Ku band sanity checks with the 3-bit system.

Software status

- Dave Harland is developing a general observing ‘stand alone tool’ to set up correlator resources for the Proposal Submission Tool (PST), the 13A PST/WIDAR helper program.
- This will be used in conjunction with the spectral line visualization web tool that Nirupam is developing.
- The Resource Catalog Tool (RCT) is also getting some changes for use in the PST. Amy and Michael.

CASA status (Steve/Jeff)

- There will be one more stable release before the CASA 3.4 release. Release likely to be ~ end of next week.
- CASA 3.4 status – two big blockers:
 - Solar system models (mostly for ALMA) – won’t be fixed in the release now but will be patched.
 - Virtual model data column – there was a bug when working with a dataset with a large number of channels that has been fixed but in the fixing process developers found a memory usage problem and some other potential issues. The plan is to switch the defaults to “use scratch = True” to write an actual model data column. Then explore “use scratch = False” issues and patch this later.
 - There are also some other developer problems being solved to deliver a robust package and a few more bug fixes (including Frazer’s seg fault in CLEAN).
- The archive is now running the updated filler.

Documentation review and evaluation (All who are working on documentation in preparation for the call for proposals on 9 July 2012)

- High Frequency guide (Mark) – almost finished, ready to go out to public.
- Spectral line Guide (Juergen)
 - Will update after the synthesis school.
- Mosaic guide (Steve)
 - http://evlaguides.nrao.edu/index.php?title=Mosaic_Observing
 - Move this into the OSS as a link once it moves into plone.
 - Still need to add a link to Andreas’ mosaic processing task. Steve will give a description of how to run it. Andreas has written the documentation in the task help.
- The observational status summary (OSS, Gustaaf)
 - This has been ported to plone but is not yet updated with all the proper links.
- Call for proposals (Deb & Claire)
 - Deb is writing the first draft and will give this to Claire for her to start working on.
- Joan will be updating the science scheduling plan for the next config cycle.
- CASA documentation
 - Jurgen is focusing on this.

- Claire will be writing documentation for the pipeline after the call for proposals. This is not urgent.

Pipeline status:

- There is a script-based pipeline that the heuristics is being developed in. This is being ported to CASA 3.4 (it is currently in CASA 3.3). Ed Fomalont will be here next week to help define what the output logs will be for the CASA pipeline.
 - ***Heuristics discussion will continue this Friday at 9am in rm 317. Please come if you are interested in participating.***
- There will also be a pipeline task in CASA that will be using the same heuristics as the python script.