

Subject: [allemploy] FYI: 20 Apr 2009 BIWEEKY CALENDAR OF THE ALMA PROJECT at NRAO
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Date: 5/18/2009, 10:52 AM
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BIWEEKY CALENDAR OF THE ALMA PROJECT at NRAO
20 Apr 2009 – 4 May

***** THIS FORTNIGHT*****

The two ALMA antennas that have been outfitted and characterized by the ALMA teams over the past months now have their surfaces set to much better than the 25 micron specification when pointed at an elevation of 50 degrees, known as the rigging angle. Both antennas have had their individual parameters determined through total power tests run by the AIV (Assembly, Integration and Verification) team led by Joe McMullin, and by the science team led by Alison Peck. As a measure of merit of these models, both antennas were pointed at the holography tower early in April and static fringes were observed from the beacon used for holography. Doing this on an astronomical source requires good focus and pointing. During April, numerous observations of SiO maser stars have provided good radiometric pointing models. On 2009 April 30 both antennas were pointed at an astronomical source, Mars, and static fringes were observed. Present at the event were Gene Duvall, Dick Sramek, Lewis Knee, Norman Saez and Hector Alarcon with off-site support from Peter Napier and Darrel Emerson. The team will proceed with the next steps, culminating with ALMA software controlling all aspects of the observation in today's observation the geometric delay in the signal paths between the two antennas was calculated independently, for example. The next software implementation will contain all of the functionality to do this and other calculations automatically. When this occurs (in June), we refer to the fringes as 'dynamic'; it is dynamic fringes that ALMA will generate when it blazes a path toward transformational science.

On 29 April 2009, the second production antenna designed and built by the Vertex division of General Dynamics Corp. under contract with Associated Universities, Inc. conditionally passed its acceptance tests and was accepted by the project. An ALMA transporter moved this antenna to foundation No. 4 at the nearby OSF and antenna outfitting began immediately. This antenna will be equipped with the Front End recently delivered from the European Front End Integration Center at Rutherford Appleton Labs.

Past issues of this Calendar may be viewed at
<http://www.cv.nrao.edu/~awootten/mmaimcal/ALMACalendars.html>

General Happenings
Photos of activity may be found at NRAO eNews:

<http://www.nrao.edu/news/newsletters/>

Sky: Venus and Mars rise before dawn; Saturn rules the night from Leo's belly.

SCO (Santiago Central Office): Schedule and configuration control boards met. Several Interface Control Documents (ICDs) were approved.

AOS (Array Ops Site, 16570ft altitude): To date, 85 foundations have received structural concrete. The 22 foundations for ACA antennas have been completed insofar as excavation and concrete procedures go.

OSF (Ops Support Facility, 9600ft altitude): Beam map measurements at 3mm (Band 3) of planets and quasars were made with DV01. Pointing models at 3mm (B3) and 1.3mm (B6) were made with DV01, for which focus curves were also established. For PM03, Az jumps seen in OPT data were investigated. The newly accepted Vertex antenna No 2 (aka DV02 or AIV3 or 9002) was accepted and moved to TF pad no 4. Antenna #3 Finishing acceptance tests prior to start of formal pointing tests scheduled to begin 27 April. Acceptance should occur in June for this antenna. Vertex No 10 is scheduled to arrive in port in early May. Until that occurs, there are three accepted antennas, seven Vertex antennas under construction, three Melco antennas and one AEM antenna awaiting erection, in addition to portions of others. The newly refurbished meeting hall in the OSF Technical Facility (TF) was used for a special safety and security meeting. The steel pedestal support for the European antenna arrived the week ending 20 April. Amplitude Calibration Devices No 5 passed provisional acceptance In-House (PAI). A support team from ESO will travel in early May to the OSF to assist with the Provisional Acceptance Site (PAS) and installation of these units.

AOC: Stephane Gauffre and Silvio Rossi will visit Socorro the week of 2009-04-20 to work with (Digital Transmission System (DTS) and Antenna Article (AA) PAI personnel. CASA release 2.4 is in preparation.

NTC: NA-FEIC Operational Readiness Review (Apr 16 - 17, Charlottesville) was chaired by Jacob Kooi. Several items are being addressed. The first of two Laser Synthesizers shipped from Teraxion (destined for Charlottesville) on Tuesday, 2009-04-14. The second followed on Wednesday, 2009-04-15. The SoW for shipping Correlator Quadrant 2 is complete. Assembly of the third quadrant continued. The ATF 2-antenna correlator is under test by the Computing IPT.

TUS: ALMA participated in an NSF large facilities meeting and a NEON meeting and was featured at a U. Az. radio astronomy lunch.

NAASC: Preparations are concluding for the Sept 21-24 Workshop, fourth in a series on transformational science with ALMA. Registration should begin 2009 May 4, Preparations are also under way for the Operations

Software Review in June.

A calendar of NAASC events may be found at:

http://www.cv.nrao.edu/naasc/alma_calendar.shtml

DAILY CALENDAR (Times EDT/EST) see

<https://wikio.nrao.edu/bin/view/ALMA/AlmaCalendar>

***** UPCOMING EVENTS *****

Apr 20-22 20th Intl Symp. on Space THz Technology, Charlottesville
May 14 Herschel launch? Webcasat begins 1300UT 14 May at:

http://www.videocorner.tv/videocorner2/live_flv/index.php?langue=en

May 26-29 Advancing Chemical Understanding thru Astronomical
Observations

Jun 1-2 Ops software requirements review, Santiago

Jun 8-12 mm and submm Astronomy at High Angular Resolution, ASIAA

Jun 22-25 Band 4 and 8 FE CDT & PAI Tokyo

Sep 21-25 Assembly, Gas Content and Star Formation History of
Galaxies

***** TECHNICAL NEWS *****

Congratulations to the Herschel/Planck teams on the successful launch of
the duo toward their L2 orbit!

*****ALSO OF INTEREST*****

CALL FOR OBSERVING PROPOSALS FOR NRAO TELESCOPES

Deadline: 1 June 2009, 5:00 P.M., EST (21:00 UTC)

Proposal preparation and submission are via the Proposal Submission
Tool at <http://my.nrao.edu>. Several modifications to the PST have
been made and will be in place starting 12:00 EDT (noon) Friday, 15
May 2009.

CALL FOR GBT PROPOSALS - Trimester 09C

The 1 June deadline will cover the 09C observing period from 1 October
2009 through 31 January 2010. We will accept proposals for the following
receivers: 290-920 MHz (PF1), 910-1230 MHz (PF2), 1.15-1.73 GHz (L),
1.73-2.60 GHz (S), 3.8-6.1 GHz (C), 8.0-12.0 GHz (X), 12.0-15.4 GHz (Ku),
18.0-26.5 GHz (K), 26.0-39.5 GHz (Ka), 38.2-49.8 GHz (Q) receivers and
Mustang (80-100 GHz Bolometer Array). SEE

<http://www.gb.nrao.edu/gbtprops/latestgbtcfp.shtml>

CALL FOR VLBA/HSA/VLBI PROPOSALS - Trimester 2009-T3

Proposal deadline is 2009 June 1 for trimester 2009-T3

<http://www.vla.nrao.edu/astro/guides/news/>

CALL FOR VLA/EVLA PROPOSALS -

The 2009 June 1 deadline is for the last trimester to use the VLA
correlator before it is turned off and the VLA becomes the EVLA,
using the WIDAR correlator. Proposals for the DnC and D
configurations will be considered at the June 1 deadline, along
with proposals to use the reconfiguration time from the C

configuration to the DnC configuration and the reconfiguration from the DnC to the D configuration. The VLA D-configuration will be followed by an EVLA D-configuration using the WIDAR correlator. There will be a separate call for proposals for the EVLA D-configuration for the 2009 October 1 deadline.

CALL FOR OBSERVING PROPOSALS FOR THE CALTECH SUBMILLIMETER OBSERVATORY

The Caltech Submillimeter Observatory (CSO) encourages observing participation by astronomers from both U.S. and non-U.S. institutions. The observatory consists of a 10.4 m diameter telescope on Mauna Kea, Hawaii. Receivers are available from 200 to 400 GHz with noise temperatures of about 100 K (DSB) and, from 400 to 730 GHz at about 200 K (DSB). A receiver is available from 780 to 920 GHz with a noise temperature of about 250 K. AOS back-ends of about 1000 channels are available with 1 GHz and 50 MHz bandwidths. A new FFTS spectrometer with 8192 channels and a selectable bandwidth of 1 GHz or 500 MHz is also available.

SHARC II, a 12, AW32 pixel bolometer camera for 350 and 450 μm is available with a sensitivity of about 1 Jy/beam, in one second for a 2.5' \times 0.9' field of view, in good weather. (More information on SHARC II and the heterodyne receivers can be obtained at <http://www.submm.caltech.edu/cso/>). Atmospheric transmission curves for the CSO, as a function of frequency, are available via a web interface at <http://www.submm.caltech.edu/cso/weather/atplot.shtml>.

Bolocam, a large-format bolometric camera for observations at 1.1 and 2.1 mm, is open to proposals (but see Bolocam web page at <http://puuoo.submm.caltech.edu/bolocam> for restrictions). Also, due to budget cuts and liquid He costs, proposers should contact Richard Chamberlin to estimate the helium costs which will have to be borne

by the proposer. At 1.1 mm, the camera has approximately 110,120 working pixels with 30" FWHM beamsize and 8' FOV.

Lodging and subsistence are provided free by the CSO, for two observers for each program. CSO 4WD vehicles are also available for our visitors to get to the CSO telescope from Hale Pohaku. However, visitors are required to rent their own vehicles to get to Hale Pohaku from the airport. A limited amount of travel money may also be available.

Proposals for observing time in the semester 1st September – 31st January, should include the CSO cover form (please use the latest version available on the web), a short abstract, and a two page scientific justification. In addition, the following information is now required and should be included with each proposal: (1) List of publications by all proposal Co-Is using CSO data (since 2002). (2) List of all students and postdocs who used the CSO (since 2002). (3) List of students who obtained a PhD using the CSO. The proposals will be reviewed by an external peer group committee and should be sent by 31st May 2009 to rena@submm.caltech.edu.

For further information please refer to the CSO web site at

<http://www.submm.caltech.edu/cso>.

This is a special ATNF call for proposals for the Australia Telescope Compact Array (ATCA) for the 2009 JULS. This semester is for ATCA proposals ***ONLY***. The CLOSING DATE for ATCA applications for 2009 JULS is 15 May 2009. Applications must arrive no later than midnight, Australian Eastern Standard Time (equivalent to 14:00 UT).

All applications must be submitted using OPAL. See

<http://opal.atnf.csiro.au>.

The 2009 JULS will run for a 10-week period from 15 July until 30 September 2009. We expect that three CABB observing modes will be available by September 2009, including a high resolution zoom mode that is available for the first time. For the latest information it is essential to read the CABB documentation on the ATNF web pages.

<http://www.atnf.csiro.au/observers/apply/avail.html>

ATCA proposals not completely scheduled in the 2009 APRS semester that require further observing time should be resubmitted for consideration in the 2009 JULS semester.

Please note that because of the need for local knowledge in using the new CABB systems, remote observing is expected to be restricted.

A further announcement will be made in mid-May 2009 for the 2009 OCTS.

This will be a standard six-month semester and applications will be invited for all ATNF facilities.

Please send information for upcoming calendars by Friday evening of the preceding biweekly period to Jennifer Neighbours or Al Wootten via e-mail (jneighbo at nrao.edu or awootten at nrao.edu).

The calendar will be issued between late Friday and sometime on Monday by e-mail to all NRAO scientific staff members and anyone else interested. A specific mailing list, alma-info, has been created for anyone wishing to receive it.

Past issues are available at

<http://www.cv.nrao.edu/~awootten/mmailcal/ALMACalendars.html>

Allemploy mailing list

Allemploy@listmgr.cv.nrao.edu

<http://listmgr.cv.nrao.edu/mailman/listinfo/allemploy>