

ATNF Director's Response ATUC meeting 24 October 2006

	ATUC Recommendation	Director's Response	Traffic Light
Item	Previous recommendations:		
1	There are still ongoing issues regarding items 1 and 2a of the previous Director's report (regarding documentation and keeping it up-to-date). Phil Edwards has notified ATUC that a new release of the ATCA Users Guide (scheduled for October 2006) should be available soon. ATUC welcomes the impending release of the latest version of the Users Guide, but recommends that consideration be given to future versions being maintained by a wiki to which experienced observers could also contribute. This could be done not only for the ATCA Users Guide (incorporating the currently separate 3 mm and 12 mm documents), but also other observing-related documents at Narrabri and elsewhere. Sarah Maddison and George Hobbs would be happy to consult with ATNF staff on ways to implement this.	The idea of using wiki for various types of documentation, including Users' Guides, is being actively discussed. We will explore it in the current redevelopment of the Mopra Users Guide.	Green
2	ATUC notes that the situation re item 2b from the last report (i.e. 3 mm calibrator flux monitoring) is now very good, and recommends that a reference set of 3 mm calibrator observations should again be undertaken at the start of the 2007 mm season.	The ATCA schedule for the 2007 mm season has been constructed and this recommendation has been followed.	Green
3	ATUC notes that item 6 (eVLBI demonstration datasets) has not been addressed yet and reiterates the desirability of releasing such datasets.	The format of VLBI datasets has not changed. Analysis of the VLBI data is not strongly dependent on its origin and the procedures are detailed by the VLBA (http://www.vlba.nrao.edu/astro/datacal/) and the EVN (http://www.evbi.org/user_guide/analysis.html). Demonstration datasets from the LBA can be made available but the effort on documenting every step for novice users is large (~1 person-month). With competing higher priority issues (e.g, PAMELA, high-speed networks,...) the effort is not currently available. Support for new observers can be more efficiently provided on an individual basis.	Yellow
4	Regarding item 7 (unanswered emails regarding green time requests at Parkes): the proposed use of the recommended email distribution lists sounds reasonable, though this is not stated on the "Use of Director's Time" web page at Narrabri, or anywhere at all on the Parkes web pages (except as a "catch all" at the top of the User Guide). It should be documented on the web, where users can find it. We ask the ATNF to announce the change in an email to make it prominent to users.	Email addresses narrabri-oic@atnf.csiro.au and parkes-oic@atnf.csiro.au have been set up and advertised for use in requesting Director's time.	green
5	The Director's reply to our last report did not respond to the comment: <i>Regarding IM, PT/VC (Skype, Googletalk) access for visitors. These are important tools for users and ATUC would like to see them available on the pink cables. Visitors use a variety of software types and versions (and configurations) so access from personal laptops would be preferable.</i> ATUC still considers this an issue of interest to users, and would welcome a response.	Skype does work and has always worked from the visitor network (pink cables). Users should assume that any messaging facilities that do not work on the pink cable network are unlikely to comply with CSIRO's security standards. Such software will remain inaccessible to ATNF users.	yellow

	New recommendations:		
6	ATUC would like to see more information at our next meeting about several of the proposed development projects (e.g. ATCA 115 GHz upgrade, ATCA 3 mm polarisation capability and noise diode installation, building combined 20/13 cm and 6/3 cm receivers for Mopra, WVR etc.) so as to be able to rank them against each other. We seek guidance on whether software projects should be included in such a review. We would welcome a clearer idea on the available resources related to project development and operations in the future, once this is known.	At the next ATUC meeting, the ATNF will present information on possible future development projects. The ATNF will also keep ATUC informed of future resources for operations and development as well as these can be estimated. (See item 14 below.)	green
7	ATUC sees the Tidbinbilla 12 mm upgrade project proposed by Jim Lovell as a useful future project, but did not think it was urgent that this be implemented by the start of the winter 2007 observing season.	Noted.	
	ATCA/Mopra issues		
8	(a) <i>Mopra support scientist</i> ATUC sees a strong need to have the position of Mopra support scientist refilled with high priority, and ideally with continuity over several years to retain experience. We also note the recent loss of several mm experts from the ATNF scientific staff, and encourage hiring another astronomer with millimetre expertise, if possible.	The ATNF has opened two positions, a mm-band research astronomer to be based at Marsfield, and a support scientist to be based at Narrabri to assist with both mm-wave astronomy and the 7mm NASA spacecraft tracking contract. In addition, a number of currently vacant post-doctoral positions are being filled with astronomers with experience in the mm bands.	green
8	(b) <i>Remote observing issues at ATCA</i> There is now an improved script which opens up all the required windows on a remote observer's machine. Most of the remaining issues relate to incompatibilities in software running on the machines connecting with one another. ATUC recommends that this script be documented and made available to all users. We would also like to know whether VNC can be used for remote observing. ATUC welcomes the possibility of Mopra remote observing being made available from locations other than Narrabri in the future.	The remote observing script is documented in the Guide to Remote Observing page, http://www.narrabri.atnf.csiro.au/observing/rem_obs.html Improving access to remote operation of the ATCA and other ATNF observatories is being discussed within the ATNF. Although VNC might appear to offer such improved access, it presents too great a security risk. In particular there is the possibility of control being taken without permission, or worse, unauthorized access to the ATCA. The ATNF is considering changing CAOBS to be the server in a client/server model. In this way, CAOBS would always run at Narrabri, irrespective of the link quality to the client (remote observer).	green
8	(c) <i>12 mm and 3 mm observing outside the official mm season</i> Both 12 mm and 3 mm observations with the ATCA are feasible (particularly at night-time) outside the nominal winter season. ATUC recommends that users be reminded of this, particularly in the context of the recent Narrabri Atmospheric Seeing Monitor statistics paper by Middelberg et al. (2006, PASA), which clarifies some of the phase-quality issues involved.	Users will be given this advice at the next call for proposals.	green
8	(d) <i>Water Vapour Radiometer (WVR)</i> ATUC encourages the ATNF to consider reinstating a WVR project at Narrabri to improve phase tracking at 3 mm, and to develop links with IRAM, where such a system has recently been implemented.	This topic has been discussed internally and with Michael Burton of UNSW. Michael Burton has asked Jonathon Crofts, who built the two WVRs we have, for the cost of building four more units, with a view to submitting a LIEF grant. The ATNF is concerned that it does not have sufficient staff with the necessary skills, and the time, to properly integrate WVRs into the ATCA systems.	yellow
8	(e) <i>Accommodation for Mopra observers</i> ATUC notes that, as clarified by Phil Edwards at our meeting, remote observing from Narrabri is now the default for Mopra observing, but experienced observers who prefer to stay at	ATUC has misunderstood Phil's clarification. It should be : "Remote observing from Narrabri is now the default for Mopra observing, but UNSW observers can observe at Mopra if they stay at Siding Spring." Anyone with a	green

	Mopra can do so. We encourage ATNF to make self-catered accommodation available at Narrabri next winter for longer-stay Mopra observers.	compelling science case for observing on-site will have their request considered. The ATNF is considering the flat and cottage available for self-catering. We propose charging the going rate, \$44 per night, with the addition of a small surcharge, say ~\$1 to \$2 per night, as there is an extra cleaning overhead on lodge staff when the flat and/or cottage are used.	
	Parkes issues		
9	Pulsar observers appreciate the flexibility of instrumental setups available at Parkes, but have also raised concerns that only one person (John Reynolds) currently has full knowledge of how to perform the setup. ATUC strongly recommends that every standard observing mode be documented so that at least two staff members can perform the necessary tasks to set these up for observers.	Documentation to render all commonly-used observing modes is maintained in the Parkes User Guide, which the Observatory aims to keep up to date as changes occur. Brett Dawson and John Sarkissian are familiar with all these. Naturally, as new configurations are developed to meet particular user's requirements it can take time for these to be refined to the point of being operationally routine.	green
	Tidbinbilla		
10	The topic of VLBI scheduling and the (lack of) availability of Tidbinbilla during VLBI observing weeks was discussed at length by ATUC. ATUC requests that the ATNF make a high-level approach to NASA to see if anything can be done to improve Australian access to the Tidbinbilla 70 m during scheduled VLBI weeks.	A high level between ATNF and Tidbinbilla management has been scheduled to discuss this issue. Such discussions have taken place in the past, and there is no certainty of improving the access to the 70m.	yellow
	LBA/VLBI		
11	ATUC sees the PAMELA (Parkes ATCA Mopra e Long-baseline Array) concept as an integral part of the future eVLBI developments, and suggests that the idea be publicised more widely in the community. It was noted during the meeting that this concept would benefit from the availability of CABB-type backends and 6/3 cm and 20/13 cm wideband receivers at all three observatories. The lack of a central repository for system temperature values of telescopes participating in VLBI runs was mentioned. Can such a list be made available for VLBI observers?	The ATNF is giving development of PAMELA high priority within the eVLBI project. The ATNF notes and agrees with ATUC's comment on the desirability of compatible front and backend equipment at all elements of PAMELA. The logfiles for all VLBI runs are publicly available in ftp://ftp.atnf.csiro.au/pub/people/vlbi/ , under the observation numbers. The Tsys values are available, often as part of the logfile, and tools exist for the extraction of Tsys values into tables. We plan to automate this process and distribute these tables with the correlated data.	green
	National facility office/OPAL/TAC		
12	A user raised concerns about the amount of ATCA time given to long-term projects under the lead of ATNF PIs. ATUC recommends placing a statement on the PI statistics page to the effect that ATNF staff have no guaranteed telescope time or priority in any way, as well as an explanation of what constitutes "continuing proposal" status and a list of proposals which have continuing status. ATUC were impressed by the video conferencing facilities now available at Marsfield, and would like to see similar systems installed at Narrabri and Parkes.	Usage statistics of ATNF telescopes are frequently presented in a number of fora and in the Annual Report. These show that the distribution of large projects is consistent with the distribution of requests: there is no evidence for ATNF scientists receiving preferred treatment. The ATNF TAC is composed of Australian radio astronomers; a majority of committee members are non-ATNF staff, by design, to guard against pro-ATNF bias. The TAC has recently revised the definitions of "large" and "continuing" projects. The new policy appears at: http://www.atnf.csiro.au/observers/apply/large_projects.html Video conferencing facilities will be installed at Parkes and Narrabri by June 2007.	yellow
	Software & computing		
13	(a) <i>Miriad review & implementation</i> ATUC notes the points made in the Miriad review and points	Noted	

	out the importance of their implementation.		
13	<p><i>(b) Support of AIPS ATLOD for disk-based VLBI</i> AIPS is the critical reduction package for VLBI, as it is the only package that contains essential VLBI-specific tasks, such as FRING. ATLOD has worked well for data out of the ATNF S2 correlator, but now we are moving to a disk-based VLBI system and a software correlator, run at Swinburne. The software correlator can produce datasets with: much shorter integration times than from the S2 correlator; many more frequency channels than from the S2 correlator; more IFs than from the S2 correlator; and, as a consequence, much larger data volumes than from the S2 correlator.</p> <p>Each of these increases in capability breaks ATLOD in AIPS in one way or another, making reduction of the new software correlator datasets currently very difficult.</p> <p>Given its importance to the newly upgraded VLBI systems and the high demand from users for the new VLBI facilities, ATUC recommends that ATLOD in AIPS become an officially supported ATNF suite of software, and that it is modified for use with the upgraded VLBI system as a matter of urgency.</p>	Support and upgrades of ATLOD are labour intensive. A better strategy we are investigating is to have the correlator output in standard IDI FITS format, the same as all other VLBI networks. Then standard NRAO AIPS will support the LBA output. However, this development will also require significant resources. We will support a legacy ATLOD version to read older RPFITS VLBI files.	yellow
13	<p><i>(c) Software installation and documentation</i> ATUC requests that Miriad and other software for Mac computers is supported and documented, given the increasing number of astronomers using Macs.</p>	Miriad is available for Mac computers and is now part of the standard ATNF distribution.	green
13	<p><i>(d) ATNF web page search facility – still an issue</i> ATUC members note that it remains extremely hard to locate information on the ATNF web pages, and almost impossible to find anything by using the search engine. The current layout and structure are unintuitive, and need improvement. This is an important issue, because an increasing fraction of the feedback received by ATUC relates to information which ATNF has actually made available, but which users have been unable to find.</p>	The ATNF acknowledges the need for improvement in ATNF web pages. ATUCs comments are noted and plans for improvement will focus on ease of accessing information for users. We do not expect significant improvements within the next six months	yellow
	ATNF Operations		
14	ATUC would welcome more information about the ongoing operational review and would like to be involved in the review process (across all facilities).	The internal operations review will be discussed at the next ATUC meeting.	green
	Any other business		
15	Please could we have (labelled) vegetarian meals at future ATUC meetings?	noted	