

ILRS GOVERNING BOARD MEETING
INFN, Frascati, Italy
8 November 2012

Attendees:

Board Members (11): Graham Appleby (Chair), Pippo Bianco, Cinzia Luceri, Erricos Pavlis, Jan McGarry, Toshi Otsubo (for Hiroo Kunimori), Dave McCormick, Francis Pierron, Randy Ricklefs (for Horst Mueller), Georg Kirchner, and Mike Pearlman.

Invitees: Tom Varghese, Linda Thomas, Howard Donovan, Scott Wetzel, Julie Horvath, Line Langkaas, Sara Bruni, Stefania Contessa, Per Erik Opseth, John Degnan, Stephen Merkowitz, and Mark Torrence.

Central Bureau Report:

Annual data yield continues to increase. Some stations are tracking additional GNSS satellites, but we agreed that ILRS Report Card should take into account only missions included in the ILRS roster. We should also encourage stations not to concentrate too much on tracking Ajisai; a pass a day per stations is sufficient and efforts should be spent on the other satellites.

Leap Second

There were some problems with the June 30/July 1 leap second. The implementation at the stations was pretty much automatic; the real problem was improper use of the leap second flag in the predictions. Prediction providers have been contacted. Randy Ricklefs has prepared a brief for posting on the ILRS website. The broader community is wrestling with the issue of whether or not to continue applying the leap second to synchronize UTC with astronomical time. For historical reasons it is probably best to leave things as they are. We should communicate with the other services to discuss a common position.

ACTION: The CB will contact the other Services to discuss their position on the future of the leap second.

Configuration Reporting

Lack of consistency in the way that we record systems and procedure changes at the stations is leaving us unable to account for some discrepancies in the data. Randy Ricklefs has suggested some procedures including reimplementation of some reports used in the past, but we were urged to simplify the process as much as possible. Several ideas were suggested.

ACTION: Randy Ricklefs will work with the N&E WG to recommend an approach.

Transition to CRD Format

The transition to the CRD data format has been completed. This has been a long haul, but the new format gives us considerably more accuracy and flexibility.

Normal Point Recipe

The new normal point recipe for the high repetition rate systems has been used very successfully and has led to mm precision normal points at some stations.

Analysis Report

The ILRS data products are being regularly submitted. Pilot projects on atmospheric pressure loading, low order- low degree gravity field terms, and satellite center-of-mass modeling are underway. The AWG is continued operational support for the CRD format transition and is now assessing the quality of the three new Russian SLR stations. Work continues on the Journal of Geodesy Special Issue.

LLR Report

With the recent LLR activity at Grasse and Matera (congratulation by the GB to MEO and MLRO), the LLR data yield has increased considerably. The data from the Apollo station for the past couple of years has still not been submitted. Randy will transfer the Apollo data to CRD when it is available. Comparison of LLR software is underway among CfA (PEP), Paris (INPOP) and Hannover.

Safety

The Graz station is using the generally used aircraft transponder (FLARM TRX 1500 air traffic sensor) as part of its aircraft safety program; all commercial aircraft and most private aircraft will carry the transponder over the next few years.

RadioAstron

Tracking to RadioAstron is practically nil with only MeO having any success. The Texas station now has a camera that should allow that to do optical acquisition. We should encourage other LLR stations to try to track RadioAstron.

New Stations

The new Russian stations at Svetloe, Zelenchukskaya, and Badari have sent in some test data for review by the AWG. The new SLR station in Sejong, Korea is preparing to send in some test data.

Debris Tracking and Support for Envisat

It was agreed that debris tracking programs are important, but not the business of the ILRS. ILRS stations may participate privately. There is concern that use of higher power lasers for debris tracking may pose a risk to active satellites that may be coincidentally in the field of view. The case of deceased Envisat spacecraft may be different. The satellite is slowly tumbling which may have some influence on its reentry path and schedule. Some ILRS stations have observed the tumbling pattern in their (on – off) SLR return pattern. The ILRS will consider making this an official task once a request is made with some statement that the information is of some use.

GGOS

Fifteen responses to the GGOS Network Call for Participation have been approved so far covering 36 sites. New submissions from the Norwegian Mapping Authority and the Russian Academy of Sciences are now under review. A table projecting future station capabilities (based on the result from the CfP and plans by other groups) is being formulated for use in the simulation activity to examine product quality as a function of predicted network implementation. .

Laser Workshop

The 18th Workshop on Laser Ranging is scheduled for 11 – 15 November 2013 in Fujiyoshida, Japan. The Local Organizing Committee is being established; T. Otsubo is the LOC chair and Nakamura is the program Chair. The organizers plan to include collaboration with World Data System and a strong promotion to include young scientists. It was suggested that we limit the proceedings to an electronic version and keep to an informal review process. Working Group meetings will be scheduled during the week, however, as usual, the all-day Analysis Working Group meeting will take place 9:00 – 17:00, Saturday, November 9, 2013, in or around the LW18 venue in Japan.

Per Erik Opseth from the Norwegian Mapping Authority made a short presentation arguing that the ILRS should seek more standardization among SLR systems to make it easier for new groups to join the activity.