43rd Directing Board Ersatz Meeting II – Minutes

Location:	2-hour Zoom meeting
Date:	17 December 2020
Note taker:	Dirk Behrend
Version history:	28 December 2020

Attending Board members: Axel Nothnagel (Chair), James Anderson, Dirk Behrend, Johannes Böhm, Patrick Charlot, Francisco ("Paco") Colomer, Alet de Witt, John Gipson, Rüdiger Haas, David Hall, Hayo Hase, Nancy Kotary, Evgeny Nosov, Chet Ruszczyk, Gino Tuccari, Stuart Weston.

Absent: Jinling Li.

1. Welcome

Axel Nothnagel welcomed the attending Board members.

2. Approval of agenda

The Board approved the agenda for the ersatz meeting.

3. Proposals for IVS Resolutions

Stuart Weston drafted an IVS Resolution on Recording and Submitting Meteorological and Clock Offset Data. The resolution requests the IVS Network Stations to submit these data types to the seamless auxiliary data archive at Wettzell in a continuous fashion. The Board agreed to the content in general terms. Stuart and Axel will prepare a final version of the resolution for distribution and approval in January. James Anderson submitted a draft of an IVS Resolution on Critical Telescope Parameters shortly before the meeting. This resolution will be discussed offline after the meeting.

4. Data storage issues

The data center at CDDIS enhanced its data storage capacity to be able to hold Level 1 data ("visibility data", SWIN data files). The mechanism for ingesting these large files was set up in the context of a new ingest procedure for all data centers that adds validation (quality control) routines for all data/products and uses data description files. The correlators have to prepare a special tarball for the SWIN files (requiring a dedicated archiving script) and need to register with CDDIS as submitter for this data type. When the SWIN file handling system went live at

CDDIS in early December, the data center was brought down to its knees. CDDIS was investigating the cause of the collapse. The SWIN files will not be mirrored to BKG and OPAR, at least in the immediate future. All other data/product types will be fully mirrored (including vgosDB) once the new ingest procedure is operational at all three data centers.

5. IVS Web presence and press activities

Dirk Behrend and John Gipson prepared a NASA-internal future release document for the IVS website (ivscc), which was under review in a second iteration within SGP. There is a chance that BKG will discontinue to mirror the IVS website; Onsala would be willing to function as a mirror site if needed. Another candidate would be the Yebes group. Nancy Kotary prepared outreach material for the upcoming T2++ sessions and sent it to Axel for comments. She contacted the author of a Science Magazine article (doi:10.1126/science.abf8476) that described the ICRF without mentioning VLBI or IVS. Axel suggested to collect IVS-related publications on the Outreach website (vlbi.org).

6. DB Elections 2020

The Election Committee (Hayo Hase, Nancy Kotary, Gino Tuccari) with support by the Coordinating Center (Dirk Behrend) ran the representative elections. The voter turnout was at 53.5% and thus significantly higher than the previous two elections. The Helios electronic ballot system worked fine. It is recommended to update the Associate Member list prior to the (next) elections. For the at-large elections, ten nominations were submitted. The candidates represent ten countries from five continents covering all areas of VLBI; notably, there are six female candidates. The Board submitted their votes to the OpaVote system to allow for ranked voting. Axel will cross-check the results to make sure the weighting scheme was applied properly (as about 50% of the Board ranked all ten candidates as opposed to only three) and will announce the verified results.

7. Further development plans, Science Plan, PIs of series

Relating to the Infrastructure Development Plan it surfaced that NASA would need a Science Plan in order to be able to invest in infrastructure. The IVS, however, is primarily a service and does not run on a proposal basis. It may be possible to prepare an overview document of science done with IVS data, similar to the EVN Vision document. But preparing such a document is a multi-annual effort. John Gipson will talk to SGP leadership for further clarification and prepare a memo. For institutions looking for reasons why an observing program (e.g., R1, CRDS) is funded, it is useful to compile a short report making the science case. To this end, writing teams could be established.

8. Network DOIs

Correspondence started on assigning DOIs to IVS data with members of the GGOS WG on DOIs for Geodetic Data Sets. The data publishing journal Earth System Science Data (ESSD) may be a vehicle to publish articles on IVS data sets.

9. More on fixing frequencies for VGOS observations

The fixing of the VGOS frequencies falls into the realm of the VTC and the technology development. Currently the four frequencies are frozen but not fixed. The VTC established two subgroups: 10-s integration (led by B. Petrachenko) and source structure (led by P. Charlot).

10. IVS operations, flux density catalog

The IVS mailing lists are hosted at a centralized NASA service. This service was announced to be discontinued by the end of the year with very little notice. Pushback within the agency has resulted in a continuation of the service for an undisclosed time frame. To be on the safe side, the Coordinating Center looked into alternatives and made a snapshot backup of the existing lists in mid-December.

With the retirement of Dan MacMillan, the maintenance of the flux density catalog will likely be assumed by Karen Baver. The catalog currently covers S and X bands; an extension to the VGOS frequencies will be looked into.

11. Miscellaneous

The IAG requested feedback from all services on a position paper on sustaining the Global Geodetic Reference Frame (GGRF) and a concept paper on establishing the Global Geodetic Centre of Excellence (GGCE) in the frame of the UN-GGIM initiative. The feedback is requested by the end of January 2021. The Coordinating Center will start compiling input from the Board members from the second week of January onward.

12. Planning of further meetings and decisions in times of COVID-19

12.1 Next EVGA meeting

The next EVGA meeting will be held virtually and is planned for 15–19 March 2021. The days will likely be organized as afternoon sessions only. The LOC and SOC are set up. The subsequent EVGA meetings will be held in Potsdam (2023) and Paris (2025).

12.2 Procedure for electing the next IVS DB Chair

As outgoing chair, Axel is willing to moderate the election of the new chair, who needs to be a member of the newly elected Directing Board. The first step will be to call for nominations.

12.3 Next DB meeting by telecon

The next Board meeting will be held via Zoom on 25 March 2021 @ 18-20 UT.