

Recommendations from Session "IGS network issues & challenges"

1. The IGS shall define and set up a process with all other networks who share a common station, to communicate with each other when there's a new site log or some kind of an activity on that station.
2. The IGS shall define and set up a procedure to assure that only monitored IGS stations contribute to the IGS (core) products.
3. The IGS acceptance process for new stations :
 - A. Needs to define "critical world areas": Stations from those areas that pass all other criteria (i.e.: Africa, Antarctic, Hudson Bay, ...) should become IGS stations without question.
 - B. Needs to request antenna mounting pictures before adding the stations to the IGS network; the pictures need to be updated when a change at the antenna, its monument or surroundings occurs.
4. The IGS shall develop a standard protocol for the different data centers/analysis centers to be able exchange information about data holdings and station problems. In this way, the user would be able to find out, using automated procedures, the most up-to-date meta data, the data availability and some basic quality statistics.
5. IGS station managers should announce when they make major changes at their stations, such as new antenna, etc... **before** the change is actually made. For the core IGS05 reference frame sites, this requirement is mandatory, except of course when an emergency happens.
6. The following improvements/additions to the information system kept by the IGS Central Bureau are encouraged:
 - A. Reduction of the latency when updating site log files (important for ultra rapid and rapid products)
 - B. Maintenance of a file indicating for each IGS stations the type of calibration that is available for the installed antenna/radome pair (useful for antenna working group).
 - C. For each IGS station: provide a link to all info available for that station, e.g. other independent analysis, working groups and pilot projects results, time series, PPP results (useful for all users of the station data)
 - D. Maintenance of realistic maps IGS station maps based on data availability not just log availability.

7. For the IGS data centers:
 - A. IGS data centers should remove bad RINEX data from the active archives.
 - B. IGS data centers are encouraged to check the consistency of the records in the RINEX headers with respect to the records in the site log files. In case of any inconsistency the RINEX file should not be accepted and the station managers should automatically be informed.
 - C. IGS data centers should check the completeness of the daily, hourly, and 15-minutes high-rate data files (as far as available). A service to merge the files to get as complete daily observation files as possible into the archive is appreciated.
 - D. IGS data centers should verify the latency of the hourly (and 15-minutes high-rate) RINEX files ; in case of a latency exceeding five minutes a message should be posted to the station manager (or at least a corresponding statistic for the IGS network should be sent out at regular intervals).

8. The IGS analysis centers are encouraged to inform the data centers and users about bad RINEX data. The standard protocol (2.) is the preferred means to exchange this information.