



Preliminary Analysis in view of ITRF2008

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The Product Center of the International Terrestrial Reference Frame (ITRF) has issued a call for participation in view of a new release of the ITRF, the ITRF2008. It is expected that the ITRF2008 will greatly benefit from the expected improvement of the reprocessing effort being undertaken by the Technique Centers of the four techniques (VLBI, SLR, GPS and DORIS). It is anticipated to have some if not all technique solutions available so that initial pre-analysis can be performed and their quality assessed. The preliminary analysis will focus on main issues related to the frame specification and its defining parameters: origin, scale, orientation and their time evolution. As the input data will be in the form of time series of station positions (weekly for satellite techniques and daily for VLBI) and daily Earth Orientation Parameters, a particular emphasis will be given to the first step of the ITRF2008 construction, namely the analysis of the temporal behavior of the frame physical parameters (origin and scale). As a function of solutions availability, other analysis aspects will be presented, such as performance assessment with respect to ITRF2005, re-evaluation of the consistency between the available local ties and space geodesy estimates, velocity agreement between techniques in co-location sites and the impact on the long-term frames of correcting geophysical fluid loading effects prior to the stacking of the time series of station positions.