DISCUSSION OF A HOMOGENEOUS, LONG TIME SERIES OF ALTIMETER DATA

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There currently three historical radar altimeter data sets, GEOS 3, SFRASAT and GOESAT and two on-going missions, namely ERS -- 1 and TOPEX/POSEIDON. In the mid 1990s, follow-on missions are under study or planned for GEOSAT, ERS -1 and TOPEX/POSEIDON. Scientists will need to use them to correspond to the data a sets together to get time and spatial coverage required by geophysical-oceanographic studies. However, existing Geophysical Data Record (GDR) data sets contain different formats, ephemerides, and instrumental and environmental corrections. We want to begin an altimeter forum devoted to the data a homogeneity problem. Getting homogeneity for these data is a scientific and a technical problem. On one hand, scientific issues include questions of long term data, models and algorithms, geophysical and geophysical corrections. Do we need to regenerate orbit with a series of standard constants, models and algorithms? Do we need to use standard models or other sensors to produce corrections? Definitely, the answers are positive to facilitate the study of the evolution of the ocean at multi-year time scales. On the other hand, technical aspects will be reviewed: definition of a common unit system, common reference frames, and common formats. PO, NAAC and AVISO have already demonstrated the ability to produce a merged TOPEX/POSEIDON GDR product. Both active archive centers propose to be focus points to gather requirements for altimeter data homogeneity and to organize actions in order to solve the corresponding problems.

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2. Session G1/01 9 - Operational Uses of Altimetry

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4. No additional equipment needed

5. Prefer oral session