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Poster

We will report on progress in understanding the waveform leakages and PTR changes that affected TOPEX Alt-A data. In addition, we will briefly report on studies of some numerical issues in retracking.

The effects of the leakages were found to have a limiting effect on the range of data that could be reliably used in the CalSweep measurements of the PTR. This also affects the Cal-1 data that are available throughout both Alt-A and Alt-B lifetimes. Possible methods of extending the PTR beyond the approximately seven usable lobes are being considered as it has been suggested previously that it is necessary to about 30 lobes to reach full accuracy. This suggestion is also being revisited.

A physical model of the PTR change based on changes in phase between the I and Q channels as originally suggested by R. Jenson of APL has been investigated. The model can reproduce much of the observed behavior, but the remaining differences make it unclear whether the model can be used to predict the temporal behavior better than the Cal-1 data.

Testing of waveform weights, masking, and PTR variations are continuing. OSTS session Instrument Processing Download to PDF