

## **PROCESSING 18.6 YEARS OF LAGEOS DATA**

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### **Abstract**

*18.6 years of good quality Lageos data are now available and can give us at last some refined value of the lunar node tide ( $\Omega_l$ ) as well as a better estimation of the secular drift of the dynamical flattening  $C_{20}$ .*

*Lageos data from 1985 until 2004, merged with Lageos2 data from 1993, were used to compute the time variations of the degree 2 coefficients of the Earth's gravitational potential. This was done with recent orbit standards, taking into account the latest developments on geopotential model from the GRACE gravity mission.*

*Several characteristic periods appear in the  $C_{20}$  spectrum which can be correlated mainly with tidal effects. But some inter-annual variations still remain, probably due to water mass displacement in the oceans as well as on the continents.*