

A NEW GENERATION OF RECEIVERS, A NEW MULTI-MISSIONS ORBITOGRAPHY AND ALTIMETRY CENTER

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DORIS was developed for precise orbit determination and precise positioning on Earth. Since embarking on its initial proof-of-concept mission on SPOT 2 in 1990 and on its first operational mission on TOPEX/POSEIDON in 1992 the DORIS system has taken every new challenge in its stride.

Three new satellites fitted out with dual channel second generation receivers have been recently launched: JASON 1 in December 2001, ENVISAT in March 2002 and SPOT 5 in May 2002. These satellites acquired a real autonomy thanks to DIODE navigator: self start, self-programming and real time on-board orbit determination and profit by an improved accuracy.

The satellites relay acquired and stored data at regular intervals to SSALTO, the new DORIS mission control center, in Toulouse, France. This center keeps a check on station operations, processes measurements, calculates the orbit of the satellites carrying the DORIS instrument, and archives and distributes data.