



## **Comparison of the heliospheric magnetic field in the declining phases of solar cycles 22 and 23: Ulysses**

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In the year to February 2006, the Ulysses spacecraft has traversed the latitude range from 20° to 40°S, a region previously explored at a time of declining solar activity in 1993-1994. This paper will compare and contrast the Ulysses magnetic field observations in this similar region of the heliosphere effectively one solar cycle apart and where the solar magnetic field has reversed polarity between the two sets of observations. Corotating Interactions are the predominant feature in both data sets but are present up to higher latitudes in the present data set. The influence of the heliospheric current sheet is still apparent as the spacecraft approaches 40°S in the present data set whereas its maximum latitudinal extent was 30°S in 1993. The interplanetary counterparts of coronal mass ejections are also present in both data sets. The observations will be related to the solar conditions pertaining in the two different eras.