

## **April 2002 magnetic storms: a comparison of the MSISE2000 data and the upper atmosphere model results**

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The theoretical thermosphere results on the neutral temperature, composition and winds obtained using the Upper Atmosphere Model (UAM) have been compared with the corresponding empirical MSISE2000 model data on T<sub>n</sub>, O/N<sub>2</sub> and winds calculated with MSISE2000 for the period of April 15-20, 2002 including quiet and magnetic storm days. A comparison has been made for the 350 km altitude. The theoretical results give the more increased (up to 300K) storm time T<sub>n</sub> values and correspondingly more decreased O/N<sub>2</sub> ratio than MSISE2000. These theoretical thermospheric parameters values give the better agreement of the corresponding ionospheric parameters (Ne, Ti, Te) with the incoherent scatter data obtained during the modeled period.

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