



Minor components of the terrestrial atmosphere during the 2nd campaign of IHY/CIP 57*

A. Gardini, A. Damiani, and M. Storini

Istituto di Fisica dello Spazio Interplanetario - INAF, Roma, Italy (alessandro.damiani@ifsi-roma.inaf.it)

On the occasion of the International Heliophysical Year the Italian Solar-Terrestrial community performed two coordinated campaigns (May 31-June 14 and November 30 - December 14, 2007) to characterize the solar-terrestrial environment during the current solar activity minimum phase (transition from sunspot cycle 23 to 24) in the period in which the sub-Earth point on the Sun is null. Ground based instruments managed mainly by Italian Research Institutes, together with those from some satellite sensors have been employed. Inside this initiative (IHY/CIP57, coordinated by M. Storini), in addition to topics strictly connected to the near-Earth environment (e.g., solar wind macrostructures, cosmic ray time history, Solar Wind/Magnetospheric coupling, ULF waves generation and propagation etc.), the monitoring of the chemical variability of the middle/upper atmosphere has been performed. In this contribution the trend of several minor components in the middle polar atmosphere and of the interplanetary medium parameters are reported for the second campaign of IHY/CIP 57. Moreover, gas phase chemical abundances of the MLS (Microwave Limb Sounder onboard the EOS AURA satellite) measurements have been compared with a previous climatology in order to point out potential differences from 2004 to 2007, which could be useful for the evaluation of Space Weather impact on Earth.

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