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## Earthshine observations - terrestrial Albedo

**P. Thejll**(1), H. Gleisner(1), T. Andersen(2), M.-O. Petersen(2), A. Ardeberg(2), A. Mattingly(3), L.W. Pedersen(1)

(1) Danish Meteorological Institute, Lyngbyvej 100, DK-2100 Copenhagen O, Denmark, (2) Lund Observatory, Box 43, SE-221 00 Lund, Sweden(3) Wheaton Internet Telescope at Grove Creek, Australia,

Earthshine is proportional to terrestrial albedo, among other things, and common mode rejection measurement techniques promise excellent accuracy for measurements of the ratio of Earthshine to Moonshine. Terrestrial albedo is an important factor in determining climate, and accurate values of planetary albedo are needed for climate change and climate mechanism research. To economically obtain stable and long series of accurate observations of albedo a robust and automatic system is required. Data are expected to be useful for calibration of existing and future instruments otherwise observing albedo, or absolute calibrated imaging instruments.

We present results obtained during a pilot-project which constrain the specifications for a planned automatic observation system. Funding for the system has been obtained from the Swedish research agency VINNOVA, and the instruments will be ready for operation before 2011.