Geophysical Research Abstracts, Vol. 9, 04214, 2007
SRef-ID: 1607-7962/gra/EGU2007-A-04214

Monthly forecasting at ECMWF

F. Vitart (1) and **F. Doblas-Reyes** (1)
(1) ECMWF

A monthly forecasting system based on 32-day coupled ocean-atmosphere global ensemble integrations once a week has been set up at ECMWF. This system has run routinely since March 2002 with 51 ensemble members. The forecast calibration is performed a posteriori using an ensemble of past integrations (the re-forecast). Probabilistic scores, such as the Brier skill score or the ROC score suggest that the monthly forecasting system displays some skill beyond day 10 in predicting weekly averaged 2-meter temperature, precipitation and mean sea-level pressure anomalies relative to the past 12 year climate at the global scale.For example, the monthly forecasting system successfully predicted warm temperature anomalies over Europe during December 2006 up to 3 weeks in advance. The monthly forecasting system is also useful for the prediction of African and Indian monsoon events and for the operational prediction of the Madden Julian Oscillation which is one of the most important sources of predictability in the sub-seasonal time scale.