

Benchmarking Polar WRF in the Antarctic

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A polar version of the Weather Research and Forecasting (WRF) model has been developed for the high latitudes by the Polar Meteorology Group of the Byrd Polar Research Center. Polar WRF has been extensively tested for Arctic land and sea ice regions as well as for Greenland. Here a comprehensive year-long evaluation of Polar WRF against Antarctic surface and upper air observations is summarized. This work is a prelude to the implementation of Polar WRF as the sole regional atmospheric model used in the Antarctic Mesoscale Prediction System.