4a.8 The MPAS global ensemble analyses in mesoscale applications

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The Data Assimilation Research Testbed (DART) system has been coupled to the nonhydrostatic Model for Prediction Across Scales (MPAS) model to produce global ensemble analyses and forecasts. The ensemble cycling system has been well tested for various month-long retrospective cases, and run reliably on higher resolution quasi-uniform meshes as well as variable meshes.

In this talk, we will discuss about mesoscale features represented by the global ensemble analyses on different meshes, and compare to the WRF/DART mesoscale ensemble analyses over the CONUS domain on the corresponding grid resolution in the Spring 2012 case study.