CESM Atmosphere Model Working Group Meeting
1 – 3 February 2012
Mesa Lab, Main Seminar Room
National Center for Atmospheric Research – Boulder, Colorado

WEDNESDAY, 1 February:

Joint Session: AWMG / WAWG

1:00 Co-chairs welcome and logistics

1:10 Dan Marsh – Comparing WACCM/CCSM4 20th century simulations

1:30 Hanli Liu – Evaluation of an internally generated Quasi Biennial Oscillation in WACCM

1:50 Chuck Bardeen – Cirrus Simulations Using Sectional Microphysics (CAM/CARMA)

2:05 Bo Tan – New parameterization for correcting the "Cold Pole" problem

2:20 ChihokoYamashita – Gravity waves and high-resolution modeling (using T799 ECMWF)

2:35 Simone Tilmes – The impact of climate engineering on temperatures and precipitation using an idealized solar dimming experiment

3:10 Charles Jackson – Control climate impacts and the response to greenhouse gas forcings: Small differences, big impacts

3:30 Rich Loft – NCAR computing outlook: Yellowstone and beyond

3:50 Mariana Vertenstein– New component grid capability in CESM

4:10 Peter Lauritzen – Transport schemes and orography datasets in CAM

THURSDAY, 2 February:

CAM updates and parameterization development in models

8:30 Rich Neale – Status of CAM development and simulation activities

8:50 Cecile Hannay – What's new in the AMWG diagnostics package?

8:55 Cecile Hannay – Timeslice experiments at high resolution. What does the resolution by us?

9:10 Phil Rasch – A description of progress on the "prescribed aerosol" CAM5 configuration

9:25 Xiaohong Liu – Evaluating and constraining ice cloud parameterizations in CAM5 with observations

9:40 Pete Bogenschutz – Preliminary Results of the Coupling of CAM with CLUBB

10:10 Peter Caldwell – Macrophysics/microphysics numerical coupling errors

11:00 David Mitchell – Measurements for Guiding Ice Nucleation, PSD and Morphology Parameterizations in CAM5

11:15 Chris Bretherton – Single-column study of low cloud feedback processes in CAM5 vs. LES

11:30 Yong Hu – Impact of a Cloud Thermodynamic Phase Parameterization Based on CALIPSO Observations on Climate Simulation

CAM, high-resolution and resolution dependence

1:00 Phil Rasch – CAM behavior with very high vertical resolution (as low as 10 m at the surface)

1:15 Po-Lun Ma – Resolution dependency of CAM5 physics and its ramification on aerosol transport into the Arctic

1:30 Kate Evans – CAM4 high resolution study comparison of T341 with T85

1:45 Andrea Molod – The Impact of resolution based changes in GCM Total Water PDF on simulations at different horizontal resolutions

2:00 Julio Bacmeister – High resolution CAM: Phenomena and issues

2:15 Kevin Raeder – Multi-instance CESM plus DART for Fully Coupled Assimilation

Dynamical core development and regional climate modeling

3:20 Bill Skamarock – An update on MPAS atmospheric dy-cores in CAM/CESM

3:35 Shian-Jiann Lin – GFDL's finite-volume Cubed-Sphere Dynamical Core: Basic formulation, performance, and its applications in weather and climate modeling

3:50 Mark Taylor – Regional resolution refinement in CAM-SE

4:05 Minghua Zhang – Progress on coupling WRF within CCSM for regional climate change studies

FRIDAY, 3 February:

CAM initialized simulations

8:30 Hsi-Yen Ma – Correspondence between short and long timescale systematic errors in CAM4/CAM5 explored by YOTC data

8:45 Steve Klein – Perturbed-parameter hindcasts of the MJO with CAM5

9:00 Dave Williamson – Quarter degree CAM5 precipitation characteristics in the eastern tropical Pacific in short forecasts

CMIP5 and CESM analysis studies

9:45 Tao Zhang – An evaluation of ENSO asymmetry in CCSM4

10:00 Rich Neale – An evaluation of atmospheric blocking in CESM and CAM

10:15 Jen Kay – CAM and the COSP cloud-simulator package