

Interannual Variability of Atmospheric Circulation in C20C Models

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The interannual variability of the seasonal mean consists of two components that are related, respectively, to (a) internal dynamics associated with intraseasonal variability and (b) slowly varying external forcings and slowly varying (interannual or longer) internal dynamics. Using an ensemble of model runs, the slowly varying component can be further separated into contributions from external forcings and slowly varying internal dynamics.

The interannual variability of the atmospheric circulation, represented by the 500hPa Geopotential Height, is shown for summer and winter in both hemispheres. The ability of the C20C models to reproduce the observed variability is examined. The impact of different external forcings, radiative and land surface, will be looked at.