



## **The European contribution to a Global Solution For Access to Climate Model Simulations**

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The data archive constructed for the third Coupled Model Intercomparison Project (CMIP3) was an integral part of the infrastructure which delivered the "Physical Science Basis" component of the fourth IPCC assessment report. That archive, hosted at the U.S. Program for Climate Model Diagnosis and Intercomparison (PCMDI) is still in use, and still integral to new peer reviewed publications. In planning the next Coupled Model Intercomparison Project (to be termed the "CMIP5" to align with the IPCC nomenclature), it became clear that while PCMDI can and will host the MIP core data (expected to be around 0.5 PB), there is much to be gained by having a set of replicates, globally distributed, along with a federation which allows the discovery and retrieval of data from the rest of the simulations (held in individual modelling centres). PCMDI, along with its Earth System Grid (ESG) partners, is leading a global federation to do just that, under the auspices of the Global Organisation for Earth System Science Portals (GO-ESSP).

In this presentation we describe how the British Atmospheric Data Centre and the Model and Data Group at the Max Planck Institute for Meteorology are going to host replicates of the MIP core data, and via the European Project IS-ENES, federate data from other European modelling centres in support of CMIP5 (and other current and future model intercomparison projects).