

ACME Data Management Plan

The ACME project produces both software and simulation results. This plan describes the management and distribution of both types of data.

Computer Software

ACME software versions are considered developmental (development versions) until they produce final simulations that are analyzed and documented through a publicly released journal article or technical report (simulation document). Developmental versions are only available to project members and approved collaborators. Upon publication of the simulation document, source versions of ACME codes used to produce the simulations (open-source versions) will be available via an open-source license on GitHub (<https://github.com/>) as a “Public Project.” We will use the tagging feature in the *git* version control system so that the precise code base is retrievable. The software will be available for use under the license, but without support or consulting services beyond what is provided on the GitHub site. Open-source versions of the code will be maintained for five years from the date of release or when the ACME project ends, whichever is sooner.

Simulation Output

All ACME simulation output used in peer-reviewed journal articles and other openly distributed technical publications will be archived, maintained and curated for five years from the release of the publication, or when the ACME project ends, whichever is sooner. As required by the Office of Science, data appearing directly in publications will be made publicly available through links on the ACME public webpage (<http://climatemodeling.science.energy.gov/projects/accelerated-climate-modeling-energy>) associated with the publications. These data sets will be machine-readable in the self-describing netCDF format (<http://www.unidata.ucar.edu/software/netcdf/>), which is broadly accepted good-practice standard utilized in the weather and climate science research communities.

The ACME simulation output archive is expected to exceed several hundred TeraBYTES. The ACME project will maintain a catalog of all publicly released simulation data through the Earth System Grid Federation (ESGF) (<http://esgf.llnl.gov/>). ESGF will provide direct access to a subset of the data. Data catalog references to data that is not directly available will contain information on how to obtain the data from the project.