

Data Management Plan

August 2021

Summary

The PI will comply with the data management and dissemination policies described in the NSF Award and Administration Guide (AAG, Chapter VI.D.4) and the NSF Division of Ocean Sciences sample and data policy. Data will be made publicly available within two years of collection through BCO-DMO (Biological and Chemical Oceanographic Data Management Office) and CCHDO (CLIVAR and Carbon hydrographic Data Office).

Types of Data

This project will collect pH, TA and DIC data on two GEOTRACES cruises (GP17-OCE and GP17-ANT). All data will be stored locally at MIT with automatic backups to external hard drives. Final data will be made available through BCO-DMO and CCHDO in WOCE exchange format. The raw absorbances for pH measurements will also be made available on BCO-DMO. Raw titration data for TA and DIC will be made available upon request.

Data Format

The raw data will be stored as CSV and TXT files. Compiled and quality-controlled results will be formatted using the WOCE exchange format as a CSV and excel file.

Access to Data and Data Sharing Practices and Policies

After quality control and assurance, all data will be made available to the public through archiving on BCO-DMO and CCHDO. Data sets will be published in peer-reviewed journals and included in supplemental materials when appropriate. Cruise reports describing the data will be published following GEOTRACES guidelines. Long-term access to raw data (e.g. titration curves and absorbances) will promptly be made available to other researchers as requested.

Policies for Re-Use, Re-Distribution

Once released, the data will be open and freely available for use without copyright restrictions.

Archiving of Data

Processed, quality-controlled results will be archived at BCO-DMO and CCHDO within two years of acquisition. The original (raw and processed) data as well as any published papers will be fully archived with redundant off site back up of computer files at MIT. Original data contained in laboratory notebooks will be maintained by the PI's laboratory.