Data Management Plan

Our project will provide for the preservation, documentation, and sharing of data collected, and we will conform to the NSF philosophy of data management and dissemination, embodied in the NSF Award and Administration Guide (AAG) Chapter VI.D.4. The project will generate new data and incorporate existing data streams from ongoing projects. All significant findings from the proposed work will be promptly prepared and submitted for publication with authorship that accurately reflects the contributions of those involved.

Description of Data Types

Mooring data from the oxygen optodes consists of raw phase data, which, when paired with temperature and salinity at nearby Microcats, can be used to calculate dissolved oxygen concentrations. Both O_2 and pCO_2 measurements will be provided in their raw and processed form.

Data and Metadata Formats

For processing and analysis, we will store observational data as Matlab files, with metadata both within the Matlab arrays and as external rtf-format readme files.

Data Storage and Access During the Project

All observational data will be stored and shared both on local (URI, BC, WHOI, and Dalhousie) computers and contributed to the data repository established for OSNAP's physical data.

Mechanisms and Policies for Access, Sharing, Re-use and Re-distribution

Palter will assume overall responsibility for data management of new observational data and sharing subsequent to the field program, with contributions from the WHOI team. We will merge newly collected O_2 data with OSNAP velocities to produce an O_2 transport product that will be shared immediately upon its calculation in well-documented formats. In addition, the pCO_2 data and calculated CO_2 exchange rates will be documented and archived. At a date no later than 2 years following the collection of the data, all raw and quality-controlled O_2 and pCO_2 data will be made available to the public via submission to the Biological and Chemical Oceanography Data Management Office (BCO-DMO) as "deployment data." Surface pCO_2 data will also be uploaded to the Surface Ocean CO_2 Atlas (SOCAT), which now allows for data from moored sensors.