**Data Management Plan:**

The PIs will collectively be responsible for coordinating data collection and analysis, quality control, and archiving. The data generated in this research will consist of three main types:

1. physical samples of cultured corals
2. nitrogen isotope data generated during the analysis of coral tissue and skeleton samples; nitrogen isotope data from analysis of nitrate, suspended PON, and surface PON; and quality control data from coral culturing experiments
3. data analysis programs used to analyze results from coral culturing experiments

Remaining culture samples produced as part of this work that have not been completely consumed will be archived and made available to other labs in support of collaborative interactions, to the extent that sufficient material exists. Specifically, coral tissue samples will be frozen and kept in a freezer at -18°C at St. Olaf College. Cleaned and dried skeleton samples will be curated in the Gothmann Lab collection of fossil and cultured samples. These materials will be uniquely identified in publications so that researchers can request specific samples. Publications will indicate that researchers can request samples by contacting Dr. Gothmann. This preservation and archiving will be conducted by the PI during the normal course of research.

Nitrogen isotope data generated during this project, as well as culture experiment quality control data, will be stored on a cloud-based file storage system (Team Google Drive) and disseminated within two years of data collection in peer-reviewed journals or as publically available data contained in downloadable electronic supplementary materials to these publications.

Data analysis programs will also be disseminated within two years of data collection and reduction as publically available programs contained in downloadable electronic supplementary materials to publications.