

Please provide the following information, and submit to the NOAA DM Plan Repository.

Reference to Master DM Plan (if applicable)

As stated in Section IV, Requirement 1.3, DM Plans may be hierarchical. If this DM Plan inherits provisions from a higher-level DM Plan already submitted to the Repository, then this more-specific Plan only needs to provide information that differs from what was provided in the Master DM Plan.

URL of higher-level DM Plan (if any) as submitted to DM Plan Repository:

1. General Description of Data to be Managed

1.1. Name of the Data, data collection Project, or data-producing Program:

Primary productivity derived from ocean color remote sensing

1.2. Summary description of the data:

Ocean color remote sensing provide routine, synoptic observations of the ocean surface at spatial and temporal resolutions not attainable by moored or ship-based platforms. Ocean color sensors measure the spectral distribution of reflected sunlight, which can be used to infer the contents of the water, including chlorophyll a concentrations, a proxy for phytoplankton biomass. Phytoplankton are the base of the marine food web and are critical regulators of key biogeochemical processes. Primary productivity estimates are modeled using chlorophyll a, photosynthetic available radiation, and sea surface temperature.

1.3. Is this a one-time data collection, or an ongoing series of measurements?

Ongoing series of measurements

1.4. Actual or planned temporal coverage of the data:

1997-09-16 to Present

1.5. Actual or planned geographic coverage of the data:

W: -82, E: -52, N: 47.75, S: 23.5

U.S. East Coast Continental Shelf

1.6. Type(s) of data:

(e.g., digital numeric data, imagery, photographs, video, audio, database, tabular data, etc.)

Image (digital)

1.7. Data collection method(s):

(e.g., satellite, airplane, unmanned aerial system, radar, weather station, moored buoy, research vessel, autonomous underwater vehicle, animal tagging, manual surveys, enforcement activities, numerical model, etc.)

1.8. If data are from a NOAA Observing System of Record, indicate name of system:

1.8.1. If data are from another observing system, please specify:

2. Point of Contact for this Data Management Plan (author or maintainer)

2.1. Name:

Sean Hardison

2.2. Title:

Metadata Contact

2.3. Affiliation or facility:

2.4. E-mail address:

sean.hardison@noaa.gov

2.5. Phone number:

(508) 495-2016

3. Responsible Party for Data Management

Program Managers, or their designee, shall be responsible for assuring the proper management of the data produced by their Program. Please indicate the responsible party below.

3.1. Name:

Kimberly Hyde

3.2. Title:

Data Steward

4. Resources

Programs must identify resources within their own budget for managing the data they produce.

4.1. Have resources for management of these data been identified?

No

4.2. Approximate percentage of the budget for these data devoted to data management (specify percentage or "unknown"):

Unknown

5. Data Lineage and Quality

NOAA has issued Information Quality Guidelines for ensuring and maximizing the quality, objectivity, utility, and integrity of information which it disseminates.

5.1. Processing workflow of the data from collection or acquisition to making it publicly accessible

(describe or provide URL of description):

Lineage Statement:

The processing steps to generate the modeled primary productivity data.

Process Steps:

- Level 1 (1km) ocean color data are retrieved from NASA's OceanColor Web supported by the Ocean Biology Processing Group. Level 3 (4 km) nighttime NOAA Advanced Very High Resolution Radiometer (AVHRR) Pathfinder and the Group for High Resolution Sea Surface Temperature (GHRSSST) Multiscale Ultrahigh Resolution (MUR, version 4.1) Level 4 sea surface temperature (SST) data are retrieved from NOAA NCEI and NASA JPL PODAAC websites respectively. (Citation: NASA Goddard Space Flight Center, Ocean Biology Processing Group; Ocean Color Data, NASA OB.DAAC, Greenbelt, MD, USA. Maintained by NASA Ocean Biology Distributed Active Archive Center (OB.DAAC), Goddard Space Flight Center, Greenbelt MD.NOAA National Centers for Environmental Information (NCEI)NASA Jet Propulsion Laboratory MUR MEaSURES Project)
- The NASA software SeaDAS is used to generate Level 2 and daily binned files of chlorophyll (CHL) and PAR and the SST data are converted into the same binned map as the ocean color data. (Citation: NASA Goddard Space Flight Center, Ocean Biology Processing Group; Ocean Color Data, NASA OB.DAAC, Greenbelt, MD, USA. Maintained by NASA Ocean Biology Distributed Active Archive Center (OB.DAAC), Goddard Space Flight Center, Greenbelt MD.NOAA National Centers for Environmental Information (NCEI)NASA Jet Propulsion Laboratory MUR MEaSURES Project)
- CHL and the Pathfinder SST data are temporally interpolated to reduce data gaps prior to being input into the primary productivity model. (Citation: NASA Goddard Space Flight Center, Ocean Biology Processing Group; Ocean Color Data, NASA OB.DAAC, Greenbelt, MD, USA. Maintained by NASA Ocean Biology Distributed Active Archive Center (OB.DAAC), Goddard Space Flight Center, Greenbelt MD.NOAA National Centers for Environmental Information (NCEI)NASA Jet Propulsion Laboratory MUR MEaSURES Project)
- Statistical data and mapped netcdf files are created using code developed locally in IDL. (Citation: NASA Goddard Space Flight Center, Ocean Biology Processing Group; Ocean Color Data, NASA OB.DAAC, Greenbelt, MD, USA. Maintained by NASA Ocean Biology Distributed Active Archive Center (OB.DAAC), Goddard Space Flight Center, Greenbelt MD.NOAA National Centers for Environmental Information (NCEI) NASA Jet Propulsion Laboratory MUR MEaSURES Project)

5.1.1. If data at different stages of the workflow, or products derived from these data, are subject to a separate data management plan, provide reference to other plan:

5.2. Quality control procedures employed (describe or provide URL of description):

NA

6. Data Documentation

The EDMC Data Documentation Procedural Directive requires that NOAA data be well documented, specifies the use of ISO 19115 and related standards for documentation of new data, and provides links to resources and tools for metadata creation and validation.

6.1. Does metadata comply with EDMC Data Documentation directive?

No

6.1.1. If metadata are non-existent or non-compliant, please explain:

Missing/invalid information:

- 1.7. Data collection method(s)

6.2. Name of organization or facility providing metadata hosting:

NMFS Office of Science and Technology

6.2.1. If service is needed for metadata hosting, please indicate:

6.3. URL of metadata folder or data catalog, if known:

<https://www.fisheries.noaa.gov/inport/item/27414>

6.4. Process for producing and maintaining metadata

(describe or provide URL of description):

Metadata produced and maintained in accordance with the NOAA Data Documentation Procedural Directive: https://nosc.noaa.gov/EDMC/DAARWG/docs/EDMC_PD-Data_Documentation_v1.pdf

7. Data Access

NAO 212-15 states that access to environmental data may only be restricted when distribution is explicitly limited by law, regulation, policy (such as those applicable to personally identifiable information or protected critical infrastructure information or proprietary trade information) or by security requirements. The EDMC Data Access Procedural Directive contains specific guidance, recommends the use of open-standard, interoperable, non-proprietary web services, provides information about resources and tools to enable data access, and includes a Waiver to be submitted to justify any approach other than full, unrestricted public access.

7.1. Do these data comply with the Data Access directive?

Yes

7.1.1. If the data are not to be made available to the public at all, or with limitations, has a Waiver (Appendix A of Data Access directive) been filed?

7.1.2. If there are limitations to public data access, describe how data are protected from unauthorized access or disclosure:

7.2. Name of organization of facility providing data access:

Northeast Fisheries Science Center (NEFSC)

7.2.1. If data hosting service is needed, please indicate:

7.2.2. URL of data access service, if known:

https://console.cloud.google.com/storage/browser/nmfs_odp_nefsc/PARR/READ/EDAB/27414

7.3. Data access methods or services offered:

Data may be obtained at <https://comet.nefsc.noaa.gov/erddap/index.html>

7.4. Approximate delay between data collection and dissemination:

90

7.4.1. If delay is longer than latency of automated processing, indicate under what authority data access is delayed:

There is an approximate 60-90 delay in the release of the ancillary data needed to generate the science quality data, then additional data is needed in the time series to temporally interpolate the input data.

8. Data Preservation and Protection

The NOAA Procedure for Scientific Records Appraisal and Archive Approval describes how to identify, appraise and decide what scientific records are to be preserved in a NOAA archive.

8.1. Actual or planned long-term data archive location:

(Specify NCEI-MD, NCEI-CO, NCEI-NC, NCEI-MS, World Data Center (WDC) facility, Other, To Be Determined, Unable to Archive, or No Archiving Intended)

OTHER

8.1.1. If World Data Center or Other, specify:**8.1.2. If To Be Determined, Unable to Archive or No Archiving Intended, explain:****8.2. Data storage facility prior to being sent to an archive facility (if any):**

Northeast Fisheries Science Center - Narragansett, RI

8.3. Approximate delay between data collection and submission to an archive facility:

None

8.4. How will the data be protected from accidental or malicious modification or deletion prior to receipt by the archive?

Discuss data back-up, disaster recovery/contingency planning, and off-site data storage relevant to the data collection

Regular server back-ups, local copies, raw data stored offsite and can be used to recreate files from backed-up programs

9. Additional Line Office or Staff Office Questions

Line and Staff Offices may extend this template by inserting additional questions in this section.