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:

Elkhorn coral critical habitat for use in ESA/FIFRA consultations

1.2. Summary description of the data:

These data represent the critical habitat for elkhorn coral (Acropora palmata) as designated by 73 FR 72210, November 26, 2008, Rules and Regulations. The purpose of these data is to visually represent the critical habitat areas for GIS analysis and display.

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

1.4. Actual or planned temporal coverage of the data:

1.5. Actual or planned geographic coverage of the data:

```
W: -83.120607, E: -64.438286, N: 26.545134, S: 17.637457
W: -83.120604, E: -64.438288, N: 26.545129, S: 17.637454
W: -83.120607, E: -64.438286, N: 26.545134, S: 17.637457
W: -83.120607, E: -64.438286, N: 26.545134, S: 17.637457
W: -82.997943, E: -64.512661, N: 27.527975, S: 17.6237
```

1.6. Type(s) of data:

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

Karrin Goodman

2.2. Title:

Metadata Contact

2.3. Affiliation or facility:

2.4. E-mail address:

karrin.goodman@noaa.gov

2.5. Phone number:

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:

Karrin Goodman

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

Process Steps:

- 2007-10-30 00:00:00 - Bathymetry source: NGDC Coastal Relief Model for Puerto Rico & Virgin Islands (Vol. 9), and Florida and Eastern Gulf of Mexico (Vol. 3). Using

ESRI's ArcGIS ArcMap software and Spatial Analyst extension, ran the 'Surface Analysis' tool, 'Contour'. Set contour interval to 30 (CRM is in tenths of meters). The contour line was a bit blocky, so smoothed using ET GeoWizard (3rd party software) to smooth the contour using Bezier Curve smoothing algorithm with default settings (5 for smoothness) for the Caribbean and 10 for smoothing setting for Florida, and then cleaned. Converted the polyline to a polygon. Deleted very small polygons/ or polys for depths +/- 1m.

- 2008-09-01 00:00:00 The process of creating an outer boundary using the gridded bathymetry data produced polygons with very dense veritices. ET GeoWizards (3rd party software) was used to generalize the polygons, using the Douglas-Poiker algorithm. A generalize tolerance of .00001 arc seconds was assigned.
- 2008-10-01 00:00:00 Used detailed shoreline for Puerto Rico and the Virgin Islands from NOAA National Centers for Coastal Ocean Science (NCCOS), by selecting 'Land' and 'mangrove' polygons. Used NOAA medium resolution vector shoreline for Florida to create land polygon. Erased the bathymetry polygons with the land/mangrove polygons. For Florida shoreline, or shoreward side of the critical habitat polygon, used Florida Fish & Wildlife Commission (FWC) for nearshore bathymetry (digitized from NOAA nautical charts) for the 6 ft depth to Government Cut, FWC 1: 24,000 scale shoreline, COLREG lines, and intercouncil boundary between South Atlantic and Gulf of Mexico Fishery Management Councils at the mouths of bays and inlets, and information from the U.S. Navy for exclusions. The polygon that included to the 30 meter contour was erased with the appropriate data for the shoreward side.
- 2015-05-07 00:00:00 Updated bathymetry East of St. John was added to the critical habitat layer.
- 2021-08-30 00:00:00 Repaired geometry errors in Florida area feature only.
- 2023-05-02 00:00:00 Updated bathymetry for Desecheo Island, Puerto Rico using NOAA's 2022 Digital Elevation Models of Puerto Rico and the Virgin Islands: https://www.ngdc.noaa.gov/mgg/dat/dems/tiled_tr/prvi_tiled_prvd_vivd_2022.pdf
- 2023-12-15 00:00:00 As described above, this species' HUC-based critical habitat dataset was modified from the polygon-based species "agency-official" NMFS critical habitat data. This HUC-based critical habitat file represents the HUC-12 watersheds (USGS Watershed Boundary Dataset; https://www.usgs.gov/national-hydrography/watershed-boundary-dataset) that intersect with the "agency-official" critical habitat polygon-based data. The data were reviewed and revised to add any additional HUC-12 watersheds that were determined to have hydrologic connectivity to the critical habitat.
- 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):

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:

- 1.3. Is this a one-time data collection, or an ongoing series of measurements?
- 1.4. Actual or planned temporal coverage of the data
- 1.7. Data collection method(s)
- 4.1. Have resources for management of these data been identified?
- 4.2. Approximate percentage of the budget for these data devoted to data management
- 5.2. Quality control procedures employed
- 7.1. Do these data comply with the Data Access directive?
- 7.1.1. If data are not available or has limitations, has a Waiver been filed?
- 7.1.2. If there are limitations to data access, describe how data are protected
- 7.2. Name of organization of facility providing data access
- 7.2.1. If data hosting service is needed, please indicate
- 7.3. Data access methods or services offered
- 7.4. Approximate delay between data collection and dissemination
- 8.1. Actual or planned long-term data archive location
- 8.2. Data storage facility prior to being sent to an archive facility
- 8.3. Approximate delay between data collection and submission to an archive facility
- 8.4. How will the data be protected from accidental or malicious modification or deletion prior to receipt by the archive?

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/72743

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?
 - 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:
 - 7.2.1. If data hosting service is needed, please indicate:
 - 7.2.2. URL of data access service, if known:

https://www.fisheries.noaa.gov/resource/map/acropora-elkhorn-and-staghorn-coral-critical-habitat-

- 7.3. Data access methods or services offered:
- 7.4. Approximate delay between data collection and dissemination:
 - 7.4.1. If delay is longer than latency of automated processing, indicate under what authority data access is delayed:

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

9. Additional Line Office or Staff Office Questions

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