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:
2001 NCFMP Lidar: Phase 1B (Cape Fear and Lumber River Basins)

1.2. Summary description of the data:
This airborne LiDAR terrain mapping data was acquired in the spring of 2001. The data were collected for the floodplain mapping program for the state of North Carolina. The data were collected for the state in three phases: 1, 2, and 3.

This metadata record describes that data that were in phase 1 of collection and fall within the Cape Fear and Lumber River Basins in central and eastern North Carolina. This area consists of 30 counties which are listed below in the Place Keywords field.

The data were received by the NOAA Office for Coastal Management from the U.S. Geological Survey (USGS) Center for Lidar Coordination and Knowledge (CLICK). For data storage and Digital Coast provisioning purposes, the OCM converted the data to geographic coordinates and ellipsoid (Geoid99) elevations. The data are unclassified.

Original contact information:
Contact Org: NC Floodplain Mapping Program
Phone: 919-715-0408
Email: hmorgan@ncem.org

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

1.4. Actual or planned temporal coverage of the data:
1.5. Actual or planned geographic coverage of the data:
   W: -80.062511, E: -77.43749, N: 36.375656, S: 33.81882

1.6. Type(s) of data:
   (e.g., digital numeric data, imagery, photographs, video, audio, database, tabular data, etc.)

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:
      NOAA Office for Coastal Management (NOAA/OCM)
   2.2. Title:
      Metadata Contact
   2.3. Affiliation or facility:
      NOAA Office for Coastal Management (NOAA/OCM)
   2.4. E-mail address:
      coastal.info@noaa.gov
   2.5. Phone number:
      (843) 740-1202

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:

   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:
- 2002-05-31 00:00:00 - Production Narrative: Data collected were processed to determine that valid GPS values were achieved on all flights. The flight data was processed using proprietary automated algorithms that calculate the x, y, and z value of each point by combining GPS position of the aircraft, IMU attitude of the aircraft, range of the laser pulse, and scan angle of the laser scanner. Resulting data from each flight line was then compared to crossing and bordering flight lines to identify any residual pitch, roll or yaw errors. Data were also compared to calibration flights over airports in or adjacent to the Cape Fear and Lumber River Basins. Data were then edited in TerraModel by comparing contour lines, shaded relief models (hillshading) and points clouds within tiles and from one tile to the next. Finally, the data were compared to available ground survey data prior to submitting to the State for QAQC checks.
- 2008-01-01 00:00:00 - Lidar points were supplied to the USGS EROS Center. Points received in a file format other than LAS were converted to LAS, if the data contained adequate attribute information to create a valid LAS file and without the loss of any original attribute information. The points have been re-tiled into a standard Quarter-Quad, or Quarter-Quarter-Quad, scheme for publication on the CLICK website. The data remain in the Coordinate Reference System in which they were received. No alteration of any sort, of either the geometry or attribute values or structure has been performed.
- 2012-12-01 00:00:00 - The lidar point data were received by the NOAA Office for Coastal Management from the USGS Center for Lidar Coordination and Knowledge (CLICK) in las format. The files contained lidar elevation and intensity measurements. The data were unclassified, in State Plane coordinates, and were vertically referenced to NAVD88. OCM performed the following processing for data storage and Digital Coast provisioning purposes: 1. The data were converted from State Plane coordinates to geographic coordinates. 2. The data were converted from orthometric (NAVD88) heights to ellipsoidal heights using Geoid99. 3. The data were sorted by time and laszipped.
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:
- 1.6. Type(s) of data
- 1.7. Data collection method(s)
- 3.1. Responsible Party for Data Management
- 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
- 7.4. Approximate delay between data collection and dissemination
- 8.1. Actual or planned long-term data archive location
- 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/49831

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-
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:**

   NOAA Office for Coastal Management (NOAA/OCM)

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

7.2.2. **URL of data access service, if known:**

   https://coast.noaa.gov/dataviewer/#/lidar/search/where:ID=1399

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):
Office for Coastal Management - Charleston, SC

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.