

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:

Aerial Survey Trend Counts of Harbor Seals in Coastal Alaska (1984-2006) - ADF&G

1.2. Summary description of the data:

Aerial surveys were conducted during 1983–2006 in the Ketchikan, Sitka, Kodiak, and Bristol Bay areas of Alaska to estimate trends in abundance of harbor seals.

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:

1984 to 2006

1.5. Actual or planned geographic coverage of the data:

coastal habitats (intertidal and offshore rocks and reefs) at specific regions of Bristol Bay, Kodiak, Prince William Sound, Sitka and Ketchikan

W: -166, E: -130, N: 62, S: 54

1.6. Type(s) of data:

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

Table (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:

Stacie Koslovsky

2.2. Title:

Metadata Contact

2.3. Affiliation or facility:**2.4. E-mail address:**

stacie.koslovsky@noaa.gov

2.5. Phone number:

206-526-6433

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:

Stacie Koslovsky

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 Ketchikan and Sitka aerial trend routes were first surveyed in 1983 and 1984 (Pitcher, unpublished data), followed by only one additional survey of the Ketchikan route in 1988 (Pitcher, unpublished data) prior to consecutive annual surveys beginning in 1994 for Ketchikan and 1995 for Sitka. Beginning in 1998, ADF&G surveyed the Ketchikan route biennially due to low variation associated with an estimated long-term

increasing trend (Small, unpublished data). The Kodiak and Bristol Bay trend routes were established in 1993 and 1998, respectively, and surveyed through 2006. Haul-out sites within the Ketchikan and Sitka routes were selected primarily because they represented the large majority of sites within a logical flight sequence and could be surveyed within approximately 4 h from an airport; sites with few (<5) seals were not included. For the Kodiak and Bristol Bay routes, all haul-out sites along a relatively extensive coastline were selected. Specifically, all sites on the east side of Kodiak Island from Chiniak Bay (near Kodiak) south to Tugidak Island were included in the Kodiak route, whereas in Bristol Bay all sites between Kvichak Bay and Port Moller on the north side of the Alaska Peninsula were included. The sites within Herendeen Bay and the southeast arm of Port Moller were not included in the Bristol Bay route because the number of seals using those sites was relatively much smaller compared to sites nearer the open waters of Bristol Bay, and their inclusion would increase the duration of the survey substantially. Prince William Sound was first flown in 1984 and then annually from 1988 through 2006. Each trend route consisted of 16-34 harbor seal haul-out sites that were surveyed with either single- or twin-engine aircraft during the molting period between mid- August and early September. Surveys usually were conducted between 2 h either side of the low tide, at an altitude of 200-300 m unless weather conditions required lower altitudes; surveys were not conducted during heavy rain or strong winds. After locating hauled-out seals, the pilots circled the site and the observer visually counted all seals (including those in the water near haul-outs), using binoculars when necessary, and then photographed sites using either 35-mm color slide film (ASA 400) or digital images and a 80-200-mm zoom lens for groups of >10-15 seals. We recorded the time when seals at each site were counted, so that tide height at each site during the survey could later be estimated based on tide data from the nearest tide station. Survey times were not recorded for the 1983 Sitka survey, and therefore those counts are not included in our analysis. We attempted to conduct five to seven replicate surveys per year for each route, with each site surveyed unless prohibited by poor weather. Seals were later counted from projected slide images on a white surface or from a computer monitor for digital images. The replicate counts for each trend site were reported previously (Small, unpublished data).

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):

This dataset has been the foundation of at least one peer-reviewed and published study. As such, the data have been subjected quality control and quality assurance procedures associated with the statistical analysis and both internal and external review processes.

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/26619>

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?

No

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?

No

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

The data set is in the process of being archived with the NOAA National Centers for Environmental Information. Once the archival process is complete and verified, the data set will be publicly available.

7.2. Name of organization of facility providing data access:

Alaska Fisheries Science Center (AFSC)

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

not needed, planned for NCEI

7.2.2. URL of data access service, if known:

https://console.cloud.google.com/storage/browser/_details/nmfs_odp_afsc/MML/PEP/Aerial%20Surve

7.3. Data access methods or services offered:

The data set is in the process of being archived with the NOAA National Centers for Environmental Information. Once the archival process is complete and verified, the data set will be publicly available.

7.4. Approximate delay between data collection and dissemination:

N/A

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

N/A

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)

NCEI_MD

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):**

Alaska Fisheries Science Center - Seattle, WA

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

unknown

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

IT Security and Contingency Plan for the system establishes procedures and applies to the functions, operations, and resources necessary to recover and restore data as hosted in the Western Regional Support Center in Seattle, Washington, following a disruption.

9. Additional Line Office or Staff Office Questions

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