NGDA Dataset Report

**Official NGDA Title:** Public Land Survey System (PLSS) Dataset Catalog

**Metadata Record Title:** PLSS_CadNSDI_V2 Standardized PLSS Data Catalog National Geospatial Data Asset (NGDA) Public Land Survey System (PLSS) Dataset Catalog

**A–16 NGDA Theme:** Cadastre

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**Metadata:**
- **Registration Status:** Complete
- **Registered on:** 6/3/2015

**GeoPlatform Link**: [https://www.geoplatform.gov/node/243/84324aed-78c1-4801-99e3-1ac6c00a3a84](https://www.geoplatform.gov/node/243/84324aed-78c1-4801-99e3-1ac6c00a3a84)

**Data.gov Metadata Link**: [http://catalog.data.gov/harvest/object/1ba0b96f-b66f-4930-b329-caff121fdeb2/html](http://catalog.data.gov/harvest/object/1ba0b96f-b66f-4930-b329-caff121fdeb2/html)

*If the metadata has been updated and reharvested after publication of this report, the link may no longer be valid. The dataset may be searched for manually in Data.gov or GeoPlatform.gov.*
NGDA Lifecycle Maturity Assessment (LMA) Report

Time Frame:
Baseline assessment responses include dataset activities from 2010 to 2015.

LMA Submission:
- **Status:** Complete
- **Date:** 10/14/2015
- **Extension Requested:** Yes

LMA Reviewer(s):
- **Supervisor:** Did not review
- **Theme Lead:** Bob Ader / Don Buhler
- **Executive Champion:** Did not review
- **SAOGI***: Did not review
- **Other:** Did not review

LMA Verifier:
- **Name:** Bob Ader
- **Email:** bader@blm.gov

Attachments:
To get access to any attachments referenced in the report, email the LMA Help Desk at NGDA_LMA_help@fgdc.gov. Please use the subject "Dataset Report Attachment(s)" and indicate the associated official NGDA title.

*Senior Agency Official for Geospatial Information (SAOGI)*
# Lifecycle Maturity Assessment (LMA) Summary

## Overall Maturity:

<table>
<thead>
<tr>
<th>Maturity</th>
<th>General Questions: 91%</th>
<th>Stage 4 - Access: 100%</th>
</tr>
</thead>
<tbody>
<tr>
<td>Optimized; Established</td>
<td>Optimized; Established</td>
<td>Optimized; Established</td>
</tr>
<tr>
<td>Rank = 5</td>
<td>Stage 1 - Define/Plan: 100%</td>
<td>Stage 5 - Maintain: 100%</td>
</tr>
<tr>
<td></td>
<td>Optimized; Established</td>
<td>Optimized; Established</td>
</tr>
<tr>
<td></td>
<td>Stage 2 - Inventory/Evaluate: 100%</td>
<td>Stage 6 - Use/Evaluate: 100%</td>
</tr>
<tr>
<td></td>
<td>Optimized; Established</td>
<td>Optimized; Established</td>
</tr>
<tr>
<td></td>
<td>Stage 3 - Obtain: 100%</td>
<td>Stage 7 - Archive: 100%</td>
</tr>
<tr>
<td></td>
<td>Optimized; Established</td>
<td>Optimized; Established</td>
</tr>
</tbody>
</table>

## NGDA Dataset Maturity Definitions:

<table>
<thead>
<tr>
<th>Maturity</th>
<th>Maturity Characteristics for All Lifecycle Stages</th>
</tr>
</thead>
<tbody>
<tr>
<td>Optimized; Established</td>
<td>Dataset meets virtually all business needs of all users. The dataset is considered authoritative by owners and secondary users. It is curated across all stages of the approved lifecycle. Future needs are defined on a regular basis and resources for addressing both current and future business requirements are available.</td>
</tr>
<tr>
<td>Rank = 5</td>
<td></td>
</tr>
<tr>
<td>Mature; Consistent</td>
<td>Dataset meets all the business needs of the primary owner and most of the secondary users. The dataset is curated and used as authoritative by the primary owner. Dataset is used widely by secondary users actively engaged in sustaining the dataset. Future needs are identified and steps are planned to address these. All stages are supported and reviewed on a recurring basis. The dataset is well managed in relation to the approved lifecycle.</td>
</tr>
<tr>
<td>Rank = 4</td>
<td></td>
</tr>
<tr>
<td>Managed; Predictable</td>
<td>Dataset meets a significant number of the business needs of the primary owner and is widely used as an authoritative resource by secondary users. Benchmark activities are occurring in at least four of the approved lifecycle stages. Management practices in relation to the approved lifecycle is moderate but consistent. Dataset is integrating changing business requirements in lifecycle stages impacting overall maturity.</td>
</tr>
<tr>
<td>Rank = 3</td>
<td></td>
</tr>
<tr>
<td>Transition; Transformation</td>
<td>Dataset meets business needs of the primary owner and has moderate use by secondary users. Benchmark activities are occurring in at least three stages. Efforts to integrate funding, include partners, and obtain data are not supported in a sustained manner. Management practices in relation to the stages of the approved lifecycle is limited.</td>
</tr>
<tr>
<td>Rank = 2</td>
<td></td>
</tr>
<tr>
<td>Planned; Initial Development</td>
<td>Dataset limited in meeting business needs of the primary owner. Benchmark activities in the approved lifecycle are just starting to consider secondary uses, partnerships are forming to support additional dataset uses. Dataset development is in a very early stage. Minimal or limited management against the benchmarks in the approved lifecycle.</td>
</tr>
<tr>
<td>Rank = 1</td>
<td></td>
</tr>
<tr>
<td>No Activity</td>
<td>Dataset meets project or local business needs of the primary owner, secondary or additional uses or users were not considered, not recognized as an authoritative data or is part of a similar dataset. Not managed to any of the benchmarks in the approved lifecycle.</td>
</tr>
<tr>
<td>Rank = no activity</td>
<td></td>
</tr>
</tbody>
</table>
General Questions for All Stages

1) Is there a recurring process to obtain funding for all lifecycle stages of this dataset?

**Answer:** Funding support exists but is not adequate to meet known requirements, most lifecycle stages are supported.

**Justification Comment:**
Each agency is dependent upon available funding and may or may not be part of the agencies budgetary requests. As for BLM, annual funding is primarily for maintenance with limited data collection.

2) Is there a process in place to ensure that open government and transparency guidelines are followed in all lifecycle stages for this dataset?

**Answer:** Process is published as appropriate with respect to sensitivity requirements, process is transparent, published appropriately.

**Justification Comment:**
The PLSS CadNSDI data set is a public domain data set. Access to this data are provided openly and freely. State partners have been identified for some states.
http://nationalcad.org/PLSSWorkgroup/PLSSWorkgroup.html

3) Are there processes and tools in place so that staff are sufficiently knowledgeable to ensure a continuity of the dataset for all stages of the lifecycle, especially during staffing transitions?

**Answer:** Processes and tools to ensure dataset continuity are in place and implemented for all lifecycle stages.

**Justification Comment:**
The maintenance of the PLSS CadNSDSI is being migrated to the Esri Parcel Fabric. These tools are fully supported COTS. http://solutions.arcgis.com/local-government/help/public-lands-editing/

STAGE 1 - Define/Plan

4) Are user and business requirements defined and formalized?

**Answer:** A recurring process is in place, including defining new partner and stakeholder business needs as they arise, and is fully implemented.

**Justification Comment:**
State partners/stakeholder/data stewards are identified as the PLSS data set reaches maturity. For example Montata http://mslapps.mt.gov/Geographic_Information/Applications/cadnsdi/ and Utah http://gis.utah.gov/data/sgid-cadastre/plss/ are examples of active data stewards. The states as well as federal land agencies are solicited for input and comment on a regular basis. Affirmation of the Cadastral NSDI elements was achieved by evaluating the business needs for regional user communities that needed land ownership and characteristics for navigation and discovery or emergency planning and response.

5) How are partners/stakeholders involved in the requirements collection process?

**Answer:** A recurring process is in place, including defining new partner and stakeholder business needs as they arise, and is fully implemented.

**Justification Comment:**
A defined data stewardship process has been published http://nationalcad.org/download/PLSS_Stewardship.pdf. Two examples of recurring stewardship are the response to the needs of the US Forest Service for Mineral Survey Lodal claims and BIA for section subdivisions and first division acreage. Both of these elements are reflected in updated data
sets.

6) Is there a quality assurance process for the dataset?
Answer: Quality assurance published as appropriate with respect to sensitivity requirements.

Justification Comment: Data set quality review prior to acceptance and publication is 95% logical consistent with known irregularities reported in the Conflicted Area feature class. It should be noted that some of these irregularities are caused by a conflict in the survey record and may require an approved survey to reconcile the data.

7) Is there a process to evaluate the sensitivity, privacy, and confidentiality of this dataset?
Answer: Sensitivity, privacy, and confidentiality evaluations fully implemented, reviewed and updated on a recurring basis.

Justification Comment: There is no personally identifiable information in this data set.

8) Are defined data standards used in collecting, processing, and/or rendering the data?
Answer: Standards fully implemented documented and published as appropriate.

Justification Comment: The published data set (PLSS CadNSDI) conforms to the FGDC Cadastral Data Content Standard Version 1.4 http://nationalcad.org/CadStandards/CadStand.html This page also included the PLSSCadNSDI Standard and supporting documentation. In addition a publication standard has been developed and is implemented in this data set. It can be found on this web page http://nationalcad.org/CadStandards/CadStand.html

STAGE 2 - Inventory/Evaluate

9) Is there a process for determining if data necessary to meet requirements already exist from other sources (either within or outside the agency) before collecting or acquiring new data?
Answer: Process for determining appropriate data is being reused fully implemented, reviewed, and updated on a regular basis.

Justification Comment: The Cadastral Subcommittee is the A-16 lead agency for this data set. Federal survey authority has defined the BLM as the federal land survey sole authority. When the original cadastral data Content Standard was developed in the late 1980's and early 1990's a complete inventory of all federal land agencies was conducted along with an inventory of state programs and the responsibility for initial development of this standardized data was determined to be BLM Cadastral.

STAGE 3 - Obtain

10) Is there a process for obtaining data in relation to this dataset?
Answer: Process is fully implemented, reviewed and updated on a regular basis.

Justification Comment: All available BLM sourced and other federal land agency sourced data was used in the creation of the initial data sets. Ongoing maintenance is a part of the BLM cadastral business process on federal lands. For private lands states, counties, and local governments will take the lead on maintenance. There are 30 different state programs for PLSS data collection. The Subcommittee has developed guidance on ongoing data maintenance. http://nationalcad.org/download/PLSS_Stewardship.pdf

11) Is the metadata in a FGDC endorsed geospatial metadata standard?
Answer: Metadata is available in a format endorsed by the FGDC, it fully describes the dataset and provides all the information required to make the dataset discoverable, accessible, and
The PLSS is now registered on the Geoplatform - http://www.geoplatform.gov/node/243/84324aed-78c1-4801-99e3-1ac6c00a3a84.
additional guidance on cadastral metadata can be found at this link.
http://nationalcad.org/CadStandMetadata/CadStandMetadata.html

12) How complete is the geographic coverage as defined in the requirements for the dataset?
Part 1 Answer: Business requirements for cyclic updates identified and a process is in place.
Part 2 Answer: Dataset has presently attained the greatest geographic coverage as defined by the current requirements or roughly 100%.

13) Do you have a process for providing users access to the data in an open digital machine readable format?
Answer: User access process is fully implemented, data is available, process is reviewed and updated on a recurring basis.

14) Is there a maintenance process for updating and storing the dataset?
Answer: Dataset maintenance process is fully implemented and processes are reviewed and periodically updated.

15) Is there an error correction process as part of dataset maintenance?
Answer: Error correction process includes user notification, process reviewed on a recurring basis.

16) Is there a process to determine if the dataset meets user needs?
Answer: Process is fully implemented and repeated on a recurring basis.
In addition the cadastral Subcommittee has a standard maintenance working group that responds to requests for updates or changes.

17) Is there a process to provide users information on how to access and properly use the dataset?
Answer: Process is fully implemented supporting access and proper use, process is reviewed on a recurring basis.

Justification Comment:

The data are published on the web and on the geospatial platform and are readily findable through any internet search engine. The following is the one of the top returns when doing a search. PLSS CadNSDI Data Set Availability.pdf

Jun 15, 2015 - PLSS CadNSDI Data Set Availability. June 15 2015. BLM Cadastral Survey, the FGDC Cadastral Subcommittee, Premier Data Services, and ...

18) Are the business processes and management practices assessed to meet changing technology?
Answer: Assessment process is fully implemented for taking advantage of changing technology, process is reviewed on a recurring basis.

Justification Comment:

Yes, BLM cadastral has partnered with Esi, at no cost to the federal government to develop a COTS solution for ongoing maintenance. Adopting the commercially available technology has also allowed the BLM to develop and adopt maintenance workflows. These workflows are available to any willing data steward.

STAGE 7 - Archive

19) Is there an archiving process for the dataset?
Answer: Archival and disposition processes are fully implemented.

Justification Comment:

The PLSS CadNSDI data sets can be generated directly from the parcel fabric. The National Operations Center (NOC) and the state offices save a copy of the data set locally each year. Additionally the contractors are maintaining back up and archive copies. This data set should not require an historical archive beyond what is needed for backup.