STATUS AND PLANNING UPDATE TO FGDC STEERING COMMITTEE

The National Geospatial Platform Initiative: From Disparate Big Data to Shared Geographic Knowledge & Services
What is GeoPlatform.gov?

A concerted effort to share open geospatial data and technology

- A services platform for providing direct access to the nation’s online geospatial resources
  - Single point of access for finding data assets, services, layers and maps
  - Provides shared hosting services for our stakeholders (e.g. AGOL and OpenGeo stack)

- Implements key objectives of the National Spatial Data Infrastructure (NSDI) Strategic Plan

- Consistent, reliable portal to nation’s vast ecosystem of distributed geospatial data/services

- Means for our stakeholders to publish their content once and have it accessed from anywhere

- Shared core application services for stakeholder collaboration (e.g., building shared map galleries for a community of interest)
GFY 2017 Roadmap Overview
GFY2017 Roadmap: Key Priorities

- Promote metadata tools into production
  e.g., Creating ISO19115 metadata for NGDA Datasets and Services

- Collect and report data and service performance and utilization
  e.g., Performance dashboard and usage analytics for NGDA assets

- Demonstrate unique capability and deliver incremental value
  e.g., Semantic Registry, Map Knowledge Graph (MKG), OpenLayer and OpenMap Recommender services

- Expand active use of GeoPlatform in new communities
  e.g., Infrastructure, Indian Lands, Remote Sensing

- Catalog integration
  e.g., Connecting community and vendor datasets and catalogs
GFY2017 Roadmap: Key Challenges

- Metadata – inconsistent; created for human, not machine consumption; lacks semantically grounded concepts; focused on describing and finding datasets rather than finding and accessing online services at runtime.

- NGDA Datasets need online services to support runtime utilization
  - Data downloads creates redundancy and temporal inconsistencies

- Poor and inconsistent quality of online services (availability, reliability, and conformance to standards).

- Missing or inconsistent policies, procedures, and tools for full lifecycle management in a seamless, on-demand user search, exploration, discovery and usage experience.
Release 7 - Live
Release 7 Status

Object Editor
- Browse and filter by
  - Keyword Phrase, Type, Theme, Agency
- Create new Resource Items:
  - Dataset, Service, Concept (Keyword, Theme and Thesaurus), Organization, Contact
  - Import from ISO 19139 metadata
- Edit Resource Items
  - Augment, correct, link

Performance Dashboards
- LMA Dashboard – UI enhancements
- Service Dashboard – UI enhancements
- Dataset Dashboard (new) – search by keyword, theme, agency; determine status of linked services

Updates to RegP R6
- Updated RIM for alignment with OGC-based Semantic RIM
- Enhanced API for search and management
- Bootstrap Codelists for A-16 Themes and Organizations for FGDC Partner Agencies
- Auto-generate URIs for globally persistent identifiers out-of-the-box (required for linking and disambiguation)
- Ingest ISO-19139 XML with mappings to RIM
- Contributing updates back to the Apache SIS library (open source library for processing ISO metadata)

Wordpress integration
- Migration from Drupal begins
- Dynamic content for event and meeting information, online help, etc.
Release 8/9/10
Plans & Status
Roadmap: Release 8 (Apr/May 2017)

Theme: OpenLayer, OpenMap, and Open APIs

Capabilities

- Portfolio Resource Lifecycle Tools: OpenLayer & OpenMap
  - Create, Link, Update, Delete, and Report
  - Export: GeoPlatform Profile of ISO 19115-3

- Update Map Viewer to create and use OpenLayer and OpenMap
  - Search, View, Link, Save

- Enhanced API (Unified Access Layer)
  - Access controls
  - Collect and report utilization metrics

Benefits

- Deliver a rich portfolio experience

- Community/Topic-focused Linked Data, Services, Layers, and Maps

- Open APIs for search of Portfolio Assets

- Business intelligence and insights into usage and value of Portfolio Assets

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### Roadmap: Release 9 (Jul/Aug 2017)

**Theme: Taxonomies, Knowledge Graphs, and Community Pilots**

<table>
<thead>
<tr>
<th>Capabilities</th>
<th>Benefits</th>
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<tbody>
<tr>
<td>Resource Utilization</td>
<td>5-star Linked Data and Knowledge Graphs</td>
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<tr>
<td>- Metrics Collection and Dashboards</td>
<td>- Map makers add context (meaning, significance and relevance) to the map as “tradecraft”</td>
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<tr>
<td>Integrate Taxonomy into Portfolio Resource Management</td>
<td>- Others can easily discover just the right map that is fit for their purpose</td>
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<tr>
<td>- Register Taxonomy; Enhanced Editors</td>
<td>- As community contributes rich social context, Maps become valuable social objects</td>
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<tr>
<td>Integrate Knowledge Graphs for OpenLayers and OpenMaps</td>
<td>Expand impact of the GeoPlatform through outreach and engagement with communities of interest beyond the A-16</td>
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<tr>
<td>- LKG/MKG for OpenLayer &amp; OpenMap Editors, Map Viewer and Map Manager tools</td>
<td>Themes</td>
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<tr>
<td>Community Pilot Projects</td>
<td>GEOPLATFORM.gov</td>
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<tr>
<td>- Registering Taxonomies, Datasets, Services and OpenLayers</td>
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<tr>
<td>- Curating, linking, grounding and sharing</td>
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Towards shared geospatial knowledge and services...
Theme: Community and Linked Catalog Pilots

Capabilities

- Recommender micro-services to leverage LKG/ MKG context and tradecraft
- Demonstrate integrations of community-supplied taxonomies
- Community Map Viewer tool for viewing dynamic, customized, reusable (embeddable) OpenMaps

Benefits

- Expanded use of context and tradecraft for rich GeoPlatform Portfolio experience
- Bridging across community and vendor datasets and catalogs
  - Find the right data
  - Fit-for-use
LMA Survey Update
Community Cookbook
Tutorial Update
LMA Survey Update

- Updating the Lifecycle Maturity Assessment
  - April 3rd – Invite users for beta testing.
  - May 8th - Survey goes live.
  - Late Summer - Update Performance.

- Changes
  - A few questions may be slightly changed.
  - Fewer questions with open ended answers.

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Community Cookbook

- Purpose - To provide detailed information on creating a community space.

- What’s included
  - Overview of Community Space and processes.
  - Detailed steps on what is involved in creating a community space.
  - Roles & responsibilities for creating and managing the spaces.
GeoPlatform Strategic Direction

- Revisit path forward aligning with the new Strategic Plan
- Revisit the business case and business needs
- Identify additional/new use cases
- Identify funding options
- Convene an Executive Committee meeting to begin the discussion
Thank You!