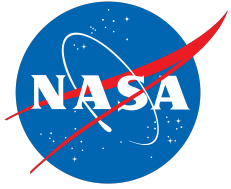




Tool Registry

PDS Technical Session
Pasadena, California
September 21-23, 2016

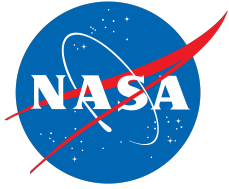
Sean Hardman



Topics

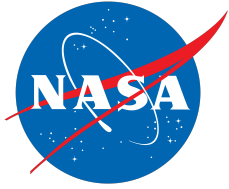


- Overview
- Architecture
- Status
- Interface
- Next Steps

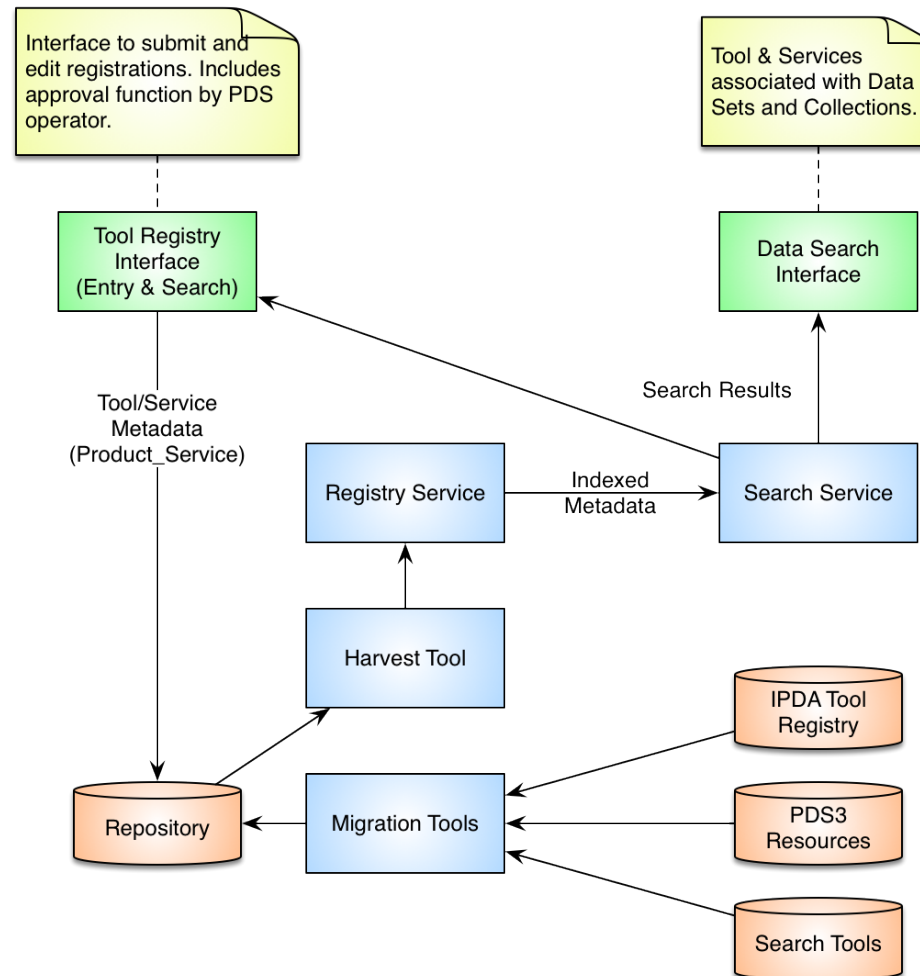


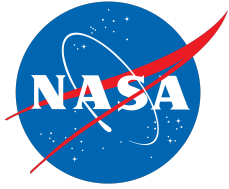
Overview

- Initiated by the desire to expand the scope of the IPDA Tool Registry as well as the 9/28/15 action item to post a list of PDS tools.
- Intent is to incorporate all PDS tool sources into a single registry.
- The application will be built on top of existing PDS4 components.
- The Product_Service class has been updated to support this application (CCB-123).



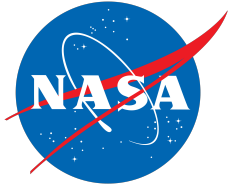
Architecture





Status

- The initial version of the interface is available on our test server.
 - <http://pds-gamma.jpl.nasa.gov/tools/tool-registry>
- Migrations of the PDS Search Tools and IPDA Tools have been completed and loaded into the Registry and Search Services on pds-gamma.
 - Migrated entries have been cleaned up to some extent.
- Please review the current list of tools and submit updates or new entries as appropriate.
 - All submissions are reviewed prior to posting.



Search Interface



PDS: Tool Registry

pds-gamma.jpl.nasa.gov/tools/tool-registry/

Quick Searches

- [Mars Science Laboratory](#)
- [Mercury](#)
- [Venus](#)
- [Mars](#)
- [Jupiter](#)
- [Saturn](#)
- [Uranus, Neptune, Pluto](#)
- [Rings](#)
- [Asteroids](#)
- [Comets](#)
- [Planetary Dust](#)
- [Earth's Moon](#)
- [Solar Wind](#)

PDS Nodes

- [Atmospheres](#)
- [Geosciences](#)
- [Cartography and Imaging Sciences](#)
- [Navigational & Ancillary Information \(NAIF\)](#)
- [Planetary Plasma Interactions \(PPI\)](#)
- [Ring-Moon Systems](#)
- [Small Bodies](#)

PDS Support

- [Management](#)
- [Engineering](#)

Tool Registry

This interface allows the user to search for and discover tools relating to the access and use of planetary data. The interface also allows tool providers to submit their software for inclusion in the registry.

[Search for Tools](#)[Submit a Tool](#)

Browse or search the PDS tool registry. Select a tool below to view the details.

Search

Category:

☒ All ☐ Design ☐ Planning ☐ Validation ☐ Analysis ☐ Dissemination ☐ Search ☐ Visualization ☐ Reader ☐ Generation ☐ Transformation

Interface Type:

☒ All ☐ GUI ☐ API ☐ Service ☐ Command-Line

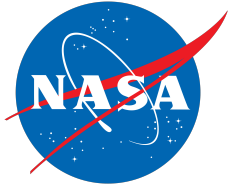
Support:

☒ Both ☐ PDS3 ☐ PDS4

Tools

Displaying 1 to 50 of 57 results.

Name	PDS Version
2001 Mars Odyssey Image Search <i>Use the Planetary Atlas to search for THEMIS images from the 2001 Mars Odyssey mission.</i>	PDS3
Cassini Image Search <i>Use the Planetary Atlas to search for ISS, VIMS, and Radar images from the Cassini mission of Saturn, Jupiter or Moon encounters.</i>	PDS3
Catalog Template Search	PDS3



Tool Submission Interface



PDS: Tool Registry

pds-gamma.jpl.nasa.gov/tools/tool-registry/

Quick Searches

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Tool Registry

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[Search for Tools](#)[Submit a Tool](#)

Use this form to submit a new tool to the PDS Tool Registry.

All fields with an asterisk * are required.

Step 1: Tool Information

Step 2: Software Information

Step 3: Submitter Information

Tool Name *
Provide a name for the tool.

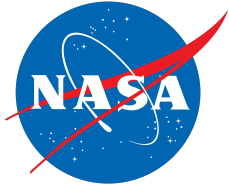
Type *
Identify whether it is a downloadable tool or online service.

Tool

Abstract Description *
Provide a brief description of the tool.

Description
Provide a detailed description of the tool.

Support *



Tool Submission Interface



PDS: Tool Registry

pds-gamma.jpl.nasa.gov/tools/tool-registry/

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- Small Bodies

PDS Support

- Management
- Engineering

Tool Registry

This interface allows the user to search for and discover tools relating to the access and use of planetary data. The interface also allows tool providers to submit their software for inclusion in the registry.

[Search for Tools](#) [Submit a Tool](#)

Use this form to submit a new tool or service to the PDS Tool/Service Registry.

Step 1: Tool Information

Step 2: Software Information

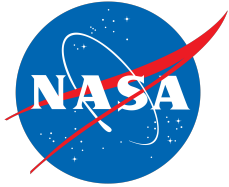
Step 3: Submitter Information

Version
Provide the version of the tool.

Release Date
Provide the date when this version was released.

Software Language
Provide the computer programming languages that the tool supports, if applicable. Please list each language separately, one per line.

Supported Operating Systems
Describe the supported hardware and operating system platforms the tool supports, if applicable.



Tool Submission Interface



PDS: Tool Registry

pds-gamma.jpl.nasa.gov/tools/tool-registry/

Tool Registry

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PDS Support

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Submitter Name*
Provide the name of the submitter.

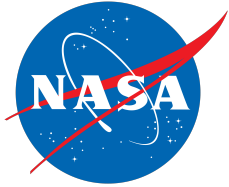
Submitter Institution*
Provide the name of the institution employing the submitter or better yet curates the tool.

Submitter Email*
Provide the email address of the submitter so that we may contact you regarding the submission.

[Previous](#) [Submit](#)

[Privacy / Copyright](#)
[Freedom of Information Act](#)

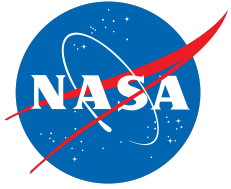
Webmaster: [PDS Operator](#)
NASA Official: William Knopf
Last updated; September 2016



Product Label

(Minimal Information)

```
<?xml version="1.0" encoding="UTF-8"?>
...
<Product_Service ...>
  <Identification_Area>
    <logical_identifier>urn:nasa:pds:context_pds3:service:test_tool</logical_identifier>
    <version_id>1.0</version_id>
    <title>Test Tool</title>
    <information_model_version>1.6.0.0</information_model_version>
    <product_class>Product_Service</product_class>
    <Modification_History>
      ...
    </Modification_History>
  </Identification_Area>
  <Service>
    <name>Test Tool</name>
    <abstract_desc>This is a test tool.</abstract_desc>
    <version_id>1.0</version_id>
    <url>http://localhost:8080</url>
    <service_type>Tool</service_type>
    <category>Analysis</category>
  </Service>
</Product_Service>
```



Next Steps

- Resolve some outstanding issues.
 - Submission not working in Safari.
 - Check for valid URL.
 - Future feature for editing existing entries.
- Verify that the registry contains a representative set of available tools/services.
- Deploy the application to the operational servers.
- Integrate the search tools from the registry into Data Search results.

Questions/Comments