

**Data Unleashed**  
**Smithsonian Library Data for**  
**Artists & Artwork**  
**in Share-VDE BIBFRAME**



**Jackie Shieh**

Descriptive Data Management Librarian (retired)

**Anne Evenhaugen**

Head, Smithsonian American Art and Portrait Gallery Library  
Smithsonian Libraries and Archives

# Topics

- Semantic technology
- Smithsonian Institution (SI)
- Smithsonian Libraries and Archives (SLA)
- SLA's Linked data journeys
- Share-VDE Initiative and Technology
- SLA SVDE Linked data Portal
- Challenges and next steps

# Semantic Technology

LC control no.: n 86012335

LCCN Permalink: <https://lccn.loc.gov/n86012335>

Descriptive conventions: rda

Personal name heading: Walcott, Mary Vaux, 1860-1940

Variant(s): Walcott, Mary Morris Vaux, 1860-1940

Located: Washington (D.C.)

Birth date: 1860-07-31

Death date: 1940-08-22

Place of birth: Philadelphia (Pa.)

Field of activity: Art Illustration of books Naturalism in art

Profession or occupation: Illustrators Artists Naturalists

Found in: Her Wildflowers of America, 1987, c1953: CIP t.p. (Mary Vaux Walcott)

## North American wild flowers, / by Mary Vaux Walcott.

Author: Walcott, Mary Vaux, 1860-1940

Title: North American wild flowers, / by Mary Vaux Walcott.

Publisher: Washington, D. C., The Smithsonian institution, 1925-

Description: 5 v. : col. ill. ; 36 x 28 cm.

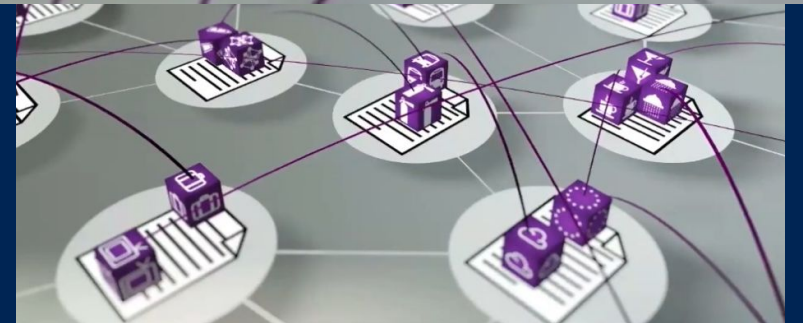
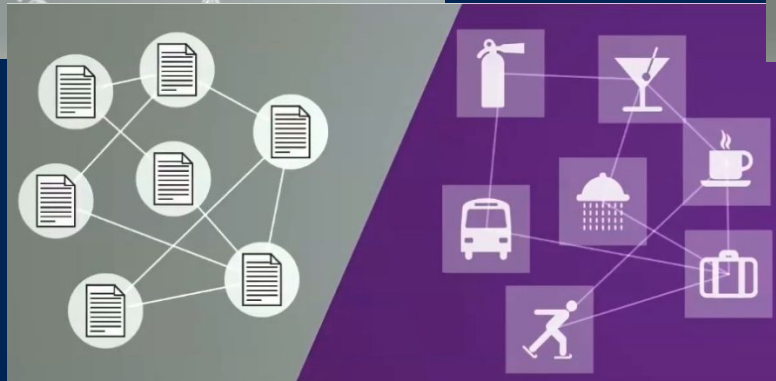
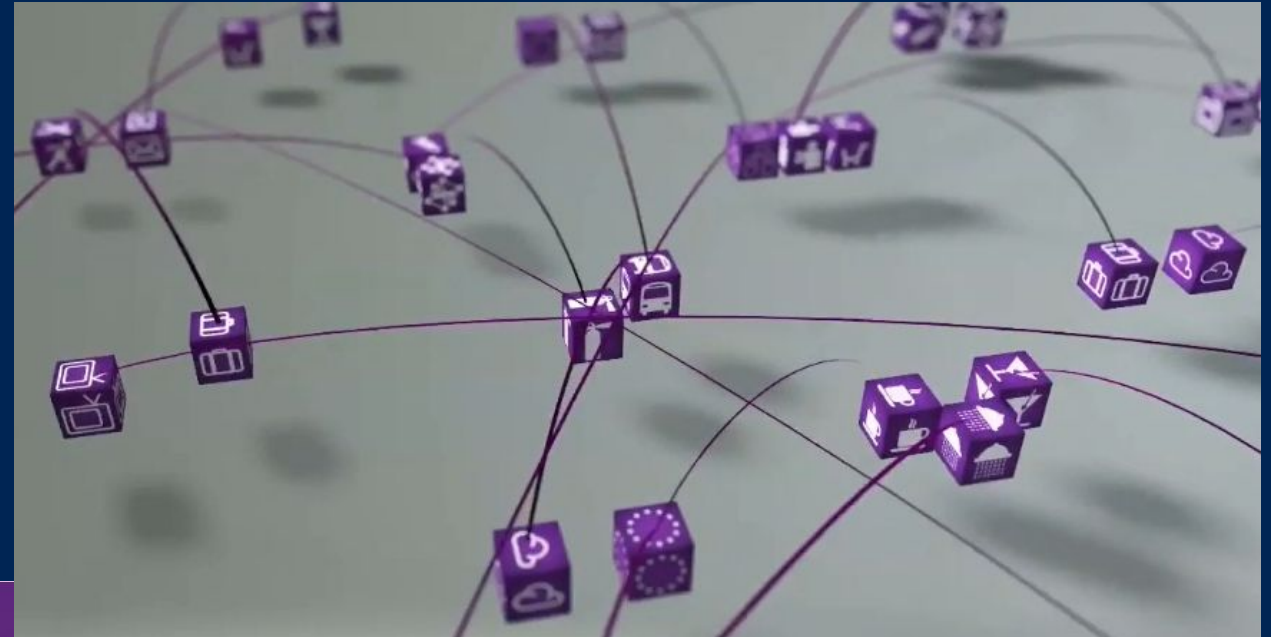
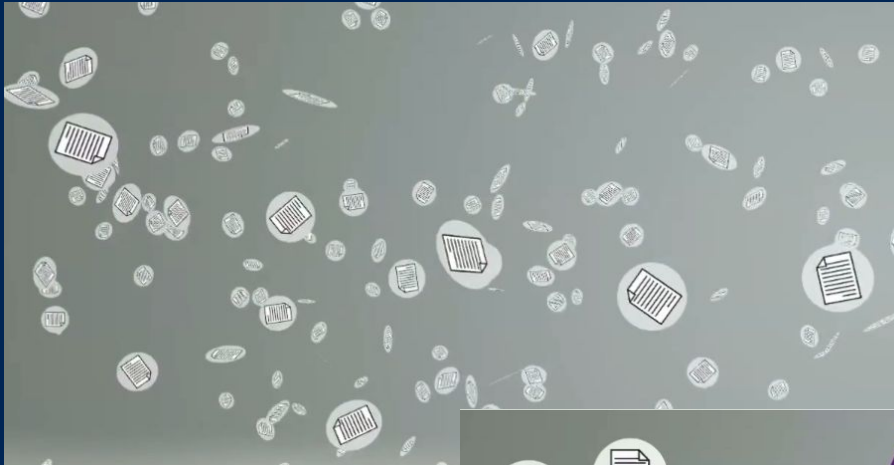
Notes: In portfolio.

Local Note: MSRLSI copy 39088007299183 is number 326.

Subject: Flowers -- North America.

Catalog Source No.: (OCoLC)ocm00582166

# Everything must be able to link to everything



Images: [Linked Data: vimeo.com/42962819](https://vimeo.com/42962819)

# Smithsonian Institution





## The Smithsonian is:

**21** museums

**157M** items

**14** education & research centers

**1** zoo

**200+** affiliates

**6K** staff

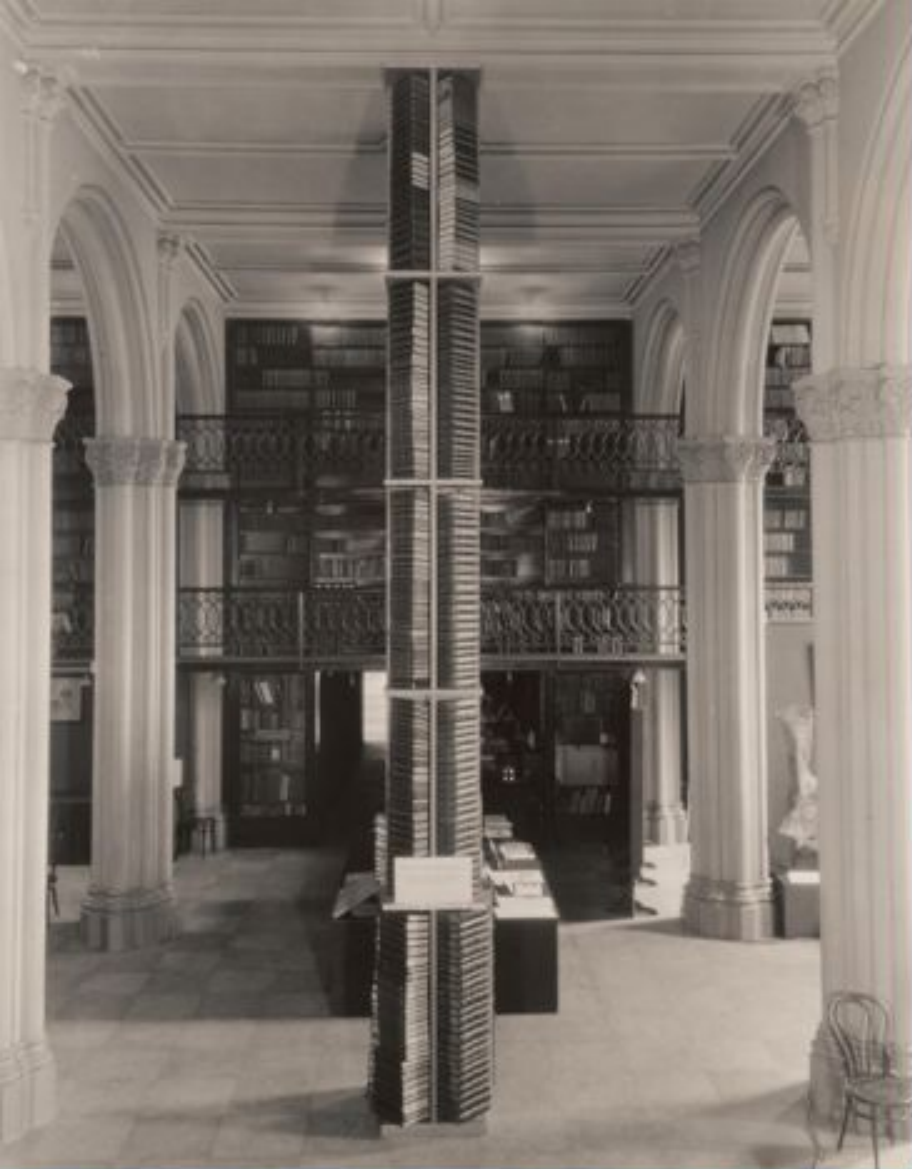
**30M** visitors

The Smithsonian Institution is a **Trust Instrumentality** of the Federal Government **Founded August 10, 1846**

Image: Chip Clark, NMNH



**Smithsonian**  
*Libraries and Archives*



# Smithsonian Libraries and Archives

[librariesarchives.si.edu](http://librariesarchives.si.edu)

**22** branches and reading rooms

**3M** library volumes

**50K** rare books

**44K ft<sup>3</sup>** archives accessions

**23TB** of digital records

**109** staff members\*

Smithsonian Institution Archives, Record Unit 95, Box 41, Folder 09, Image No.

SIA\_000095\_B41\_F09\_037

\*as of 2024



Smithsonian  
*Libraries and Archives*

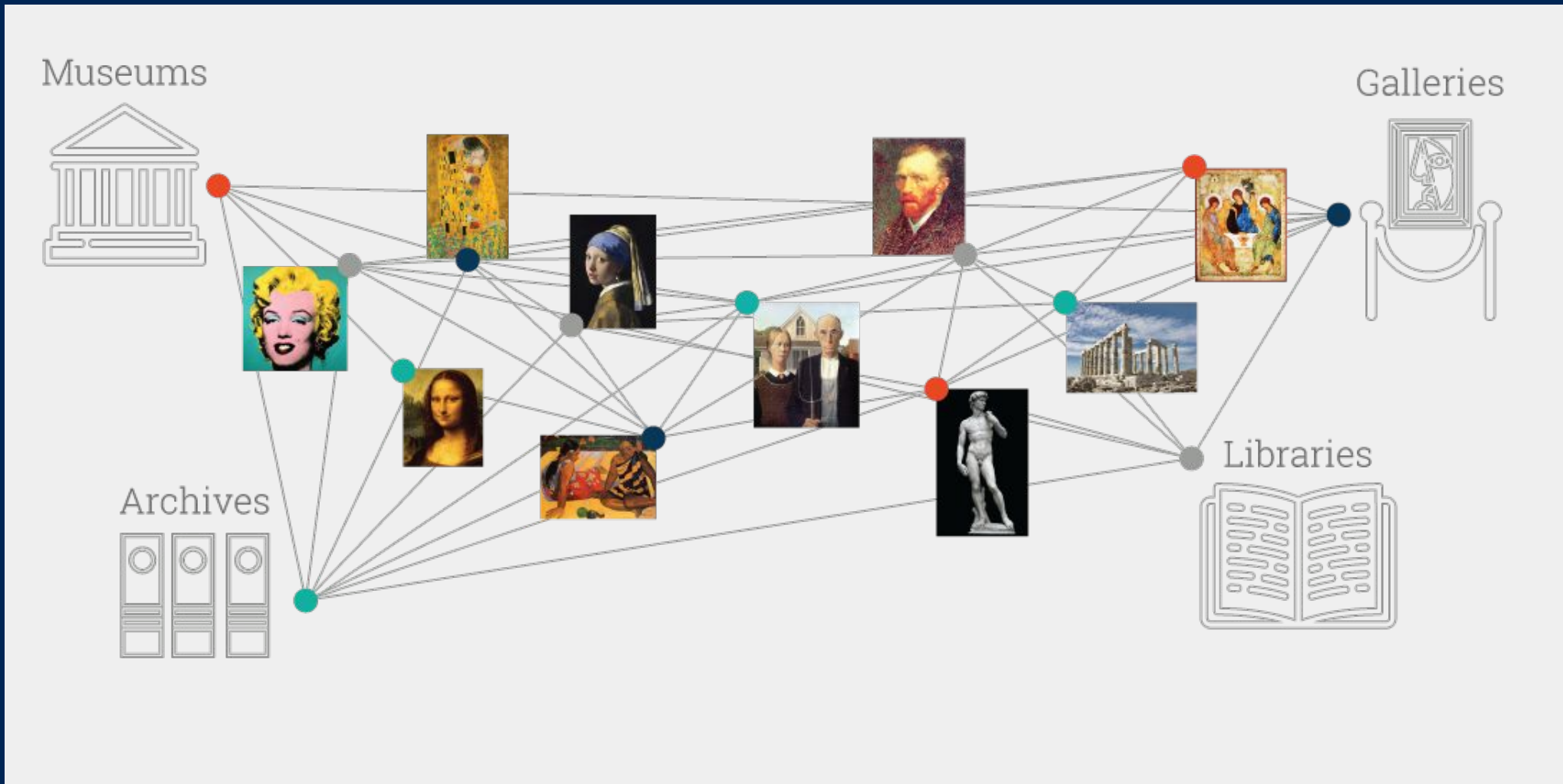


Image: [Linked Open Data for Cultural Heritage](#)

# SLA's Linked Data Journey

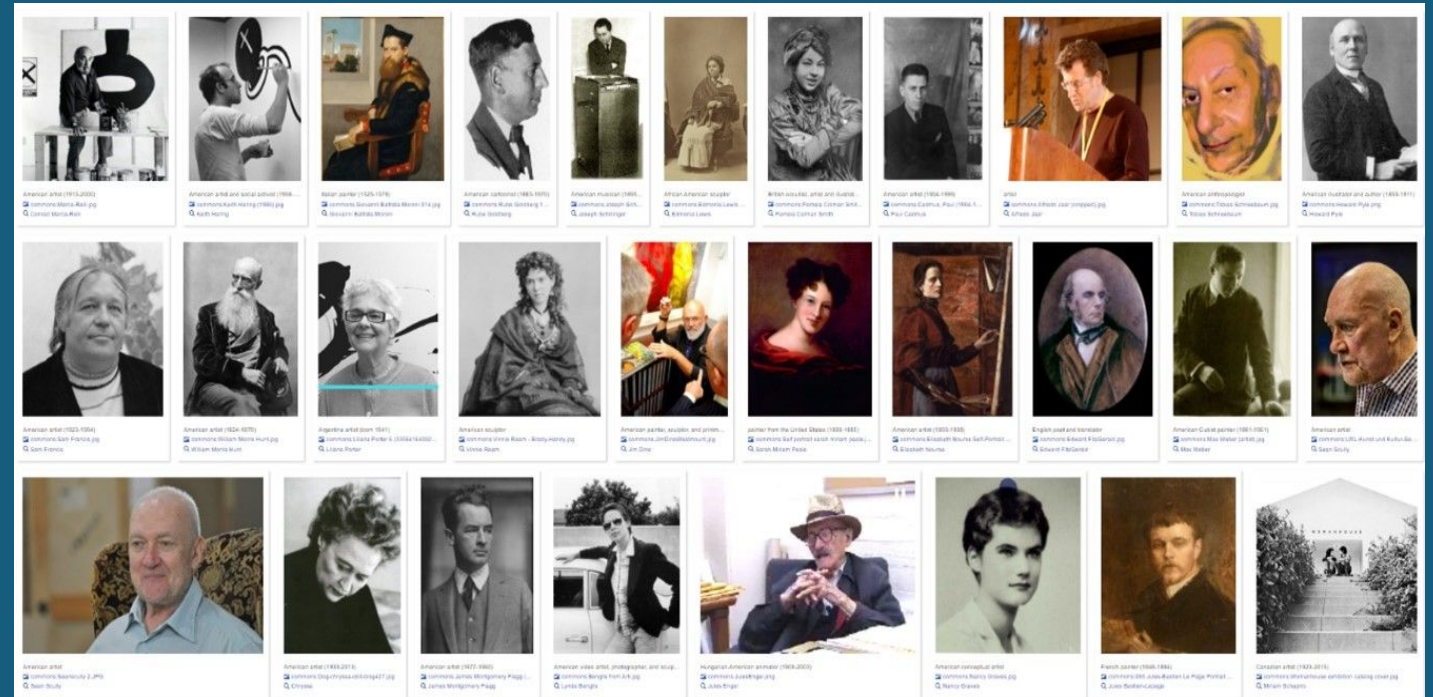
## Library Linked open data efforts

- Authority\_identity data in Wikidata/Wikibase

[bit.ly/4ggYt2A](http://bit.ly/4ggYt2A)

- BIBFRAME in Share-VDE

[s.si.edu/3DZjeCx](http://s.si.edu/3DZjeCx)



# Share Virtual Discovery Environment (SVDE)

# Share-VDE and Share Family Initiative

The Share Family is a collaborative initiative based on the needs of libraries, developed and supported by:



the joint effort of the Share Family Advisory Council and of the Working Groups that contribute to its development;



Casalini Libri, provider of bibliographic and authority data as member of the Program for Cooperative Cataloguing;



@Cult, provider of ILS, Discovery tools and Semantic web solutions for the cultural heritage sector;



the vision of Linked Data for Production initiative with special endorsement of Stanford;



with input and active participation from an international group of research and national libraries.

[wiki.share-family.org](http://wiki.share-family.org)

# The Share Family Linked Data Ecosystem



The Share Family brings together cultural heritage institutions, consortia, and Library Service Platforms (LSP). Joins their knowledge in an ever-widening network of interconnected bibliographic data.

For more, please visit the [Share Family](#) and the [Share Family wiki](#) sites

Slide courtesy of SVDE Team



Slide courtesy of SVDE Team

Slide courtesy of SVDE Team

# SLA Data after SVDE

## PROCESSES

### DATA INPUT FROM INSTITUTIONS

MARC21 bib. and holding  
MARC21 aut.  
UNIMARC  
RDF/BIBFRAME  
Other formats (eg. IIF Manifest)



### LOD PLATFORM SERVICES

Mapping  
URI Enrichment  
Reconciliation  
Creation of  
Linked Data Entities  
Conversion to  
RDF/BIBFRAME



### RESULTS

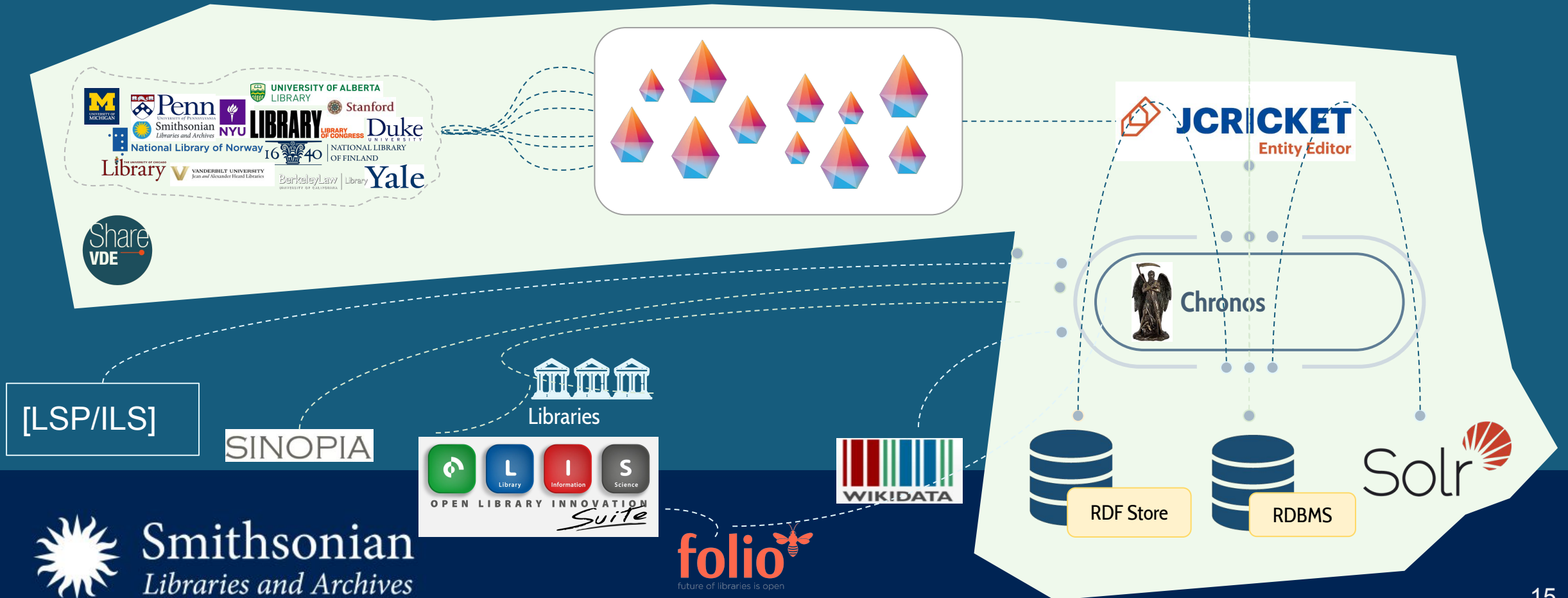
[ Data Publication ]  
+  
[ Data Distribution ]  
+  
[ Shared Data Management ]  
+  
[ Additional Services ]

# Share-VDE LOD Platform Technology

Data flows from libraries, institutions and third-party authority sources (e.g. VIAF, ISNI, FAST)

The SVDE knowledge base (**Sapientia**) of integrated/clustered/enriched entities.

Data edited through JCricket, the entity editor.





# SLA's Linked Data Portal

Smithsonian | *Catalog*

## Search for people, original works and publications

e.g. Jules Verne or Around the world in 80 days



Advanced search


Explore the library's linked open data entities created in BIBFRAME by

Share-VDE

smithsonian.svde.org

# Example: Mary Vaux Walcott

Smithsonian



## Walcott, Mary Vaux

American artist, photographer, botanist and naturalist (1860-1940).

*Mary Morris Vaux Walcott was an American artist and naturalist known for her watercolor paintings of wildflowers. She has been called the "Audubon of Botany."* - [Wikipedia](#)

More options ▾






[Wikimedia Commons](#)

Original works by **Publications by** Original works about

Filter publications... |  |  |  |  |  |  Held at Smithsonian Libraries

14 results

Sort by (A - Z) ▾

- 1** **Wild flowers of America (Volume in English, published in 1953.)**  
Contributors:
  -  [Walcott, Mary Vaux](#) (author)
  -  [Crown Publishers](#) (publisher)
  -  [Platt, Dorothy Falcon](#) (other)
  -  [Rickett, Harold William](#) (other)
  -  [Peabody Museum Collection \(Library of Congress\)](#) (other)

[Wikimedia C](#)

[y Vaux \(author\)](#)

# Mary Vaux Walcott & Artworks

**Person** ⓘ

## Walcott, Mary Vaux

American artist, photographer, botanist and naturalist (1860-1940).

*Mary Morris Vaux Walcott was an American artist and naturalist known for her watercolor paintings of wildflowers. She has been called the "Audubon of Botany."* - [Wikipedia](#)

More options ▾

[Wikimedia Commons](#)

[Wikimedia Commons](#) [Smithsonian American Art Museum](#)

Original works by  Publications by  Original works about  Artworks by

Filter original works...

7 results

Rookwood Pottery / name:"Rookwood Pottery" / catalog record source:"National Museum of American History"

← → Sorted by Relevancy ▾ View as List ▾ Print Results Expand All Share ▾

169 documents - page 1 of 9



### > Rookwood Vase

expand  
Add to My List

**MAKER:** Rookwood Pottery 🔍  
**PHYSICAL DESCRIPTION:** black (overall color)  
**OBJECT NAME:** vase  
**CREDIT LINE:** Page Kirk  
**ID NUMBER:** CE.393615  
**DATA SOURCE:** National Museum of American History



### > Rookwood Vase

expand  
Add to My List

**MAKER:** Rookwood Pottery 🔍  
**PHYSICAL DESCRIPTION:** polychrome (overall surface decoration color name)  
**OBJECT NAME:** vase  
**DATE MADE:** 1890



Smithsonian | Catalog



Wikimedia Commons

Publication

Filter original v

29 results

No. Title

# Challenges and Future Outlook

- Data governance
- Data quality
- Community data pool and interoperability specifications
- Scope creep relating to external data sources
- Technology innovation impact on data curation

# Images and Resources

*Landsdowne Portrait* by Gilbert Stuart (1796) National Portrait Gallery, Washington D.C.  
[commons.wikimedia.org/entity/M33579](https://commons.wikimedia.org/entity/M33579)

The Hope Diamond  
*Photo courtesy of the Smithsonian Institution*  
[www.si.edu/newsdesk/photos/hope-diamond-0](http://www.si.edu/newsdesk/photos/hope-diamond-0)

Dorothy's Ruby Slippers  
[americanhistory.si.edu/press/fact-sheets/ruby-slippers](http://americanhistory.si.edu/press/fact-sheets/ruby-slippers)

Mei Xiang (Meghan Murphy photos)  
[insider.si.edu/2011/05/hormone-tests-show-mei-xiang-the-national-zoos-female-panda-may-be-pregnant/](http://insider.si.edu/2011/05/hormone-tests-show-mei-xiang-the-national-zoos-female-panda-may-be-pregnant/)

Smithsonian Institution Building (aka the Castle)  
[commons.wikimedia.org/entity/M96312914](https://commons.wikimedia.org/entity/M96312914)

1909 Wright Military Flyer  
[airandspace.si.edu/collection-objects/1909-wright-military-flyer/nasm\\_A19120001000](http://airandspace.si.edu/collection-objects/1909-wright-military-flyer/nasm_A19120001000)

Share Family news and updates  
[wiki.share-vde.org/wiki/ShareFamily:NewsAndUpdates](http://wiki.share-vde.org/wiki/ShareFamily:NewsAndUpdates)

*Mary Vaux Walcott artworks on Wikidata Art Depiction Explorer*  
[art.wikidata.link/browse?P170=Q6780882](http://art.wikidata.link/browse?P170=Q6780882)

*Mary Vaux Walcott artworks on Smithsonian American Art Museum*  
[americanart.si.edu/search/artworks?content\\_type=artwork&persons\[\]=6016](http://americanart.si.edu/search/artworks?content_type=artwork&persons[]=6016)

*Rookwood at Cooper Hewitt*  
[collection.cooperhewitt.org/people/18043903/](http://collection.cooperhewitt.org/people/18043903/)  
*Rookwood at American History*  
[collections.si.edu/search/results.htm?q=Rookwood+Pottery&fq=data\\_source%3A%22National+Museum+of+American+History%22&fq=name:%22Rookwood+Pottery%22](http://collections.si.edu/search/results.htm?q=Rookwood+Pottery&fq=data_source%3A%22National+Museum+of+American+History%22&fq=name:%22Rookwood+Pottery%22)

Thank you!



# Blue Theme

- Use this theme if you'd like a darker background. This works well on screens versus projectors, and for longer presentations.
- [Hyperlink example](#)

## PROCESSES

### DATA INPUT FROM INSTITUTIONS

MARC21 bib. and holding

MARC21 aut.

UNIMARC

RDF/BIBFRAME

Other formats (eg. FOLIO)



### LOD PLATFORM SERVICES

## PROCESSES

Mapping

Reconciliation

Creation of  
Linked Data Entities

Conversion to  
RDF/BIBFRAME



### RESULTS

#### [ Data Publication ]

- End user discovery portals for each initiative of the Share Family

#### [ Data Distribution ]

- Search APIs for data consumption (GraphQL, REST, SPARQL)
- API / protocols for third parties integration

#### [ Shared Data Management ]

- (eg. local ISPs and data editor such as Wikidata, Sinopia BIBFRAME editor, FOLIO etc.)
- Editing of Share Family entities with ICricket
- Downloadable datasets
- BIBFRAME/RDF, MARC-enriched records in local library systems

#### [ Additional Services ]

- Authority control in MARC and BIBFRAME-based library systems
- Share Family Index: registry of entity URIs

# SLA Data in Share Family Linked Data Ecosystem

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### LOD PLATFORM SERVICES

Mapping

URI Enrichment

Production

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X

## PROCESSES

=

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#### [ Additional Services ]

- BIBFRAME/RDF, MARC-enriched records
- Share Family BIBFRAME data in local library systems
- Authority control in MARC and BIBFRAME-based authority files
- Representations in local library systems
- Share Family Index: registry of entity URIs