LC BIBFRAME Update Forum, 9th February 2025

BIBFRAME in Practice: Powering a Collaborative Share Family Community with JCricket

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Share Family Council & **Working Groups**: joint efforts contribute to development

Casalini Libri: provider of bibliographic and authority data, member of PCC

@Cult: ILS, Discovery tools and Semantic web solutions for the cultural heritage sector

vision of **Linked Data for Production** initiative with special endorsement of **Stanford University**

input and active participation from an **international group of research libraries**

Shared goals

Build a **linked data ecosystem** where **BIBFRAME entities** fully benefit from the rich data heritage of MARC catalogues.

Serve as a **trusted linked data hub**, providing authoritative, high-quality metadata for the global community.

Unify and enrich records from different libraries into a **shared entity-based catalogue**, integrating data from LC, VIAF, ISNI, Wikidata, and other trusted sources.

Offer a **user experience** that's both rich and intuitive, enabling seamless discovery and exploration.

Open the data on multiple levels — through APIs, triple stores, and the discovery portal — to support diverse uses, from research to innovation.

New scenarios for cataloguing cooperation

Continuing developments…

2015-2016

- **ALIADA**
- **BIBFRAME update Forum** at ALA Midwinter in Boston
- **Share catalogue** online (universities from southern Italy)
- **Share-VDE** prototype

2017-2019

- **Share-VDE** and **LD4P** members' data converted from MARC21 to BIBFRAME

2019-2021

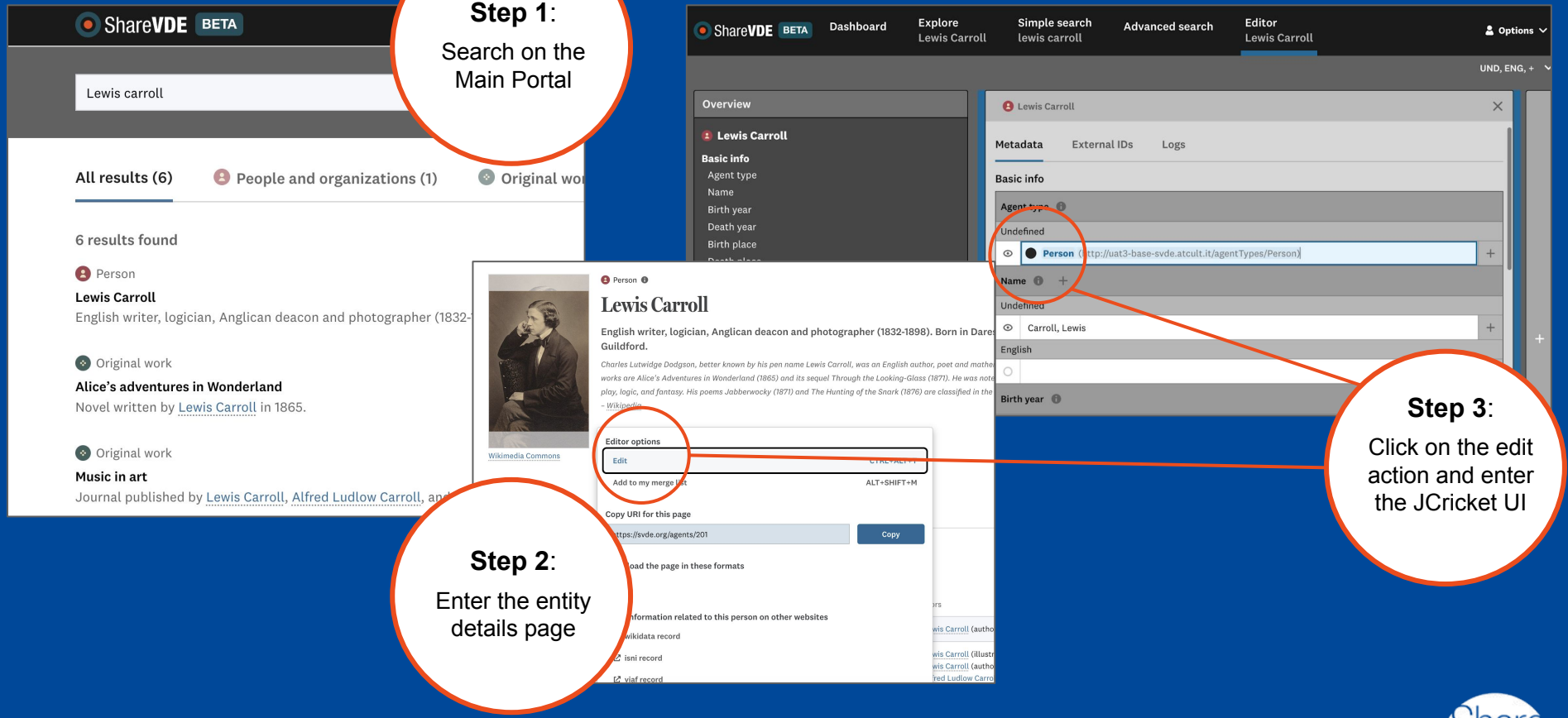
- **Share-VDE** – virtual discovery environment for library linked open data
- **Share Family** embraces all LOD Platform initiatives

2021-2023

- Ongoing **PCC** data pool
- **Share-VDE** 2.0
- Ongoing **NatBib** working group and shared discovery environment
- **Share Family** towards production

2023-2025

- **British National Bibliography** in linked open data (beta version)
- **Parsifal** and **LILLIT** shared discovery environments launch
- **JCricket** collaborative cataloguing editor
- **LOD Platform** version 3



Shared tools for collaborative data management

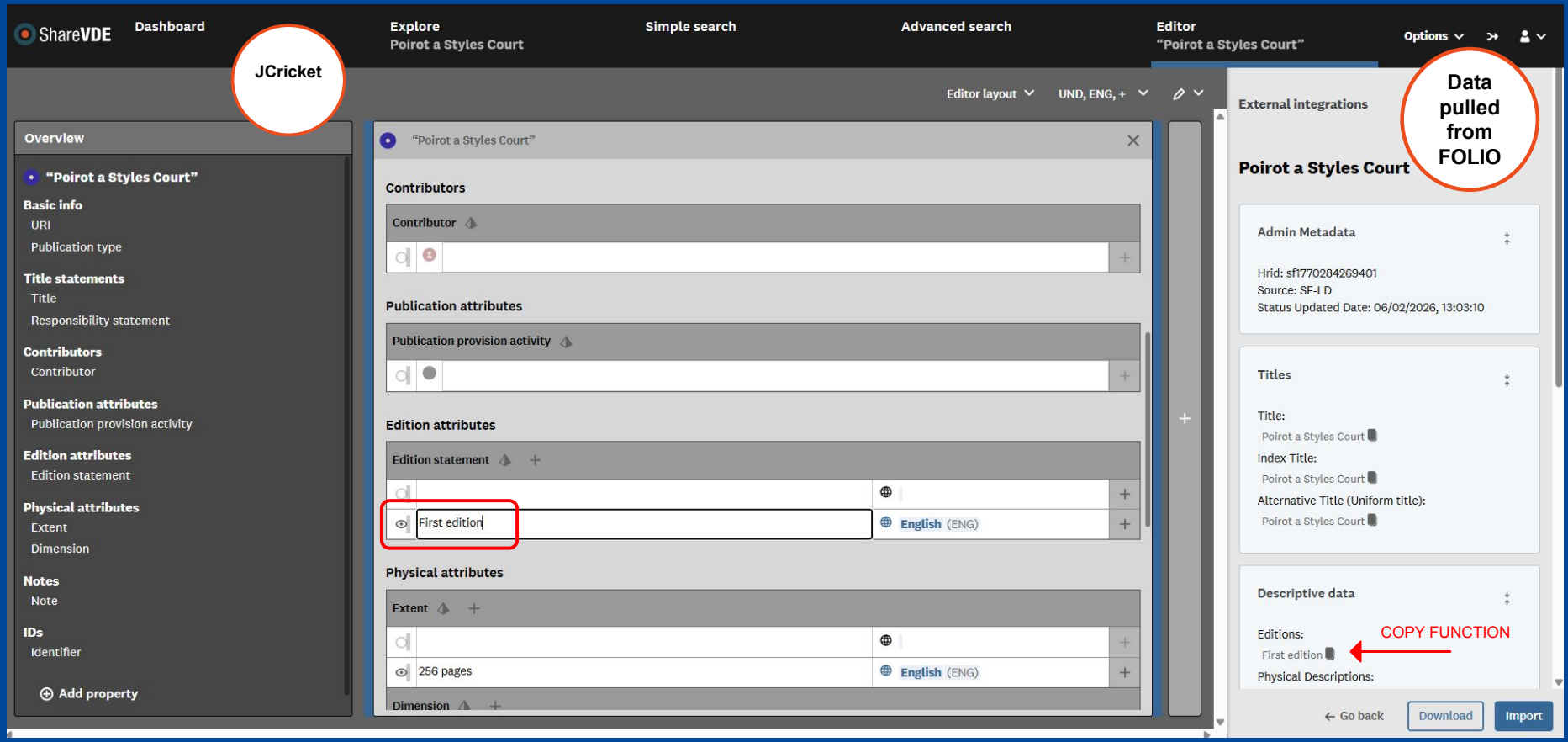
Derived/copy cataloguing

Derived records
A “copy” of the original record. They remain unchanged unless voluntarily updated (“Replace”)

Original vs. Derived
Generally independent
Alignment mechanisms exist (e.g. SBN Index alignment)

Technological evolution
APIs, protocols and open data → greater flexibility
Derived cataloging becomes less rigid

New possibilities
Richer search mechanisms
More data formats
Growing number of open data sources



Copy cataloguing - pull data from FOLIO

Co-operative cataloging

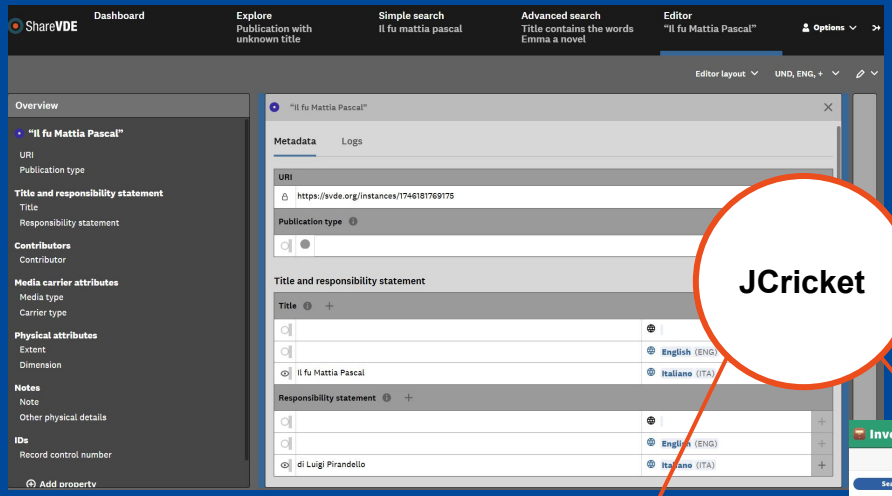
A cooperative/integrated workflow where local and central systems are fully interoperable: data entered locally is reflected centrally, and conversely, central data is discoverable and reusable locally.

➡️ Focus: **bidirectional synchronization**; cataloging gains added value by keeping local and central environments **aligned**.

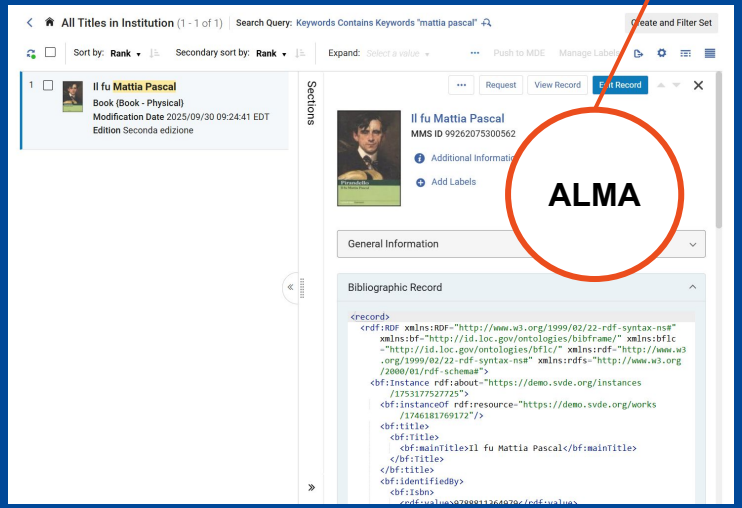
Co-operative cataloguing

Data flow from JCricket to FOLIO

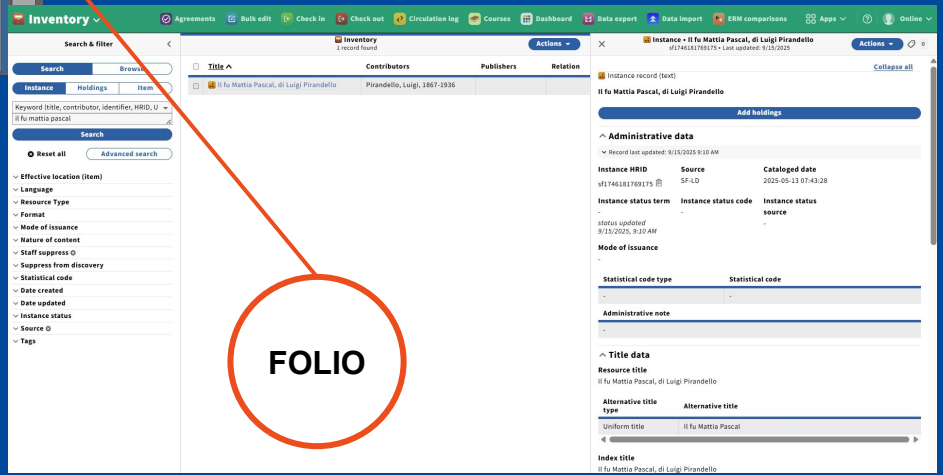
Data flow from JCricket to Alma



JCricket



ALMA



FOLIO

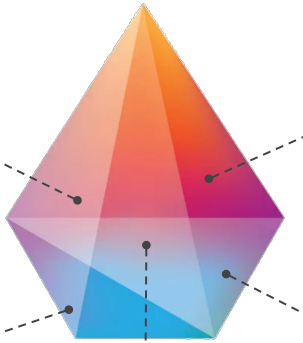
Shared cataloguing

Shared cataloguing promotes an integrated and cooperative model in which several contributors work together to create and enhance bibliographic entities.

Provenance and Prism

P1 — VIAF Virtual International Authority File

title	Alice in wonderland
titleAlternative	Alice's adventures under ground
author	https://svde.org/people/201



P2 — WIKIDATA

title	Alice in wonderland
titleAlternative	Alice's adventures under ground
author	https://svde.org/people/201

P4 — BnF Data

title	Alice in wonderland

P3 — Share VDE

sameAs	http://dbpedia.org/resource/Alice's_Adventures_in_Wonderland	Dbpedia
sameAs	https://www.wikidata.org/wiki/Q189875	Wikidata
sameAs	https://data.bnf.fr/ark:/12148/cb358500385#about	bnf

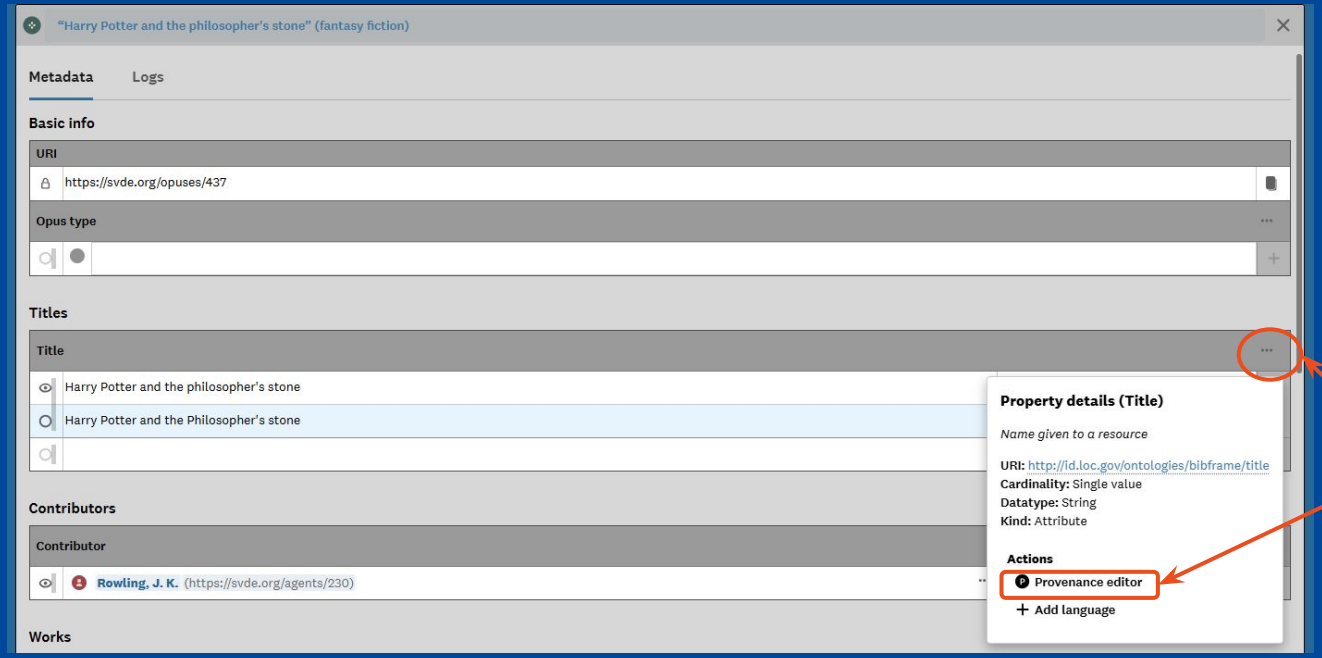
P5 — WorldCat Entities

title	Alice's adventures under ground
titleAlternative	Journeys in Wonderland
author	https://svde.org/people/201

Share FAMILY

Shared cataloguing

Provenance management:
explore an Agent prism



Options box including Provenance editor

Shared cataloguing

Provenance management:
explore an Agent prism

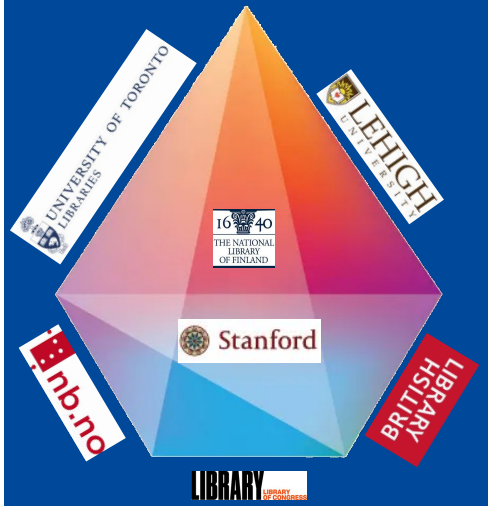
"Harry Potter and the Philosopher's Stone" (fantasy fiction)

Provenance data

Title	Harry Potter and the philosopher's stone		NLF	
	Harry Potter and the philosopher's stone		BL	
	Harry Potter and the philosopher's stone		UTORONTO	
	Harry Potter and the Philosopher's stone		STANFORD	
	Harry Potter and the Philosopher's stone		LEHIGH	
	Harry Potter and the Philosopher's Stone		LOC	
	Harry Potter e la pietra filosofale	Italian (ITA)	LEHIGH	
	Harry Potter og de vises stein	Norwegian Bokmål (NOB)	NLN	

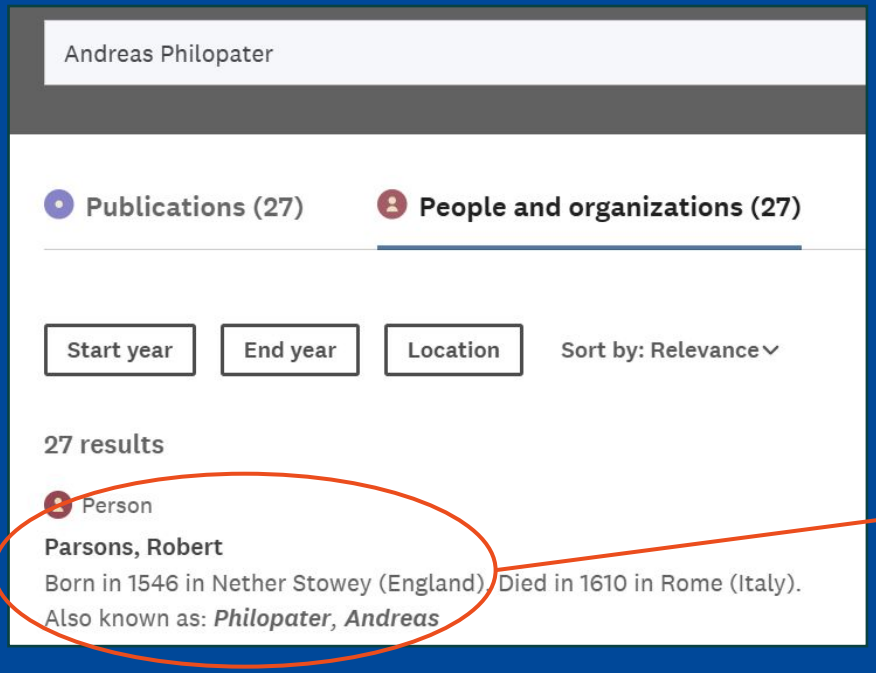
End of 'title' provenance statements

Close



Share FAMILY

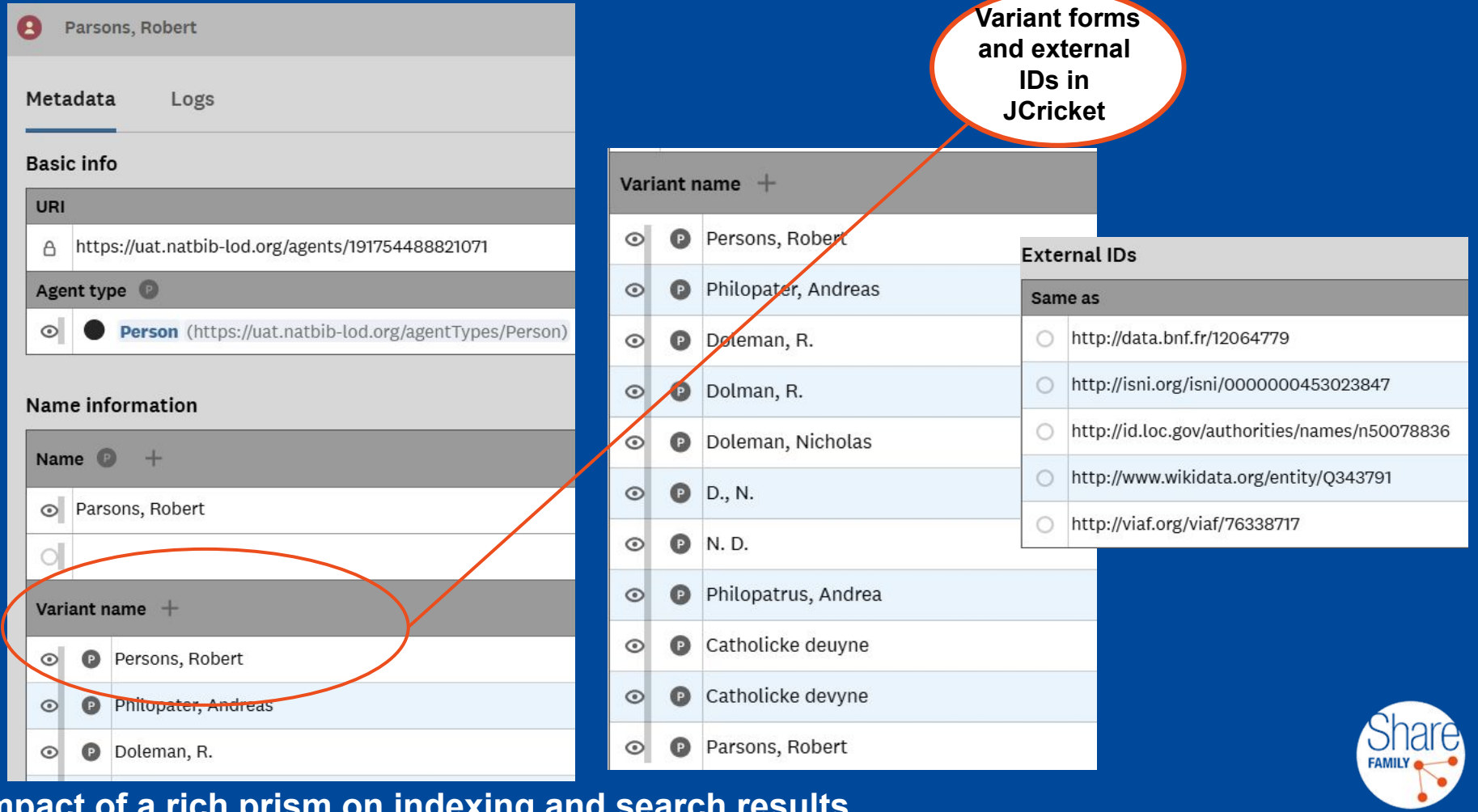
Shared cataloguing



Variant forms are clustered, indexed and recognised

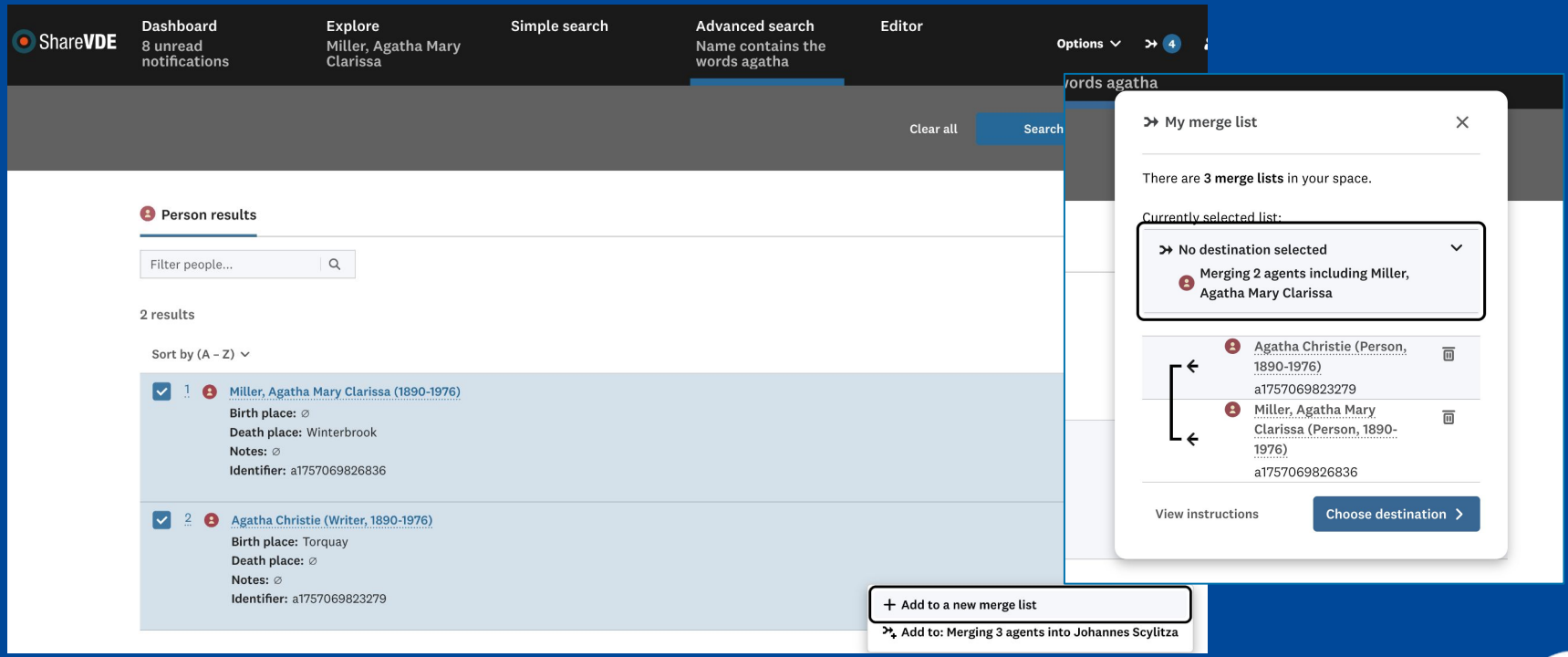
Variant forms

impact of a rich prism on indexing and search results



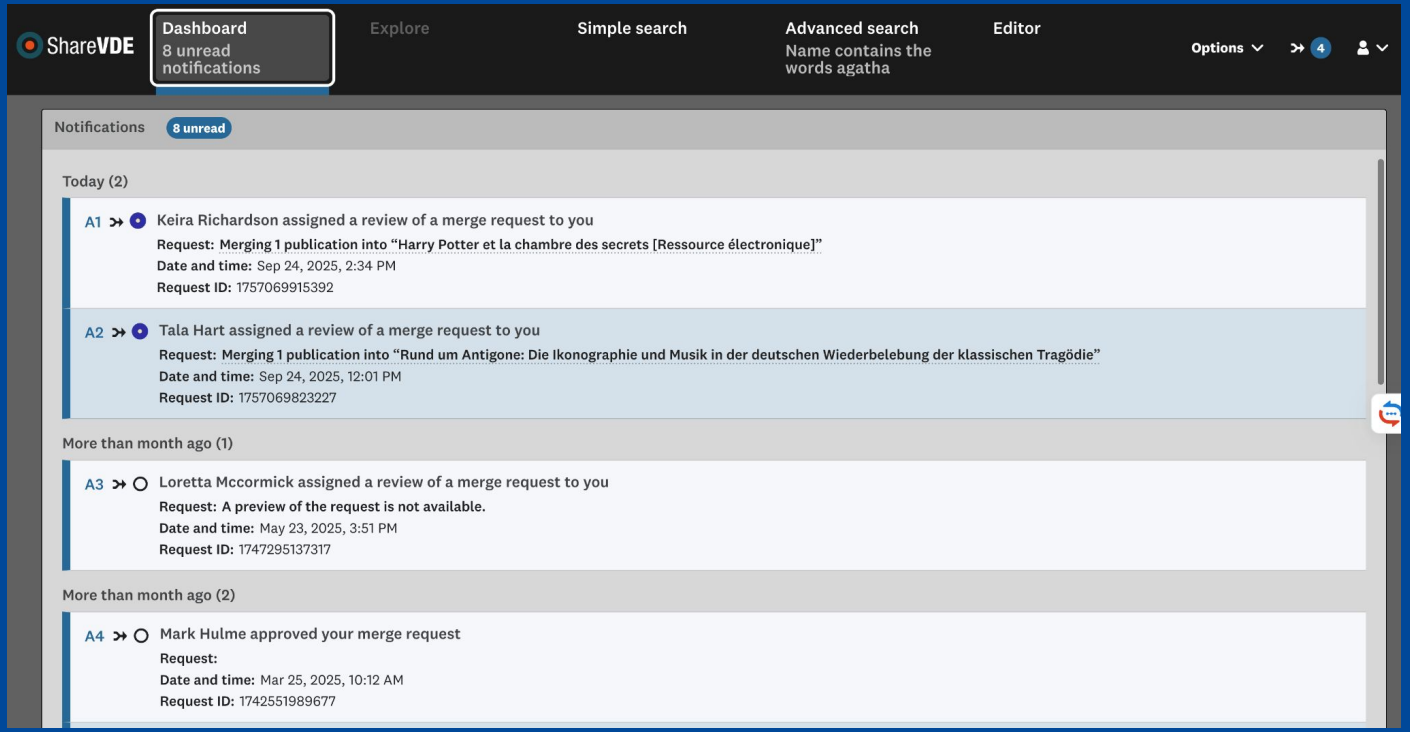
impact of a rich prism on indexing and search results

Shared cataloguing



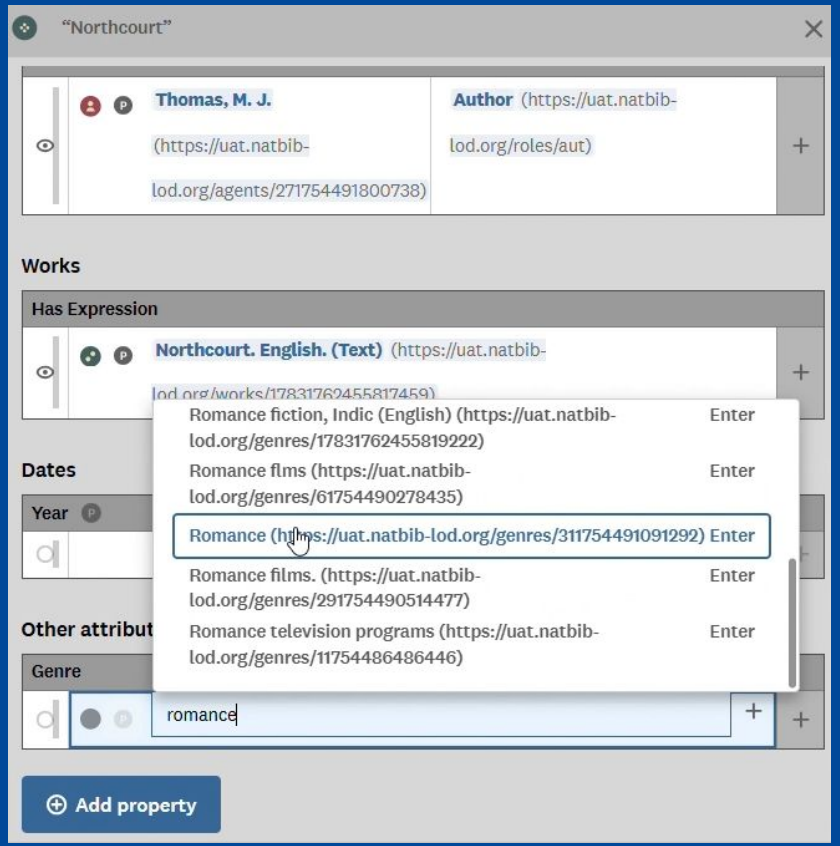
[Merge entities in JCricket]

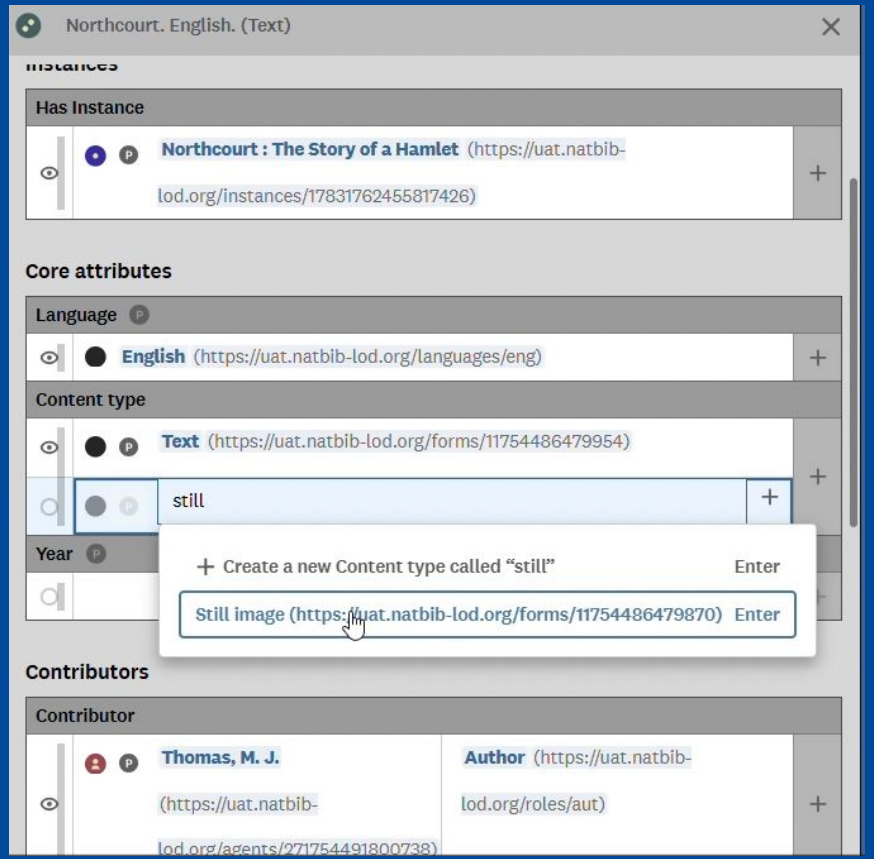
Shared cataloguing



JCricket Dashboard for Task Assignment

Shared cataloguing





Controlled vocabularies

Best practices for the use of JCricket in a shared environment

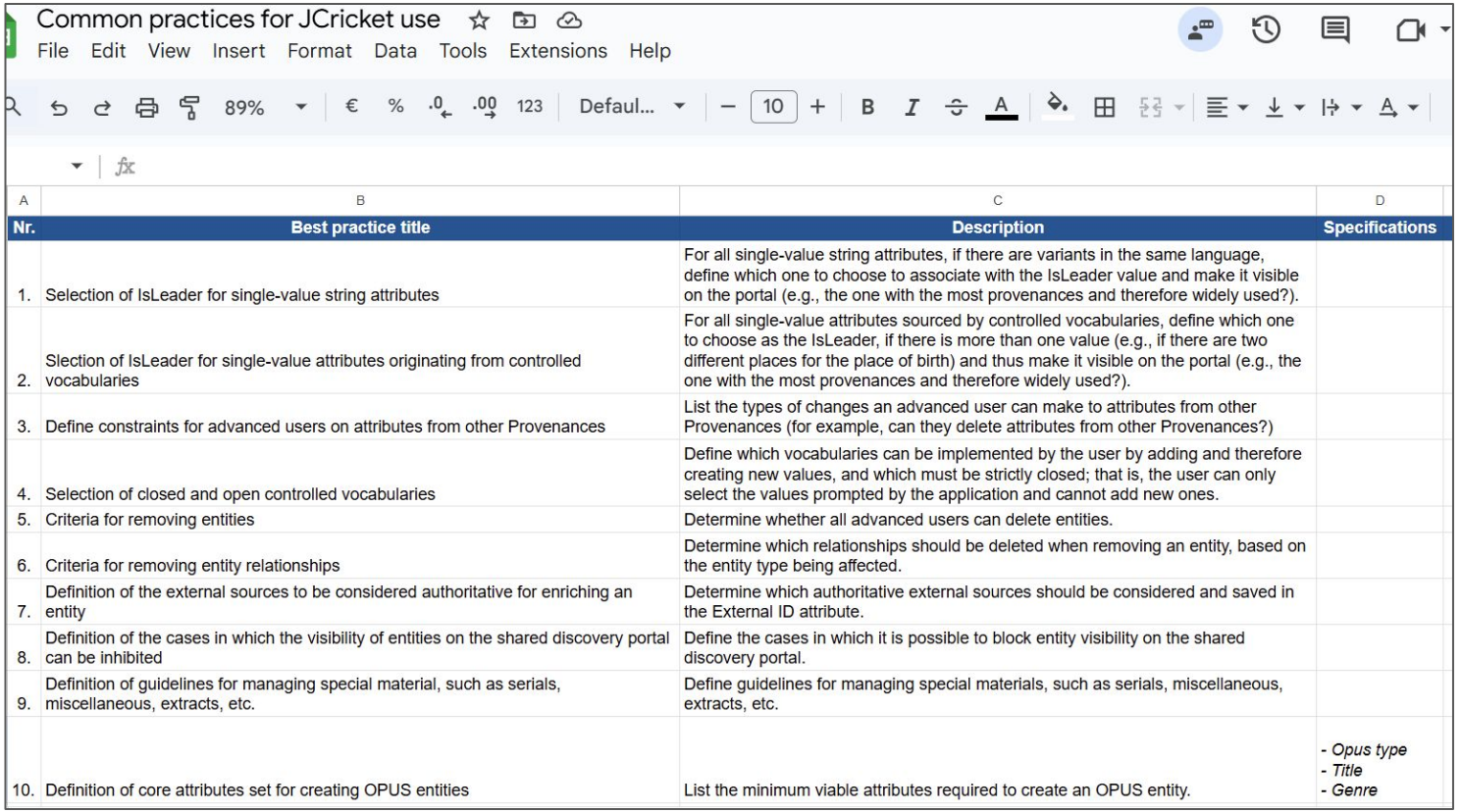
Scope:

- establish practices to work on a multi-institution, shared, entity-based catalogue
- consolidate cataloguing workflows in JCricket
- ensure streamlined, consistent data integration with external systems

JCricket practices examples:

- core set of properties for entities description
- selection of preferred forms (eg. for mono-valued properties, or different input values for controlled vocabularies)
- constraints on editing data coming from other Provenances
- criteria for entity cancellation
- criteria for selection of authoritative external sources
- …

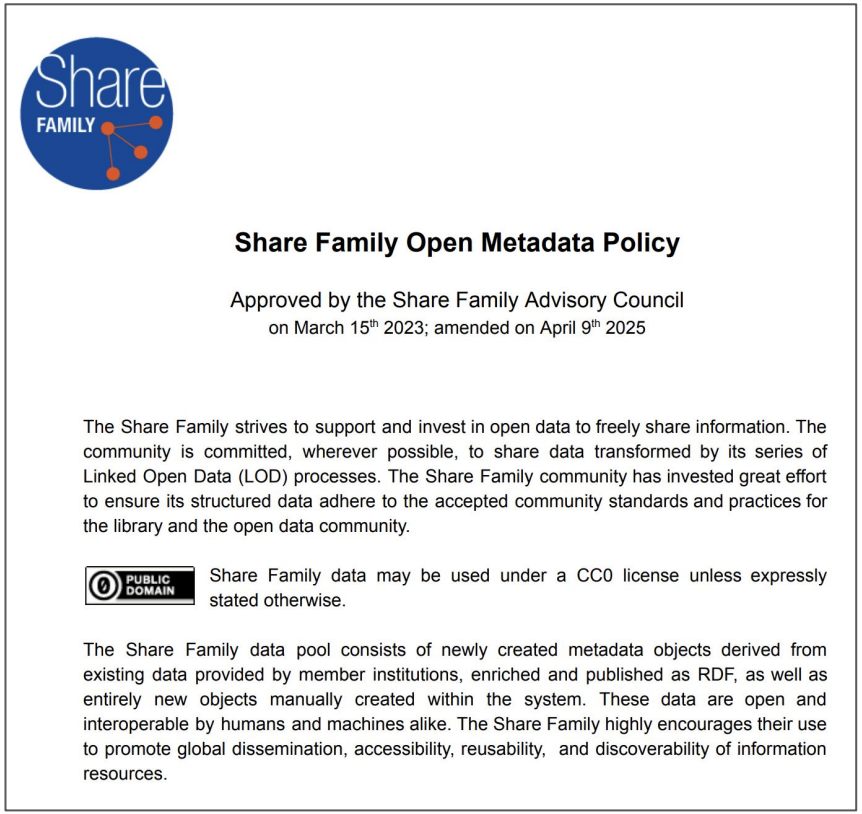
Examples of best practices for the use of JCricket in a shared environment



Common practices for JCricket use

File Edit View Insert Format Data Tools Extensions Help

Nr.	Best practice title	Description	Specifications
1.	Selection of IsLeader for single-value string attributes	For all single-value string attributes, if there are variants in the same language, define which one to choose to associate with the IsLeader value and make it visible on the portal (e.g., the one with the most provenances and therefore widely used?).	
2.	Slection of IsLeader for single-value attributes originating from controlled vocabularies	For all single-value attributes sourced by controlled vocabularies, define which one to choose as the IsLeader, if there is more than one value (e.g., if there are two different places for the place of birth) and thus make it visible on the portal (e.g., the one with the most provenances and therefore widely used?).	
3.	Define constraints for advanced users on attributes from other Provenances	List the types of changes an advanced user can make to attributes from other Provenances (for example, can they delete attributes from other Provenances?)	
4.	Selection of closed and open controlled vocabularies	Define which vocabularies can be implemented by the user by adding and therefore creating new values, and which must be strictly closed; that is, the user can only select the values prompted by the application and cannot add new ones.	
5.	Criteria for removing entities	Determine whether all advanced users can delete entities.	
6.	Criteria for removing entity relationships	Determine which relationships should be deleted when removing an entity, based on the entity type being affected.	
7.	Definition of the external sources to be considered authoritative for enriching an entity	Determine which authoritative external sources should be considered and saved in the External ID attribute.	
8.	Definition of the cases in which the visibility of entities on the shared discovery portal can be inhibited	Define the cases in which it is possible to block entity visibility on the shared discovery portal.	
9.	Definition of guidelines for managing special material, such as serials, miscellaneous, extracts, etc.	Define guidelines for managing special materials, such as serials, miscellaneous, extracts, etc.	
10.	Definition of core attributes set for creating OPUS entities	List the minimum viable attributes required to create an OPUS entity.	- *Opus type* - *Title* - *Genre*



Share Family Open Metadata Policy

Approved by the Share Family Advisory Council
on March 15th 2023; amended on April 9th 2025

The Share Family strives to support and invest in open data to freely share information. The community is committed, wherever possible, to share data transformed by its series of Linked Open Data (LOD) processes. The Share Family community has invested great effort to ensure its structured data adhere to the accepted community standards and practices for the library and the open data community.

PUBLIC DOMAIN Share Family data may be used under a CC0 license unless expressly stated otherwise.

The Share Family data pool consists of newly created metadata objects derived from existing data provided by member institutions, enriched and published as RDF, as well as entirely new objects manually created within the system. These data are open and interoperable by humans and machines alike. The Share Family highly encourages their use to promote global dissemination, accessibility, reusability, and discoverability of information resources.

Open Metadata Policy

JCricket and the LOD Platform rely on open metadata:

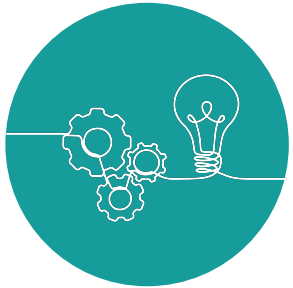
- the network of participating institutions co-create open metadata descriptions for new-born object
- individual descriptions and aggregated datasets
- entity URIs can be freely reused and shared
- external sources of open data are also key to enrich the datasets

Commitment to open metadata:

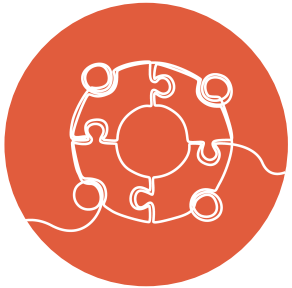
- Share Family Open Metadata Policy
- Open Metadata in the Share Family, at DCMI Open Metadata Clinic (DCMI 2025 Conference)
- Discussion with Barcelona Declaration on Open Research Information

Developed and driven **by libraries, for libraries**

Governed and steered by the **Share Family Advisory Council**, made up of representatives from member institutions.



Members and **working groups** actively participate in policy-making and tool development, as well as defining goals.



Expertise, responsibilities and costs are shared across the **community** for the benefit of all.

Co-operative
Shared tools for collaborative data management

Sustainable
Optimisation of efforts for the benefit of all members

Open
Interoperability for increased discovery of collections

Inclusive
Diversity for enhancement and equality of access to knowledge

Dynamic
Flexibility and interaction are central

Find out more
http://bit.ly/44rnqpA

Live examples of JCricket features

Data flow from JCricket to FOLIO

Data flow from JCricket to Alma

Copy cataloguing - pull data from FOLIO

Management of Provenance and Prism

- Management of Provenance and Prism - Agent
- Impact of a rich prism on indexing and search results

Merge entities in JCricket and JCricket Dashboard for Task Assignment

Controlled vocabularies

Thank you!

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Share Family information is available here: