

A model for a sustainable repository network in Serbia

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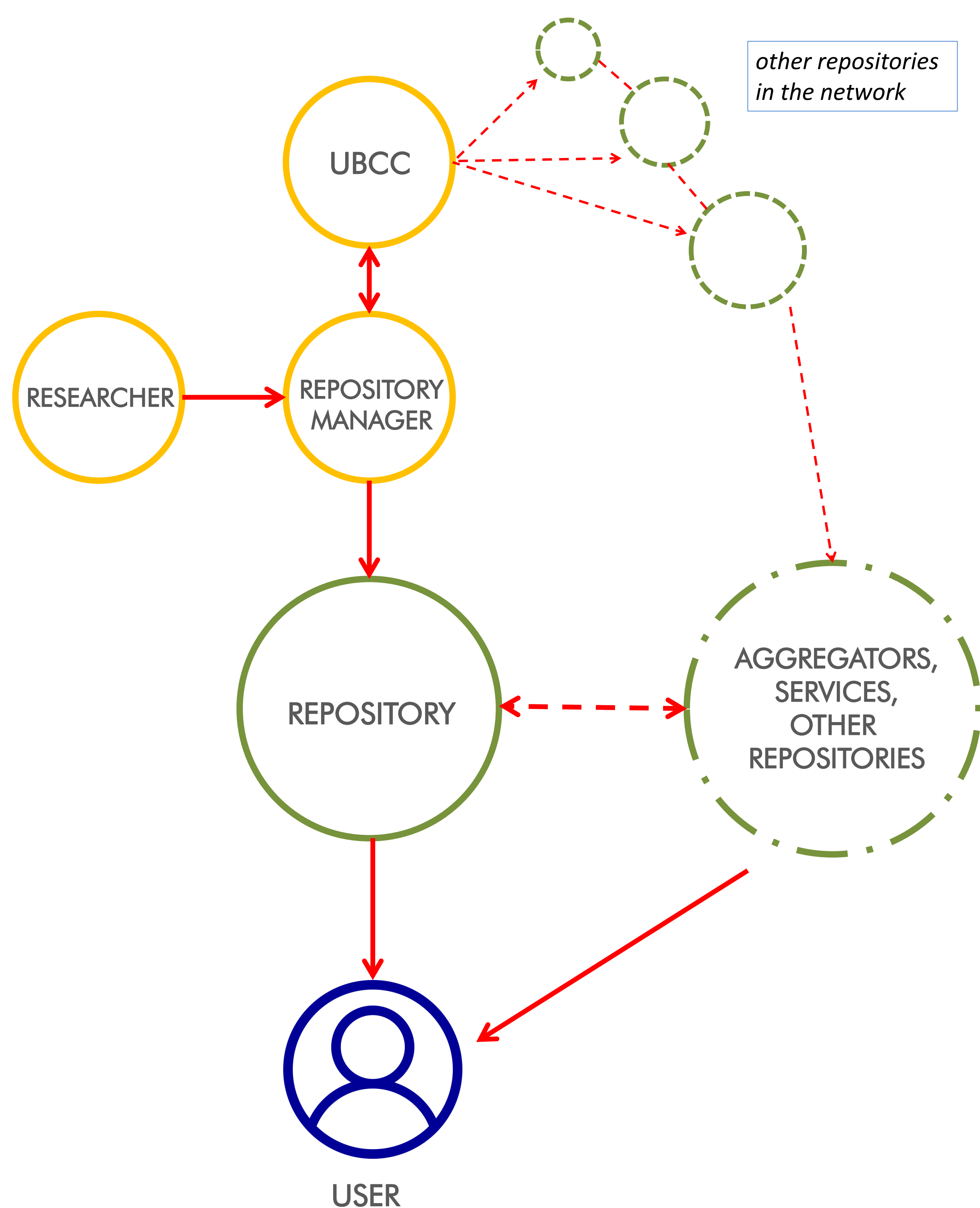


Background

The poster describes the model of partnership between research institutions that seek to mitigate underdeveloped repository network in Serbia. The main objective of this partnership is to develop a sustainable network of institutional repositories that will improve visibility of local research output and create interoperable environment for information exchange.

Currently, eight research organizations are involved in repository network, with the University of Belgrade Computer Center (UBCC) as the main coordinator and infrastructure developer. This model provides ready-to-use structure, standardized procedures and coordination for every future partner organization.

Model schema



Schema explained

The schema above represents the model for a sustainable repository network in Serbia with all organizations and services involved. The whole model is based on these principles:

- compliance with Open Science principles: infrastructure based on non-proprietary and open source platform (DSpace), adapted for open access and version control.
- sustainability: structure is tested and optimized.
- flexibility: good communication and coordination improves workflow, with faster error reporting and implementation of new tools.
- interoperability: repositories are capable for machine-to-machine communication through OAI-PMH protocol.

Roles

- University of Belgrade Computer Center (UBCC) – development, maintenance and improvement of infrastructure, training for new users
- Repository managers - responsible for daily operations of the repository (create new content; monitor, edit and provide content and metadata quality check; communicate with UBCC on improvements).
- Researcher – upload new content in repository together with right metadata (content can be visible only after approval by repository manager).
- Aggregators, services and other repositories – harvest metadata through OAI-PMH protocol, better research output visibility.

Reference

Rajović, Vasilije, Kosanović, Biljana, & Ševkušić, Milica. (2018). DSpace – institutional repositories – dissemination of research results: A local case study (Version paper) (p. 10). Belgrade, Serbia: University of Belgrade - School of Electrical Engineering and Academic Mind. <http://doi.org/10.5281/zenodo.1411159>. Open Science Platform, 2018. <https://bit.ly/2K6U2fE>

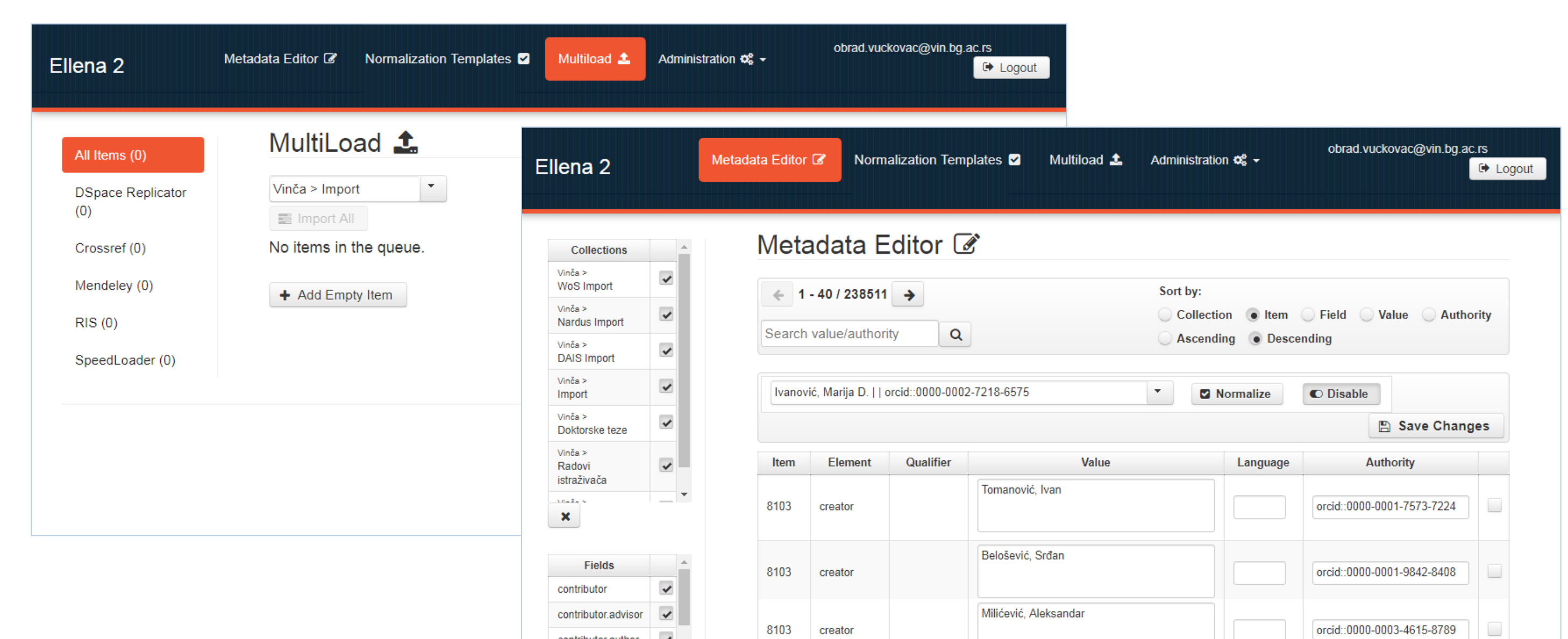
Research organizations & repositories

Research organization	Repository name	URL
Institute for Biological Research "Siniša Stanković", University of Belgrade	RADaR	ibiss-r.rcub.bg.ac.rs
Serbian Academy of Sciences and Arts	DAIS	dais.sanu.ac.rs
Vinča Institute of Nuclear Sciences, University of Belgrade	VinaR	vinar.vin.bg.ac.rs
Faculty of Chemistry, University of Belgrade	CHERRY	cherry.chem.bg.ac.rs
Institute of Architecture and Urban & Spatial Planning of Serbia	RAUmPlan	raumplan.iaus.ac.rs
Institute for Animal Husbandry	RISTocar	r.istocar.bg.ac.rs
Institute for Philosophy and Social Theory, University of Belgrade	RIFDT	rifdt.instiftdt.bg.ac.rs
Institute of Chemistry, Technology and Metallurgy, University of Belgrade	CER	cer.ihm.bg.ac.rs

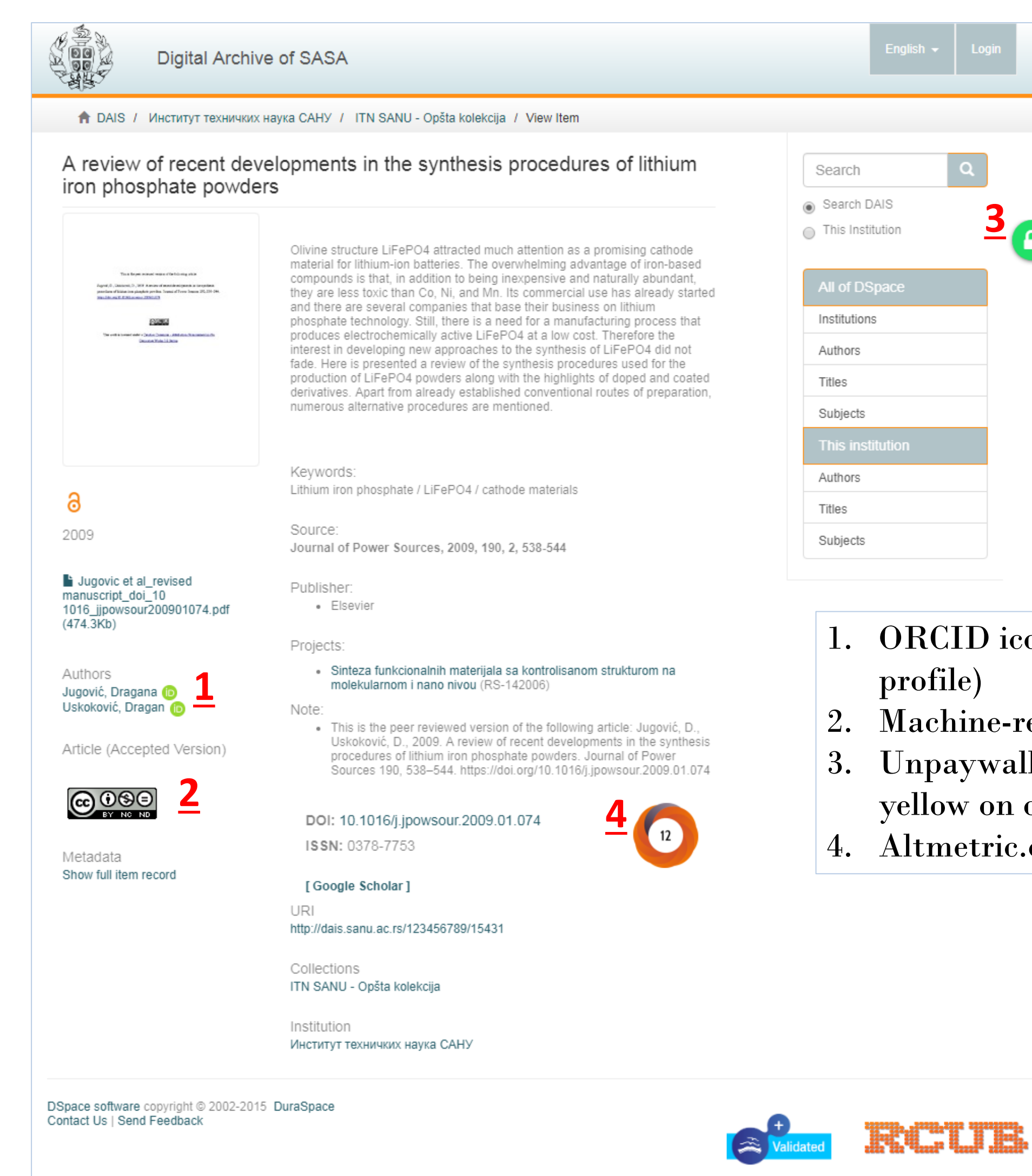
Customizations

The UBCC IT team is providing support on improving repository workflow by developing customized tools (Ellena 2) and integrating widgets (Altmetric.com, ORCID icon).

- Ellena 2 – a tool for repository managers: enables massive content upload from Mendeley, Crossref or other DSpace repository, and facilitates metadata editing and normalization control.



- Widgets – ORCID icon and Altmetric.com visualization.



1. ORCID icons (link to author's ORCID profile)
2. Machine-readable license code
3. Unpaywall add-on – turns green or yellow on open access article
4. Altmetric.com widget

Conclusions

The needs of various types of users are addressed:

- readers – user-friendly interface, high-quality metadata, visibility in aggregators and services;
- researchers – customized interface for content input, in-house developed tools, Altmetric info, training;
- repository managers – customized tools for content input and organization, initial training;
- harvesters and aggregators – consistent implementation of standards to ensure machine-to-machine communication.

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