

DSpace-CRIS, anticipating innovation

Andrea Bollini, 0000-0002-9029-1854, andrea.bollini@4science.com; Emanuele Ballarini, emanuele.ballarini@4science.com; Irene Buso, irene.buso@4science.com; Mykhaylo Boychuk, mykhaylo.boychuk@4science.com; Claudio Cortese, 0000-0003-4572-9711, claudio.cortese@4science.com; Giuseppe Digilio, 0000-0003-0358-4753, giuseppe.digilio@4science.com; Riccardo Fazio, 0000-0002-8090-2850, riccardo.fazio@4science.com; Damiano Fiorenza, damiano.fiorenza@4science.com; Luca Giamminonni, 0000-0002-5477-7144, luca.giamminonni@4science.com; Corrado Lombardi, 0000-0001-9999-4364, corrado.lombardi@4science.com; Stefano Maffei, stefano.maffei@4science.com; Davide Negretti, davide.negretti@4science.com; Sara Orlandi, sara.orlandi@4science.com; Luigi Andrea Pascarelli, 0000-0002-7024-0320, luigiandrea.pascarelli@4science.com; Matteo Perelli, 0000-0002-1635-6437, matteo.perelli@4science.com; Immacolata Scancarello, immacolata.scancarello@4science.com; Francesco Pio Scognamiglio, francescopio.scognamiglio@4science.com; Susanna Mornati, 0000-0001-9931-3637, susanna.mornati@4science.com

Affiliation: 4Science Srl, Italy

Abstract

DSpace-CRIS is the first open source CRIS/RIMS platform in the world. In 2022 the project will reach its 10th anniversary since the first open-source release of the version 1.8.2 alfa took place in November 2012.

Technically it is a fork of the DSpace platform, but the two communities have always walked together with the aim of bringing all the general purposes features of DSpace-CRIS to the main community. With version 7 and, especially, with the introduction of configurable entities in DSpace, the gap between these two "cousin" projects has been drastically reduced. However, thanks to the DSpace-CRIS community's increased experience in dealing with very complex use cases that have only recently found their way into "simple" DSpace, there are still many areas where DSpace-CRIS provides more advanced and still unique functionalities.

The presentation will summarize unique features and characteristics of DSpace-CRIS over DSpace in 7 minutes.

Keywords

DSpace, DSpace-CRIS, CRIS, RIMS, self-management, metrics, SEO

Audience

Repository managers, librarians, researchers

Proposal (no longer than a page)

A constant update on the status of the platform has been presented to Open Repositories since the beginning of the DSpace-CRIS project, which started as a customisation for the University of Hong Kong [1, 2], through its first release as an opensource project [3, 4], growing with annual updates [5] until the first release of the new DSpace-CRIS 7 version that adopted the new REST architecture, announced at OR2021 [6].

This year we would like to summarize the unique features and characteristics of DSpace-CRIS over DSpace with the 24x7 format to facilitate the ongoing process of backporting features and approaches from DSpace-

CRIS to the main DSpace codebase, that is accelerating since the release of version 7, as noted in the release notes [7, 8, 9].

Among the unique features that will be showcased are:

- A new configurable layout allowing complex and accurate organization of the item detail page without coding;
- Human readable and customizable URL for each item to improve search engine indexing (SEO);
- Better support for structured and complex metadata;
- Granular security up to the single value of a single metadata of an item;
- Advanced validation in the submission and bulk operation;
- Self-management of deposited items via friendly UI not prone to error;
- Support for traditional (citation, h-index, impact factor) and alternative metrics (altmetrics, plumx, dimensions);
- Advanced export capabilities including creation of well formatted CV in PDF, RTF;
- Advanced usage statistics with graphical visualization, easy extensible reports;
- Administrative statistics about Workflow and login events;
- Content update and statistics subscriptions;

The above list only mentions and highlights features that have been introduced (or significantly improved) in the last 12 months, i.e. since the presentation held at OR2021 of the first release of DSpace-CRIS based on the new REST architecture.

Other OR2022 submissions will focus on DSpace-CRIS features that have been ported to the main DSpace in its versions 7.1 [7] and 7.2 [8] or selected for inclusion in version 7.3 [9]: this submission ensures no overlap with those.

The last decade shows us that DSpace-CRIS has managed to anticipate the needs of the DSpace community by years, contributing significantly to innovating the platform.

References, if applicable

- [1] Bollini, A; Lam, Allen; Mornati, S; Palmer, DT. Authority framework in 1.6 and CILEA's customization for The University of Hong Kong, Open Repositories 2010, Madris, Spain
<http://hub.hku.hk/handle/10722/61139>
- [2] DT Palmer, A Bollini, E Liu, CY Lo, S Mornati, F Poon, LA Pascarelli. Collaborative reputation management in the HKU IR based upon DSpace, Open Repositories 2011, Austin, Texas (6-11 June 2011)
<http://hub.hku.hk/handle/10722/133863>
- [3] DT Palmer, CY Lo, E. Liu. Beyond bibliographic metadata, augmenting the HKU IR, Open Repositories 2012, <http://hub.hku.hk/handle/10722/152525>
- [4] Moving DSpace to a fully featured CRIS System (Poster), Open Repositories 2012,
<https://wiki.lyrasis.org/download/attachments/74515479/dspace-cris-poster.pdf>
- [5] List of DSpace-CRIS project presentations including contributions to the Open Repository Series
<https://wiki.lyrasis.org/display/DSPACECRIS/Project+documentation>
- [6] A Bollini, M Boychuk, P Cavallo, C Cortese, G Digilio, R Fazio, D Fiorenza, L Giamminonni, C Lombardi, A Martelli, LA Pascarelli, M Perelli, FP Scognamiglio, S Mornati. (2021, June). DSpace-CRIS 7 is here!. Open Repository 2021, Zenodo. <http://doi.org/10.5281/zenodo.4923701>
- [7] DSpace 7.1 release notes <https://wiki.lyrasis.org/display/DSDOC7x/Release+Notes#ReleaseNotes-7.1ReleaseNotes>

[8] DSpace 7.2 release notes <https://wiki.lyrasis.org/display/DSDOC7x/Release+Notes#ReleaseNotes-7.2ReleaseNotes>

[9] DSpace 7.3 development board (visited on 4th March 2021) <https://github.com/orgs/DSpace/projects/16>