

# The case for interoperability

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COAR is an international association that brings together individual repositories and repository networks in order to build capacity, align policies and practices, and act as a global voice for the repository community.

- Over 150 members and partners
- All 5 continents



# Why interoperability?

To develop services on top of the distributed repository network, repositories need to adopt a set of common technologies, protocols and behaviours.

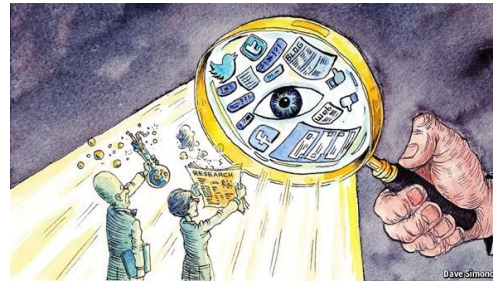



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# What value added services?






*Search Engine Optimization*



**OpenAIRE**   
**USAGE**  
**STATISTICS HUB**

Standard alignment across heterogeneous data providers for gathering usage data & sharing statistics.  
Taking care of data privacy policies in EU and member states.  
Collect, measure and analysis of usage data (downloads and views).  
Correlate with altmetrics.  
Correlate with citation metrics.

**SUPPORTING RESEARCH ANALYTICS**

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# How to be interoperable?

Metadata: Adopt metadata guidelines (e.g. [LIBSENSE Africa](#), [OpenAIRE](#), [RIOXX](#), [Datacite](#) - for data repos)

Vocabularies: Use controlled vocabularies: e.g COAR resource type, access rights, and version type

COAR Next Generation Repositories [Recommendations](#): 19 protocols and technologies for repositories to develop new functionalities

## About the Technologies

This section presents a snapshot of the current status of technology, standards and protocols available to support each behaviour.

The Next Generation Repositories Working Group has explicitly focused on the generic technologies required by all repositories to support the adoption of common behaviours. However, we also recognize that there are other technologies and standards that may be useful for certain content types or disciplinary communities.

In some cases, the technologies required to support a specific behaviour are not yet sufficiently mature, or it is not yet clear what technology will prevail. In other cases, where there are not currently no appropriate technologies to support the specific behaviour. In these cases, the Working Group was not able to recommend specific technologies, however we will continue to monitor developments and make recommendations as new or better technologies become available.

## List of technologies

- [Activity Streams 2.0](#)
- [COUNTER](#)
- [Creative Commons Licenses](#)
- [ETag](#)
- [HTTP Signatures](#)
- [IPFS](#)
- [International Image Interoperability Framework](#)
- [Linked Data Notifications](#)
- [ORCID](#)
- [OpenID Connect](#)
- [ResourceSync](#)
- [SUSHI](#)
- [SWORD](#)
- [Signposting](#)
- [Sitemaps](#)
- [Social Network Identities](#)
- [Web Annotation Model and Protocol](#)
- [WebID](#)
- [WebID/TLS](#)
- [WebSub](#)
- [Webmention](#)

# Communities are the “social” glue for interoperability!

**Local** - meeting in person with local colleagues to share challenges and solutions

**National** - defining a shared agenda for repositories in the country to drive adoption of common practices

**Platform** - supporting technical expertise and software developments

**International** - promoting common “behaviours” across all repositories to support value added services

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Thanks  
And happy OA week!

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