

Report from the LIBSENSE Repository Workshop



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On November 19 & 20, 2018, a repository workshop was held in Zanzibar City, Tanzania. The workshop was jointly organized by West and Central African Research and Education Network ([WACREN](#)), [EIFL](#) and the Confederation of Open Access Repositories ([COAR](#)) in conjunction with the [UbuntuNet Alliance](#) Conference as part of the LIBSENSE Initiative. The aim of the meeting was to start building a community of practice for repositories on the African continent and to define a collaborative agenda for libraries and research and education networks (RENs) in Africa related repositories and value-added services.

This is the first in a series of meetings to develop a more cohesive strategy for strengthening and building repository networks in Africa. The two-day workshop convened library and national and regional RENs from African countries to explore how institutional and national repositories can better engage with NREN services in order to break down institutional silos, add value to repositories, and support the growth of open science in the region. A second meeting of the West and Central African community will be held in Accra, Ghana on March 11&12, 2019 in conjunction with the WACREN conference. This will be followed in Alexandria, Egypt on April 27-29, 2019 with a third meeting targeted at the North African community of the Arab States Research and Education Network ([ASREN](#))

Repositories are the foundation of open science as they manage and provide access to research outputs such as articles, data, theses and dissertations, and other valuable research products. Together, our organizations are promoting a system for open science that is community-based and recognizes the distinct conditions and priorities for research in different

disciplines, countries and regions. To that end, we recognize the importance of developing local and regional services that are interoperable internationally, but are also able to support these diverse needs.

The meeting was attended by representatives from 17 countries in Africa. Participants shared information about repository activities in their various countries, discussed how different institutions are addressing the challenges involved in repository management and support the increased visibility of open access content in Africa. It was widely agreed that the adoption and implementation of institutional open access policies can greatly help with populating the repository, yet even with policies there is a need for new incentives for researchers to contribute their content and ideally, repository services would be much more embedded into researcher workflows.

The preliminary results of the pan-African LIBSENSE survey were presented at the workshop. The survey looked at the existing skills and expertise for librarians in the areas of open access, open science and repositories in East and Southern Africa. Lack of technical expertise, low levels of staffing, and uneven organizational commitment to repository services were identified as areas of particular concern for survey respondents. Further iterations of the survey in the WACREN and ASREN regions will precede the scheduled meetings to ensure there is a comprehensive understanding of the challenges for librarians in each African NREN region.

Participants discussed the trend of open science, and what kind of impact it might have on over a decade of efforts in Africa to promote open access to journal articles and other text-based content. It was felt that it is important to ensure that activities to provide open access to publications and grey literature are not weakened by the more recent and highly visible trend towards open science. On the other hand, the repository community should also leverage the interest in open science and use the momentum to expand the institutional role in supporting management and providing access to research data.

Interoperability is critical so that resources across repositories are not siloed and workshop participants reviewed the major areas of interoperability, which include common metadata elements, vocabularies and the use of persistent identifiers. The more widespread adoption of interoperability requirements will allow the development of other value-added services such as disciplinary, funder and institutional dashboards that allow viewing of content related to a specific research area, university, of research funder.

Increasing the visibility of indigenous knowledge is also a major concern. Although research is increasingly global, local research priorities are extremely important. The current system which incentivizes researchers to publish in international journals does not support these local concerns well, but rather favours research that is of interest in Western Europe and North America regions. In addition, making both content and technologies available in African languages will ensure that the African public can engage and use repository interfaces and benefit from the results of research of value to them.

Research and education networks in Africa provide connectivity for university communities and are also building so-called 'above-the-net' services such as secure network access and identity federation services (e.g. eduroam and eduGAIN). In Africa, the research and education networks are interested in playing a role to support open science and add value to African repositories. The [Next Generation Repositories](#) vision and several examples of regional networks elsewhere helped to seed the discussion about the role of network services for RENS in Africa. Presentations were given about OpenAIRE in Europe, JAIRO, the Japanese repository cloud service, and LA Referencia, the Latin American network that harvests from 9 national nodes. Current network services include hosting repositories in the cloud, aggregation and discovery, monitoring policy compliance, and research analytics. The next generation repository vision proposes expanding and enhancing existing services to include social networking, peer review, common usage statistics and preservation functionalities.

With these contexts in mind, workshop participants identified a number of areas in which libraries and RENS can collaborate to improve and strengthen repositories in the region. Of critical importance for any effective collaboration is that the two communities (libraries and RENS) 'speak the same language'. It was acknowledged that we must have more dialogue in order to develop a common understanding of the goals and activities.

The collaborative activities suggested fell into four categories:

1. Advocacy
 - Work together to raise awareness with university administrators and governments about open science and the potential benefits.
 - Promote the role of repositories in supporting open access and open science
2. Technical support
 - Develop collaborative long-term storage and preservation solutions for content in repositories
 - Define a role for RENS in hosting repositories
 - Help improve repository workflows and automation
3. Capacity building
 - Work together on training activities for repository managers
 - Define and disseminate standards and best practices for repositories
 - Collaborate to improve technical support for managing repositories at the institutions
4. Value-added services
 - Develop solutions for networking repositories across Africa
 - Establish a role for RENS in harvesting metadata and developing value-added services

Next Steps

In order to start to launch the collaborative activities identified, participants agreed on the following next steps:

December 2018

1. Set up a mailing list to facilitate communication with the group - WACREN
2. Develop the terms of reference for library-REN collaboration in Africa - subgroup The terms of reference will include:
 - a. Recommendations about formalizing the relationship between libraries and research and education networks
 - b. Define the most appropriate mechanisms for engaging with the international community (e.g. through COAR)

January 2019

3. Prepare data exchange model agreements, including recommendations for metadata guidelines in Africa - subgroup

February 2019

4. Organize a webinar of participants to move forward specific topics identified in the terms of reference - subgroup
5. Organize a webinar with NRENS - WACREN

March 2019

1. Host the second LIBSENSE Repository workshop for NREN-library collaboration in West Africa - WACREN

The full program and presentations from the workshop are available on the [website](#).

If you are interested in participating in these activities, please get in touch with the LIBSENSE program managers: libsense@ren.africa