



THE ZIMBABWEAN INSTITUTIONAL REPOSITORIES

Facilitators and barriers to implementation

Esther Nyambi, 2011

It has been argued that the establishment of Institutional Repositories in academic and research institutions in Africa is a serious developmental issue that requires urgent attention (Christian, 2008). Furthermore, the Directory to the Open Access Repositories (2010) states that, while South Africa boasts of 24 institutional repositories their neighbour Zimbabwe has only one. This great discrepancy has prompted research into how issues such as the political and economic situation of a nation can impact greatly on the setting up of its Institutional Repositories. This paper reports research addressing some of the particular challenges that universities in Zimbabwe are facing in establishing Institutional Repositories (IRs).

RESEARCH AND PUBLISHING IN ZIMBABWE

Zimbabwe has been ranked as the country with the highest literacy rate in Africa – currently 92%, up from 85% – and has overtaken Tunisia at the top (Share, 2010). Zimbabwe now has a total of 13 universities and several vocational training institutions.

Zimbabwe's publishing industry is, however, very small and localised. In addition, research and research facilities in Zimbabwe are among the poorest in Africa and it is likely to take time to build a culture of reading, writing and research (Maunde, 2003). Moreover, Kapungu (2007) has argued that, with 0.6% of the population of Zimbabwe estimated to migrate abroad every year, the harsh economic environment is crowding out ambitions of career development, nation building and entrepreneurship development, and cultivating a thirst to make quick money. The University World News (2010) has also reported that Zimbabwean universities countrywide are suffering a severe shortage of academic and non-academic staff as a result of the brain drain.

A BRIEF OUTLINE OF INSTITUTIONAL REPOSITORIES

Owing to time and budget constraints associated with the research reported here, a sample consisting of seven of the total 13 universities in Zimbabwe participated. These are as follows: University of Zimbabwe, National University of Science and Technology, Africa University, Solusi University, Midlands State University, Zimbabwe Open University and Midlands State University.

Of the participating universities, all (except for the National University of Science and Technology [NUST]) had repositories in their infant stage, having been set up within the last two years. The Institutional Repository (IR) at the University of Zimbabwe has been in existence since 2005 and has been presented as a replication model or example of best practice, serving as a demonstration for other Zimbabwean state university repositories.

In the participating universities all the repositories include journal articles, published conference papers, universities' projects and dissertations digital collections and past examination papers. Full text of these publications is freely accessible on local university intranets. However, the University of Zimbabwe (UZ) goes a little further and provides e-books,

book chapters, working papers, research reports and seminar papers. The repository is available on the Directory of Open Access Repositories (OpenDOAR) and anyone with access to the internet can access the repository.

BARRIERS TO THE SETTING UP OF IRs

The research identified the many and varied barriers to the setting up of IRs being experienced by the participating universities. These are summarised below.

Technological problems

The high cost of internet bandwidth in Zimbabwe makes it difficult for universities to afford adequate bandwidth to host digital repositories.

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Political situation

The political climate is an important factor that has hampered library development as well as affecting the setting up and growth of repositories.

Sanctions

Although donors have offered to assist institutions in Zimbabwe, the interviews revealed how sanctions imposed on Zimbabwe have hampered these efforts.

Brain drain

As a result of the economic and political situation, retention of library personnel in the system has been difficult, resulting in the country experiencing severe brain drain. As a result, thousands of professionals are leaving the country for better paying jobs in neighbouring countries and further abroad. This has also affected the growth of repositories in Zimbabwe, as those that had initially been trained have since left those institutions.

Communication

Effective communication has been hampered by power outages that Zimbabwe is currently facing. The study also revealed that

there is limited repository marketing initiatives in universities. In some institutions the staff did not seem aware of the benefits of depositing their work into an IR, hence the low number of submitted papers on the repositories.

Government and institutional support

Garnering support from both the government and institutions is a major challenge. Government allocate a very low or non-existent priority to libraries, leaving donors to fill this gap. As a result most librarians cited lack of finance and hardware as a major factor in their quest to join the Open Access movement.

Other librarians cited inadequate support from the university administration as they were either waiting for approval from the university senate or were not being allocated any funds for the repository project.

ENABLERS TO SETTING UP OF THE REPOSITORIES

Perhaps more positively, the research also identified enablers for IRs, which are summarised below.

Sensitisation

Organisations such as INASP have been running a number of IR workshops, (e.g. sensitisation workshops) which investigate how Senior Management can be encouraged to buy into the idea of having an IR and how the academic staff can get involved so that the repositories become populated.

Training

The research revealed that it is important that staff have the skills, knowledge and abilities required for the development and management of a successful institutional repository. As a result, INASP offers bandwidth optimisation workshops.

The Zimbabwe Universities Librarians Consortium (ZULC) also conducts workshops on the setting up of institutional repositories.

Publishing support

The AuthorAid project at INASP (www.authoraid.info) offers support to early career researchers in publishing and communicating their research. Researchers from developing countries are also offered mentoring, networking, resources and training such as writing workshops.

INASP also helps to improve the visibility and accessibility of developing country journals through the Journals Online (JOLs) projects (www.inasp.info/jols). The JOLs project began with Africa Journals Online (AJOL) – which is now independently operated as an African non-profit organisation – and have grown to include platforms for Bangladesh, Latin America, Mongolia, Nepal, The Philippines, Sri Lanka and Vietnam. Through the JOLs there are over 600 journals from developing countries available, with over 85% full text. The JOLs encourage national and international submission, providing an effective place for Zimbabwean researchers to publish.

Partnerships

The Zimbabwe University Librarians Consortium (ZULC) has been working with INASP in assisting university libraries to set up IRs through training workshops.

Zimbabwe partnerships

The ZULC provides resource sharing amongst members. In

addition, consortium members also have come to realise that international organisations and donors are much more willing to consider support of a joint project among academic libraries in Zimbabwe, as opposed to supporting individual projects that benefit only one institution.

Support networks

The Southern Africa Greenstone Support Network (SAGSN) provides the free and open source software (FOSS) Greenstone digital library software suite. Zimbabwean librarians were among those from the 10 countries which received training in 2007-2008 from the eIFL.net Greenstone pilot project.

The Seventh Day Adventist (SDA) university libraries are encouraged to be members of the SDA consortium for effective resource sharing and they encourage all institutions to establish IRs.

INASP partners

INASP works with several other organisations such as the FAO, the International Foundation for Science and with the Training and Tropical Diseases section (TDI) of the World Health Organisation (WHO). Researchers from their networks and grantees are often invited to their series of workshops.

As mentioned above, INASP also helps to encourage the creation and publication of online journals through the JOLs projects.

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Marketing initiatives

Through case studies, leaflets, posters and training materials, INASP reaches a variety of audiences and stakeholders. The AuthorAID project also provides online training resources and guidelines along with CDS of resources when requested.

Some librarians have been distributing pamphlets, posters and bookmarks with information about open access and others are promoting their repositories through library information literacy programmes, public relations and exhibitions.

SLOW TAKE-UP OF INSTITUTIONAL REPOSITORIES IN ZIMBABWE

Experts interviewed on why there seemed to be a slow take-up of IRs in Zimbabwean institutions of higher learning gave a number of reasons, for example:

- Funding
- Brain drain
- Political situation in the country
- Lack of IR policies in some institutions
- Inadequate and very old hardware
- Power outages

CONCLUSIONS

This research indicates that the current state of repositories in Zimbabwe has largely been influenced by the political and economic situation in the country. As a result of limited funding, universities in Zimbabwe find themselves financially constrained in the provision of free access to global stores of information. This might explain the slow take-up of IRs in Zimbabwean institutions of higher learning, which has resulted in the University of Zimbabwe repository being the only repository listed in the OpenDOAR. This sadly might give an impression that there is only one institutional repository in Zimbabwe, yet research has revealed that other universities also have repositories, although they are only available on the university intranets.

In addition, the research reveals that most universities are faced with inadequate computer hardware. Moreover, the bandwidth is not always available for researchers and so scholars are missing out on the immeasurable amount of information that the Web provides.

This research also concludes that universities in Zimbabwe are generally facing similar problems to each other as a result of the low priority which is given to their development. This can be seen in the inadequate funding, poor infrastructure, lack of hardware and other ICT facilities, power-cuts and brain drain. The shortage of academic and non-academic staff as a result of the brain drain has reduced the amount of research and publications in Zimbabwe. As a result, the challenges that were identified have inhibited the growth of IRs in Zimbabwe.

Partnerships are an important tool that could be used to further develop IRs in Zimbabwe either through training, finances or publishing support. Partnerships between ZULC and INASP, universities, SAGSN and the Adventist university consortium have been instrumental in the development of repositories.

This research also indicates that, with support, Zimbabweans can develop their research and publishing skills. For example, the AuthorAid mentoring project to be held in Zimbabwe later this year will offer mentoring and support to new researchers.

Finally, it can be concluded that there is a need for technical assistance and development cooperation in the development of IRs in Zimbabwe. Most universities are in desperate need of assistance in the form of either equipment or funds, all of which are instrumental in the development of repositories in the country. The problem of staff retention has also been identified as having contributed to the slow development of the repositories in Zimbabwe.

REGISTER YOUR REPOSITORY

An Institutional Repository is an online locus for collecting, preserving, and disseminating, in digital form, the intellectual output of an institution. To maximise the visibility, we recommend registering your repository. There are several places where you can do this listed below.

Registry of Open Access Repositories (ROAR)

The aim of ROAR is to promote the development of open access by providing timely information about the growth and status of repositories throughout the world. Open access to research maximises research access and thereby also research impact, making research more productive and efficient.

<http://roar.eprints.org/>

Open Directory of Open Access Repositories (OpenDOAR)

OpenDOAR is an authoritative directory of academic open access repositories. Each OpenDOAR repository has been visited by project staff to check the information that is recorded here. This in-depth approach does not rely on automated analysis and gives a quality-controlled list of repositories.

<http://www.opendoar.org/>

Who's Using DSpace

'Who's Using DSpace' is the most popular page on the DSpace website. The goal is to keep a comprehensive list of repository information to help facilitate connections between users and to foster collaborations in the future.

<http://www.dspace.org/whos-using-dspace.html>

LIST OF INSTITUTIONAL REPOSITORIES

This page contains resources which allow for cross-searching of collections of Institutional Repositories. If you know you require information from a specific institution, please consult them directly.

<http://www.inasp.info/list-of-institutional-repositories>

About the Author

This case study is based on Esther Nyambi's 2010 dissertation *An investigation of the Zimbabwean institutional repositories: Facilitators and barriers to implementation* submitted for her MSc at the Department of Information Science, Loughborough University, Loughborough, UK.

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