

Creating a Virtual Library for Distance Learners in Nigeria

Ukoha O. Igwe

University Librarian, National Open University of Nigeria
14/16 Ahmadu Bello Way, Victoria Island, Lagos, Nigeria.
ukohaigwe@yahoo.co.uk

Edeama O. Onwuchekwa

Librarian 1, National Open University of Nigeria
14/16 Ahmadu Bello Way, Victoria Island, Lagos, Nigeria.
edemau@yahoo.co.uk



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Abstract:

Information and communications technology revolution continues to propel dramatic transformations in all aspects of our society. This revolution and transformation is changing the face of libraries, their functions and services. These innovations are propelling the library into an environment of electronic services established on computer servers or a network of cooperating servers. Technology is giving great impetus to libraries and helping them redesign, redirect and remodel their functions and services. Libraries that have applied information technology in their services have experienced dramatic transformations. This paper discusses the emerging trends in library and information services which is the bedrock to the development of virtual libraries. The trend of virtual libraries as an excellent alternative to the provision of access to library resources to distance learners is examined. It also examines the components, requirements and challenges of a virtual library service in Nigeria and recommends a suitable model of virtual library to libraries serving distance learners in Nigeria.

Keywords: virtual libraries, distance learning/learners, ICT.

Introduction

Libraries of all types are making huge investments in information and communications technology (ICT). These investments lead to the deployment of modern tools that are made possible through ICT as Brindley, Walti & Zawacki-Richter (2008:138) assert. These facilitate access to library and information resources to meet clientele needs. When ICT tools are effectively implemented in library and information services, the door of access to electronic and online library and information resources is widely opened. Ani (2013:15) agrees that the application of ICT in library and information services facilitates the provision of timely information in the universities which lead to maximal benefit and increased research productivity. Foster et al., (2008) and Frankor and Akussah (2012) similarly conclude that if staff and students in universities in developing countries, especially in Africa have access to relevant electronic information resources, it is likely to improve the quality of their research and promote increase in research productivity and publication.

Consequently, a number of libraries in Africa are harnessing resources to accommodate the application of ICT in their day to day library activities. This application of the information superhighway or information and communications technology (ICT) into the society has introduced remarkable changes and innovations in every dimension of social and economic activities, (Levin & Burke, (2003:2); George & Frank, (2008:141). Oguniola (2011) also notes that libraries worldwide have witnessed a great metamorphosis in recent years both in their collection development and in their service structure. Mulla (2006) observes that over the years, this significant transformation has been noticed in collection development policies and practices of libraries. Adebayo & Adekunjo (2013:1) also add that the this “dynamic process initiates fundamental changes in all aspects of our lives, including knowledge dissemination, social interaction, business practices, political engagement, media, education, health, leisure and entertainment. Adeniran (2014) sums it all that correct application of information and communication technology is drastically affecting all facets of the world system which includes the library institutions. These innovations are forming the bedrock for libraries’ transition to environments of electronic services which are built on computer networks. Makhanya (2013:4) affirms that libraries that have applied information technology in their services have experienced dramatic transformations.

Technology helps libraries to redesign, redirect and remodel their functions and services. This successful application of ICT also transforms libraries from “guardians of tradition” to “catalysts of vast changes” as Gumba, Mamvoto and Mufanawenjinga (2007:3) indicate and Gould and Gomez (2010: 167) also agree. It helps to remove the barriers that separate libraries from their users. The new technology has proved to be of great benefit to people in remote and isolated locations that lack direct access to information resources for research and learning. Ellis and Oldman (2005: 35), Thanuskodi, (2012) and Ani (2013: 7) all posit that electronic resources enhance access to the needed information and that access can be done remotely by staff and students from offices or homes without physical visit to the library.

Library Services in Open and Distance Learning

Open and distance learning (ODL) is gradually being accepted in Nigeria as a viable alternative to conventional university education. This is providing opportunities for millions who are not privileged to go to conventional universities. This growth of distance learning programmes has tremendous implications for library services.

The Association of College and Research Libraries (ACRL) developed the Guidelines for Distance Learning Library Services which state in part that “members of the distance learning community are entitled to library services and resources equivalent to those provided for students and faculty in traditional campus settings”. In other words, distance learners require the same library services like other students in the conventional environment. Library services are essential support services to distance education students.

Open and distance learning thrive on the deployment of appropriate technology and the supply of accurate, current and comprehensive information. The operation and growth of distance learning means that libraries must provide support to distant learners who mostly learn remotely and without access to campus library facilities. The virtual library is the most veritable platform to provide access to information resources for distant learners. Garten (2009:1) observes that “distance learning without access to electronic information resources and services may be impossible.”

According to Adeyinka (2008:7) virtual library services to remote users should be properly integrated. Rohland-Heinrich and Brian (2007:8) Secker and Gwyneth (2007: 39-41) and Wyss (2007: 749) support the notion that the virtual library is critical to users who learn remotely, therefore, a variety of virtual library tools and guides should be deployed for learners to take advantage of the virtual learning experience. In essence, the virtual library platform brings together e-resources and information services from different providers which makes it easy and quick for users to access.

The importance of quality library services for open and distance learning cannot therefore be over-emphasised as several authors have expounded. Monroe (1975:62), Kascus and Aguilar (1988:30), Cleyle (1992:109), and Watson (2000:4) and as quoted by Igwe (2015) all agree on the significance of quality library services in open and distance learning. Watson (2001:175) adds that distance education has a number of inherently unique characteristics which fundamentally and procedurally impact on the provision of library and information services for distance learning - regardless of the level of programme of the learners. Some of the characteristics according to the author include:

1. Distance learners do not go to their institution of instruction; their education “goes to them”. They are often termed “invisible” students. Reaching distant learners with library services creates a new context of service to users who do not have the option of attending conventional universities. It opens up a canvas on which new methods of user-centred information services are developed most often leading to the evolution of the electronic, digital or virtual library.
2. Distance educators are sometimes themselves at a distance from the educational institution.
3. Traditional library services are building-bound. In distance librarianship, library and information services have to be “taken” to the members of the distance education community, leading to the “library without walls” or “virtual library” concept.
4. Distance librarianship requires that technology and other means of communication are deployed to overcome the “tyranny of distance.”

Obviously, methods of information service delivery in traditional educational setting and open and distance learning environments are not exactly the same. In the conventional tertiary institutions, students are most often confined to the campus and they physically visit

the library for a range of library and information services to facilitate their learning programmes. This is not the same case with open and distance learners. It is essential to plan, develop and implement strategies to ensure that quality library and information services are accessible to learners at a distance whether in offline or online mode.

Components of the virtual library

The concept of the virtual library connotes a range of activities from the simple to very complex application of information and communication technologies in library and information services. Therefore, developing a virtual library requires the integration of several components. Magnussen (2002:11), observes that a virtual library must also have clients who are linked to the “collections in an efficient and satisfying manner, a set of services which could be human or electronic, which connects clients to the collections, the technology which should support document creation, retrieval, transfer, dissemination, manipulation and management.” Various authors have different views of what constitutes the components of a virtual library. Murray (1999:175), Van (1999:301) agree that the components of the virtual library include among others:

- Electronic document delivery, authentication and security.
- Library automation (integration of the digital library with traditional library systems).
- integration of Web-based network services into the digital library;
- Digitisation and on-demand scanning.
- Electronic publishing.

The major components of a virtual library can be categorised into six major areas. This include:

- Collection infrastructure
- Digital knowledge organisation
- Access infrastructure: browse, search and navigation interfaces of digital library
- Network and computing infrastructure
- Intellectual property rights and digital rights management
- Digital library services.

Similarly, Schiller and Wahle (1992:3) and Schiller (1992) listed some of the essential elements of the virtual library. These include:

- The development of electronic document delivery services.
- The development of a local area network (LAN).
- The provision of a gateway from the OPAC to other databases or networks, such as the Internet.
- Provision of access to the Internet.
- Subscription to electronic journals.
- Digitisation of text easy storage, retrieval and dissemination.
- Information literacy for faculty and students in the use of internet. sources and end-user searching.

These categorisations of the components of a virtual library could be summarised into seven different elements: computers and computer networks; digitisation of materials; Access to Internet and e-resources; LAN/WAN; information literacy and electronic publications.

Virtual Library Services in Nigeria

According to Fabunmi (2009), for university libraries to cater effectively for the social, cultural and developmental needs of library users in Nigeria, virtual library has to be put in place. With virtual library, the quality of academic library collections will be bolstered up, staff and students will be able to access databases for teaching and research. Also, accessibility to recent publications will be enhanced. Obaseki (2012) posits in his article that it is the dream of many academic libraries to be part of this growing phenomenon of virtual library globally which offers remote access to wide range of information products that may be local, national or even international in coverage. Okebukola (2002) is of the view that virtual library would improve the quality of teaching and research in higher institutions through the provision of current e-books, journal and other library resources. This will enhance scholarship, research and lifelong learning through the establishment of permanent access to shared virtual archival collections; provide guidance to academic libraries on ways of applying appropriate technologies for the production of virtual library resources and to advance the use and usability of globally distributed networks of library resources. Ya'u (2003) asserts that the virtual library has an opportunity to address the paucity of teaching and research materials in the libraries of higher institutions in Nigeria as well as giving room for sharing of research outputs with the global community amongst the institutions and the local researchers. Virtual libraries have become the most urgent necessity in tertiary institutions in whole of the world and particularly in Nigeria. The National University Commission (NUC) along with National Commission for Colleges of Education (NCCE) are the two powerful bodies catering for the needs of tertiary institutions in the country.

The inability of the university libraries to provide much needed support services of providing very current information for learning and research has been of much concern to the Nigerian government (NLA Newsletter, 2002). The Federal Government of Nigeria through the National Universities Commission (NUC), introduced projects aimed at computerizing university services across the country. They initiated Management Information Systems (MIS) and started the Nigerian Universities Network (NUNET) project. NUNET was aimed at developing a viable local and wide area network in each institution. This was followed by the National Virtual (Digital) Library Project. NUC in conjunction with Virtual Library Consultants organized a series of training workshops to prepare the institutions and individuals for the successful deployment and management of digital libraries.

Unfortunately, six years after the national Virtual Library Project was initiated and despite all the achievements enumerated by NUC and the series of training workshops, none of the eleven university pilot centres for the first phase of this project has begun operation and the National Virtual Library, which is now funded by the Educational Trust Fund (ETF) is yet to be fully functional (Gbaje 2007).

Creating a Virtual Library in National Open University of Nigeria

Libraries in developing countries are slowly and reluctantly migrating to virtual libraries. The virtual world is gradually dominating the information profession and practices in a number of

libraries in developing economies. This is also receiving great attention in conferences, academic discourses and in the literature of library and information science..

In spite of the advances in information and communications technology, library service delivery is often still based on conventional practices especially in developing countries like Nigeria. This is asserted by Adewale (2003:35), Gbaje (2007:2), Fabunmi (2009:2), Nkanu and Okon (2010:2), Eke (2011:2) that many academic libraries in Nigeria share the same characteristics of still dwelling only on conventional patterns of library service of the 19th and 20th centuries. These libraries have little or nothing in terms of the application of new information technologies in their services. Although so much has been said and written on digital or virtual libraries in Nigeria, the position of libraries, particularly university libraries, has not changed significantly from conventional practices. Unfortunately, these conventional library practices cannot help distance learners who are geographically separated from their institutions.

Although the National Open University of Nigeria was resuscitated in 2002, academic activities only started in 2003. Students were admitted without adequate preparations for library and information services. In fact, significant plans for library services only began in 2007. Incidentally, the library began at the headquarters in Lagos with traditional library practice. This restricted the access to available library materials because only a very insignificant number of the students could access the resources and services. The planning for library services was constrained by several factors which include:

- i. Lack of qualified staff for open and distance learning and digital library environments.
- ii. Poor information and communications technology infrastructure is another major constraint. The young university had very poor ICT facilities both in the headquarters and at the centres. One of the cardinal points of the Abuja Declaration of the 2001-10 Decade of Distance Education was the development of ICT-driven distance education delivery system. This was not to become a reality in the operations of the re-established National Open University of Nigeria. Consequently, the operations of academic activities particularly library services were greatly retarded and retrogressive.
- iii. Closely related to this is the lingering problem of electricity supply in Nigeria. Technology cannot operate without adequate power supply. This has remained a knotty issue in the entire economy of Nigeria. Ministries and agencies have to strive for alternative sources of power supply – relying on the costly venture of running generators. This also means that funds are vigorously competed for in providing essential services.
- iv. There is also the problem of poor Internet facilities and high cost of bandwidth.
- v. Administrative miscalculation was another major issue that affected every department including the library. The university started with over one hundred programmes without course materials, no library services and with a handful of academic staff. There was poor consultation and coordination with the supervisory agency for tertiary education in Nigeria.
- vi. Inadequate funding prevented the library and information services from making any progress. In view of this, the planning, organization and implementation of library services centred significantly on the traditional library operation that has not been functional and beneficial.

Challenges

Creating a functional virtual library is a formidable task for libraries and librarians. This will affect the mission of the library, budget and funding of library services and the development of new operational strategies. Some of the visible challenges in creating a formidable virtual library in academic libraries like the National Open University of Nigeria are:

- **Digital divide**

Digital technologies are still far from being “simple” and “easy to use” for many people especially in developing countries. The use of computers still evokes fear in so many people. The level of computer literacy skills is still low. Significant traces of cyberphobia or technophobia still exist in rural and urban areas in Nigeria and some other African countries. . Acquiring the motivation to use a computer and to achieve an Internet connection is the first step to accessing digital technologies. Dijk (2008) notes that many of those who remain at the ‘wrong’ side of the digital divide have motivational problems. It appears that there are not only ‘have-nots’, but also ‘want-nots’. The idea of a virtual library implies that the clients must be literate in the use of information and communications technology.

- **High costs of broadband Internet**

The success of the virtual library depends to a very large extent on the availability of a good broadband internet access. The cost of broadband Internet access is still not easily affordable in Nigeria. According to Awosanya (2013:1) this prevailing high cost of broadband Internet access is result of the “unwelcoming attitude of the government at all levels” and the telecom operators building network infrastructure individually.

- **Poverty and poor telecommunication facilities**

Developing telecommunications facilities in the face of low standard of living, poor health facilities, hunger, dilapidated educational facilities and social and political instability remains a major challenge for several countries. Institutions and organizations must grapple with these challenges in developing and implementing virtual libraries. Mestri, Praveenkumar and Paramesthwar (2008: 472) agree that “for the development of virtual libraries, there is need to develop the standard of living” and improve telecommunications facilities for the people.

Recommended Model of Virtual library- The NOUN Solution

The industrialized world is creating virtual libraries because of the high value placed on the availability of information while the socio technical condition to sustain virtual libraries do not exist in most African countries in general and Nigeria in particular. The virtual library offers great promise as a way to develop a Nigerian information resource base. The infrastructure needed for the virtual library may not fully in place, but one of the steps that the National Open University Library has put in place in creating its virtual Library are listed below:

- Encourage Mobile learning: through the deployment of mobile technology in the making available its library resources especially the Noun course material.
- Plans in process to create and develop the National Open University of Nigeria Institutional repository
- Newly created virtual Library in HQ with the implementation of Sierra in process

- Education Trust Fund: Noun is a recipient of technological equipment for the Education Trust fund and this cushions the budgetary effect in sustaining the virtual Library.
- Bridging the digital divide- Training of Staff and continuous advocacy before the University Management.
- An ongoing project of the implementation of Information literacy online tutorial etc.

Conclusion

Change and development have become characteristics of life and society. Technology, particularly information and communications technology have propelled major transformations in education. Distance learning is a veritable solution to the problem of access to higher education and effective access to learning resources through the virtual library platform is indispensable. There is a need for the new vision and the new roles of librarians within the changing distance education environment. Kascus states that librarians have very important roles to play to support distance learners have access to the resources required by the curriculum and Holowachuk adds that having access to adequate library resources is key to the success of distance learners. Libraries serving distance learners place emphasis on remote access to electronic resources.

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