Role of digital library and information centers in modern education system and research development

Mukesh Chand Bharti

Librarian, Shree Guru Gobind Singh Tricentenary University, Gurgaon, Haryana, India

*Corresponding Author: Mukesh Chand Bharti
Email: mcbharti@rediffmail.com

Abstract

The digital library dynamically developed in past 15 years and in current time the role of digital library AND digital information is dynamically growing. The Information Communication Technology (ICT) makes effect on e-learning and digital learning after development of digital resources and digital information, now everything is easily available in online digital form and users very easily connects with online information through internet. India have great position in the use of digital information comparatively other countries of the world, last 3 to 6 years our digital information development takes a lead in all the sectors of education as well as library sections and have changed the growth of life. In modern era it's essential to filter the right information from the online digital information. Modern digital libraries are providing digital information to research scholar in different forms for the better quality education and research. In modern digital era many leading publishers digitalizing the information and providing to users in form of online resources and digital databases and this type of information is very helpful and research scholars and academicians are using as research tools 24x7 hours in the libraries.

Keywords: Digital library online resources communication consortium collection dissemination education research.

Introduction

The growth of the Internet and digital technology has caused a dramatic and rapid change in scholarly printing and publishing world after In the early 1970s, digital libraries were built around mini and main-frame computers providing remote access and online search and retrieval services to online databases using computer and communication technology available at that time. Modern digital online library or Web-based library database and resources history is not very long, Since the concepts was first launched 2003 in form Institutional Repository (IR) in 2003 total 5200 Institutions of the world adopted Institutional Repository to store data in digital form in digital library. For academic libraries, which are responsible for preserving and providing access to the scholarly record and information, these changing scholarly communication practices are creating both new challenges and new opportunities.

Digital information database and sources consortiums are easily found on internet and directly can access after subscription and registration though mobile apps, tablet, iPad, laptop, computer, digital books reader, digital screens and other digital information mediums.

What is Digital Library?

A digital library, digital repository, or digital collection, is an online database of digital collection that can includes text, images, audio, video or other digital media formats.

A definition of digital libraries is from Digital Library Federation (1999) "Digital Libraries are organizations that provide the resources, including the specialized staff to select, structure, offer intellectual access to interpret, distribute preserve the integrity of and ensure works so that they are readily and economically available for use by a defined community or set of communities."

According to Duguid, Paul, (1997) "The concept of a digital library is not merely equivalent to a digitized collection with information management tools. It is rather an environment to bring together collections, services and people in support of the full life cycle of creation, dissemination, use and preservation of data, information and knowledge."

According to Gladney, H.M., et.al (1994) "A digital library service is an assemblage of digital computing, storage and communications machinery together with the software needed to reproduce emulates and extend the services provided by conventional libraries based on paper and other material means of collecting, storing, cataloguing, finding and disseminating information."

"Digital Library or Web-based online learning is a collection of different kind of documents and resources which is organized in digital form and available in online form through the Internet to its users"

Digital library is very useful platform for the library users and its playing dynamic role in the field of education and research development. Digital library have great contribution in many area of day today life and everything can easily find in minimum possible time anywhere due of digital library. Digital Library is depositing information and transforming data in different formats in online and off-line forms in the libraries depositaries, central Servers and clouds, all the storages devices are connected with internet.

Digital Libraries and Education System

digital library and information centers is using as learning teaching tools in the different academic areas of education and research like social education, cultural education, technical education, research education and commercial education.

Digital libraries are much more easy access to search information; it is very short time taken procedure   that expand our possibility to store books, articles, seminars, pictures, audio videos and other reading materials, currently we have many digital or online libraries and some of them are very wonderful. The majority is invaluable sources of reference, but there are some, such as those listed here, that contains books, journals maps films and audio/video books that would be very difficult to find in physical form.

World Digital Library
A source for manuscripts, rare and special books, films, maps and more in multilingual format.

Universal Digital Library
It have collection of millions books and very useful for the academic education and research.

Project Gutenberg
Project Gutenberg is very demandable platform of 33000 e-books to read and download any time anywhere.

Barthleby
An immense collection of books for consultation and it includes fiction, essay, poetry and other literature of ancient time.

Google books
Google books are very useful platform for the study of different subjects and easily available, it covers more than 100000 open and paid books for the users.

Ibblio
It's a collaboration of different libraries and information technology and covers e-books, magazines academics assay, software's, music, radio recordings

Internet Archive
It is largest digital library of eBooks and audio books and all sources can freely downloadable users.

Open Library
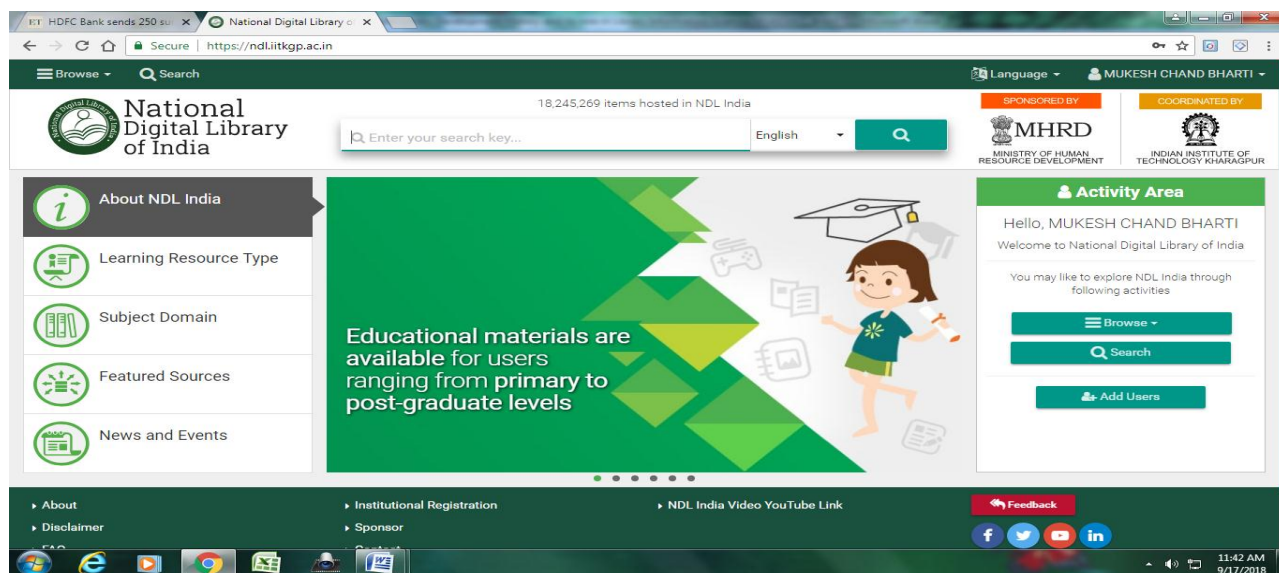It is open to all and covers million eBooks of classic literature and easily can download for study.

National Digital Library
NDL launched in India on 18th June 2018 Government of India, Ministry of Human Resource Development (MHRD) Minister of HRD Prakash Javedkar on Tuesday launched the National Digital Library, a repository of millions of academic texts around the world which will be open for all to use. The digital library at present hosts 17 million plus recourses like books journals audio books etc.

NDL has been built by the IIT, Kharagpur, under a project given it by HRD Ministry, with work on it starting in early 2015.

NDL India is designed to hold content of any language and provides interface support for leading Indian languages. It is being arranged to provide support for all academic levels including researchers and life-long learners, all disciplines, all popular form of access devices and differently-abled learners. It is being developed to help students to prepare for entrance and competitive examination, to enable people to learn and prepare from best practices from all over the world and to facilitate researchers to perform inter-linked exploration from multiple sources. The pilot project is devising a framework that is being scaled up with respect to content volume and diversity to serve all levels and disciplines of learners. It is being developed at Indian Institute of Technology Kharagpur.

Earlier this digital library was limited for schools and other educational institutions only but now government open this to all academic organizations, now it covers 1.7 lakh books, not in text form of guidebooks as well.

National Digital Library of India (https://ndl.iitkgp.ac.in)

Table 1:

S. No.	Publishers	Name of Database/Online Library	Web. Address/Links
1	Wiley Inter Science	Wiley Online Library	https://onlinelibrary.wiley.com
2	Elsevier	Science Direct	www.sciencedirect.com
3	Wolters Kluwer	Up To Date	www.uptodate.com
4	McGraw-Hill	Access Medicine	https://accessmedicine.mhmedical.com
5	Innovative Publication	IP Online Library	www.iponlinejournal.com/
6	Jaypee	Jaypee Digital	www.jaypeedigital.com
7	Springer Nature	Springer Link	https://link.springer.com/
8	Medknow	Medknowjournalsasp	http://www.medknow.com
9	Sage	Sage Journals SSCI/SCI	https://in.sagepub.com
10	Quintessence Pub.	Quintessence Science	http://www.quintpub.com/

Recently, IIT Kharagpur had conducted a two-day workshop to trained about 100 librarians from institutions across the country at Kharagpur. These institutions included Indian Institute of Science, IIM Ahmedabad, IIT Guwahati, Dhirubhai Ambani Institute of Information and Communication Technology, IIAS Shimla, NIT Jamshedpur, Central Scientific Instruments Organization Pondicherry University, etc.

Virtual Library
A Virtual Library is a collection of resources available on one or more computer systems, where a single interface or entry point to the collections is provided.

Digital Preservation
Digital Preservation is the set of procedures and activities that ensures continued approach to information, existing records, scientific and cultural heritage which are available in digital formats.

Role of publishers in academic information digitalization
As one game-changing tech-led disruption after another rocked the publishers raced to meet new opportunities (and new digital expectations and change) generated by new

ways of accessing content. Companies in the publishing space are shifting to a modern system that can help them to maintain a position of strength regardless of the next big innovation. The process is called digital transformation and, ultimately, it can improve the success of any publisher and it's a part is digital transformation. Many leading publishers of the world are changing the face of education and providing all printed academic and educational information in online digital form to the users.

Leading Publishers online digital Databases
Many leading publisher of the world are actively managing the archives of online information for the current and future research programs.

IP Online Journals
(www.iponlinejournal.com)**:** Innovative Publication Pvt. Ltd launched new product called www.iponlinejournal.com which is web based e-resource product for library, currently more than 170 + Medical, Dental, Nursing and pharmacy journals are available as online with full text article. IP Online has good number of collection of e-journal and e-resources, IP Online database

is growing Digital full-text resources and very useful for research scholars of digital world.

Wiley Online Library

(https://onlinelibrary.wiley.com/) is promoting the quality research and providing high standard educational full text information to the research scholars, mostly online journals have high impact factor comparatively other journals. Wiley publishing research based digital information for world class education.

Science Direct

(www.sciencedirect.com): Science Direct (www.sciencedirect.com): Science Direct is a world leading sources for scientific, technical and medical research. It covers around 5000+ journals, 40000 e-books and millions articles. Science Direct is maintaining the quality sources information in online databases and Elsevier publisher also managing world leading indexing database "Scopus".

Online social Site

Online social sites is rapidly growing and impacting education system, some sites delivering very fast online digital information without research and check, the current practice of social sites is harming to our online quality information system therefore it essentials to check the facts value of the online information, a wrong information can change the right work to wrong work.

In some times social sites are very helpful because we trace any useful information very easily from these sites, apps and consortiums.

Conclusion

Digital information technology is growing rapidly and digital informations are storing on internet in forms of full-text articles, eBooks, images, audio, videos, and other mediums of informations for use. Online information can be collected by using different types of tools and technology. The research scholars are using digital information as a weapon in the education for solving the problems in research but it is essentials to the scholars to understand the correctness and facts of digital information because the wrong information results are very bad and makes negative results. In current time research is growing but results are not growing due to storage of wrong information on online digital information channels, mediums, A3a/databases and online libraries. Research scholars are need to think, discus, verify and make selection good quality online information database for better quality education and research.

Conflict of Interest: None.

References

1. Bainbridge, D.; Thompson, J.; and H.Witten, I. 2003. Assembling and enriching digital library collections. In Proceedings of the 3rd ACM/IEEE-CS joint conference on Digital libraries, 323–34.
2. Ruiz,Jorge,MD,Michel.;2006 vol-81 no.3 march,. The Impact of E-Learning in Medical Education,207-12.
3. Gary Marchionini, "Research and Development in Digital Libraries" (http://ils.unc.edu/~march/digital_library_R_and_D.html)
4. Alhaji, I U.(n.d.).Digitalization of Library resources and the information of digital libraries: A practical approcah1-17, Retried February 2,2015.
5. Digital Library Initiative -- phase 2, (http://www.dli2.nsf.gov/index.html)
6. Edward A. Fox, "Digital Libraries Overview" (http://ei.cs.vt.edu/~h3004fox/Overview.htm)
7. Arthur Lee Wilson, 1994, "The Digital Library" (http://www.ad1440.net/~devnull/work/dig_lib.html)
8. "Available Research", 1998, (http://www.dli2.nsf.gov/dlione/)
9. Bruce Schatz and Hsinchun Chen, "Building Large-Scale Digital Libraries" May 1996, (http://computer.org/computer/dli/)
10. National Science Foundation, "NSF/DARPA/NASA Digital Libraries Initiative Projects", (http://www.cise.nsf.gov/iis/dli_home.html)
11. Ambati, V.; Sankar, P.; Pratha, L.; and Jawahar, C. 2005. Quality management in digital libraries. In Proceedings of 1st ICUDL.
12. S.G. Hombal, K.N. Prasad S.G. Hombal, K.N. Prasad: Digital Copyright Protection: Issues in the Digital Library Environment: LIT 2012 V.32.No.3, 07-10.
13. Muqueem, Shaistha: Changing role of library professionals in the digital environmentally Librarian Digital Library-2002-2.