



Original Article

# Knowledge Dissemination in Libraries: Traditional Practices and Digital Innovations

Dr. Niraliben Upendrakumar Sevak

Temporary Assistant Professor, The Maharaja Sayajirao University of Baroda, Vadodara

Manuscript ID:  
RIGJAAR-2025-020935

ISSN: 2998-4459  
Volume 2  
Issue 9  
Pp. 165-170  
September 2025

Submitted: 12 Aug. 2025  
Revised: 17 Aug. 2025  
Accepted: 15 Sept. 2025  
Published: 30 Sept. 2025

Correspondence Address:  
Dr. Niraliben Upendrakumar  
Sevak  
Temporary Assistant Professor,  
The Maharaja Sayajirao  
University of Baroda, Vadodara  
Email:  
[dmniralisevak@gmail.com](mailto:dmniralisevak@gmail.com)

Quick Response Code:



Web: <https://rlgjaar.com>



DOI:  
10.5281/zenodo.17668356

DOI Link:  
<https://doi.org/10.5281/zenodo.17668356>



Creative Commons



## Abstract

Knowledge dissemination has always been the heart and purpose of libraries, shaping their identity as centers of learning and intellectual growth since their very beginning. Traditionally, libraries have acted as protectors of books, manuscripts, and other physical sources of information, ensuring the effective transfer of knowledge through processes such as cataloguing, reference services, and user education. These long-standing practices not only safeguarded information but also encouraged curiosity, critical thinking, and meaningful human interaction within learning communities. With the emergence of digital technology, libraries have gradually transformed into hybrid and digital knowledge hubs, integrating tools like digital repositories, online databases, e-learning systems, and services powered by artificial intelligence. This technological evolution highlights a more human-centered approach to accessibility and participation, allowing information to reach a wider audience across geographical and social boundaries. The present study examines how libraries have transitioned from traditional forms of knowledge sharing to modern digital innovations, analyzing the benefits, challenges, and possibilities that define today's knowledge environment. While digital advancements have revolutionized the way knowledge is accessed and shared, the study emphasizes that traditional practices remain vital for maintaining cultural heritage and supporting scholarly communication. Ultimately, this transformation reflects the continuous effort of libraries to balance human wisdom with technological progress, preserving their essential role in connecting people, ideas, and knowledge across generations.

**Keywords:** Knowledge Dissemination; Libraries; Traditional Practices; Digital Innovations; Information Services; Digital Repositories; User Education

## Introduction

Libraries have always served as the main institutions for the collection, organization and dissemination of knowledge. Historically, they were considered as repositories of knowledge stored in manuscripts and books. Libraries have evolved over the centuries as active centers for education and community engagement. Knowledge plays an important role mainly between librarians and users, in which cataloged collections, library cataloging services, reading rooms and several other library services are very essential for the dissemination of knowledge.

It is said that the digital revolution of the late 20th century and early 21st century has brought about a huge change in the functions of libraries and libraries. Due to the day-to-day progress in information and communication technology, libraries have needed to expand their role beyond the physical space to the digital environment. Due to which the place of information is no longer only the library, it has become possible to access information from anywhere, at any time and at any time. In the field of knowledge dissemination, e-books, digital archives, cloud storage, artificial intelligence, online databases, etc. define knowledge dissemination. These innovations not only increase accessibility but also democratize knowledge by removing geographical and socio-economic barriers. Despite these advances, the relevance of traditional practices cannot be ignored. Traditional practices provide the basic framework for modern innovations that can revolutionize innovations. Moreover, in regions where digital literacy or infrastructure is limited, traditional knowledge dissemination methods play an important role.

This study provides a comprehensive analysis of what has been achieved digitally in the library from traditional methods of knowledge dissemination. The challenges of integrating traditional methods digitally with technological services have been examined and the future directions of the library as a knowledge center in an increasingly networked society.

## Creative Commons (CC BY-NC-SA 4.0)

This is an open access journal, and articles are distributed under the terms of the [Creative Commons Attribution-NonCommercial-ShareAlike 4.0 International Public License](https://creativecommons.org/licenses/by-nc-sa/4.0/), which allows others to remix, tweak, and build upon the work noncommercially, as long as appropriate credit is given and the new creations are licensed under the identical terms.

## How to cite this article:

Sevak, N. U. (2025). Knowledge Dissemination in Libraries: Traditional Practices and Digital Innovations. *Royal International Global Journal of Advance and Applied Research*, 2(9), 165–170.  
<https://doi.org/10.5281/zenodo.17668356>

### Objectives of the Study

The main objective of this study is to examine the evolution of knowledge dissemination, with a particular emphasis on the coexistence of traditional practices and digital innovations, and to highlight the differences between the two.

- To analyse the traditional methods of knowledge dissemination in the services provided in the library.
- To examine the impact of digital technology on both library services and users.
- To study the context of effectiveness, accessibility and sustainability in the library due to the advent of digital technology.
- To understand and identify the challenges and limitations associated with both traditional and digital practices.
- To examine the relevance of traditional and digital practices for libraries and their users.
- To examine the future directions for libraries in balancing traditional and innovative knowledge dissemination methods.

### Traditional Practices of Knowledge Dissemination in Libraries

Historically, knowledge dissemination in libraries has been mainly manual, interpersonal and book-centered. This practice has been the basis of libraries and library services for centuries. It can be said that some of the main traditional practices of preserving, organizing and providing information to users are as follows.

#### 1. Collection development, cataloguing, classification

Traditionally, physical collections of books, manuscripts, magazines and newspapers in libraries disseminate knowledge. Classification systems like Dewey Decimal Classification, Colon Classification, Library of Congress Classification were developed on the basis of which reading materials were classified. Cataloguing was done to find reading materials for users, due to which it was easy to access the information available in the library. And both these classification and cataloguing methods help in facilitating information access in the library.

#### 2. Reference Services

Reference services serve as an intermediary between the library and the users. Reference services provide personalized assistance through librarians or library staff and guide readers to relevant materials. Reference services support research activities by answering questions posed by readers. This human-centered approach makes the library a trusted place for knowledge seekers. Through this service, readers are provided with the information they need quickly and accurately.

#### 3. Bibliographic and Indexing and Abstracting Services

Bibliographic, indexing and Abstracting services help in information retrieval. These services provide summaries or pointers to current works, helping users find relevant literature both within and outside their library.

#### 4. Reading Rooms and Study Spaces

The reading room is the physical environment of the library that plays an important role in the dissemination of knowledge. The reading room is a quiet reading hall, a study area and a place where readers are encouraged to make in-depth use of the resources. The library has become an intellectual center for both individual learning and collective study. Therefore, the reading room can be said to be the heart of the library.

#### 5. User Education and Literacy Programs

A major service provided by the library is an in-depth study of the traditional approach to library use and information literacy programs, which help readers understand where, how much, and what the library has to offer. In addition, these programs familiarize readers with the library and the reading materials within the library and make them aware of all the resources and services available.

#### 6. Interlibrary Loan Services

Inter-library loan service is mainly a collaboration between libraries and other institutions through which readers can borrow materials and in such a situation, if the resources are not available in their own library, those materials can be made available from other libraries. This prevents duplication of library materials and everyone has access to those reading materials, so this service is becoming very useful in the spirit of library cooperation.

#### 7. Community Engagement and Cultural Programs

Community engagement and cultural programs are a service in which libraries act as centers of cultural and intellectual development, organizing lectures, book exhibitions, story telling sessions, and discussions that enable information exchange and participation by a large number of users.

#### 8. Preservation and Archiving

Another and very important foundation of the traditional dissemination of knowledge is the preservation of rare manuscripts, newspapers and archives. Preserving collections in physical form remains a form of cultural preservation of our heritage so that the knowledge that exists can be transmitted from generation to generation. The preservation of old manuscripts, which are manuscripts, is done by a separate department in the library. Through which it also helps in doing new research and historical information is also available.

### Digital Innovations in Knowledge Dissemination in Libraries

The transition from traditional and historically dominated collections of information to digital and hybrid library models has revolutionized the way knowledge is created, stored and disseminated. Digital innovations are extending the reach of libraries beyond their physical walls, making global and immediate access to information possible. These innovations have also transformed the role of the librarian. From being a custodian of books, they have become facilitators of digital literacy and knowledge management. Information can be accessed very quickly in libraries based on innovative technology. Some of the most influential digital innovations include:

#### 1. Digital Collections and Repositories

Digital collections are the most important digital library and institutional repository creation of the current transformation. These platforms help in storing e-books, e-journals, e-thesis, and multimedia resources electronically and making them available to readers anywhere, anytime. Notable examples include the HathiTrust, Europeana, and the National Digital Library of India. Such repositories not only promote open access but also allow scholars and the general public to access content regardless of their geographical location, thereby increasing the accessibility of information.

## 2. Online Public Access Catalogues (OPACs)

The time-consuming card catalogue has been replaced by a new innovation called the Online Public Access Catalogue. This has changed the way readers find resources. Using APEC, readers can search for books, journals, and digital media through online search functions. This includes features like keyword search, advanced filters, and link data. This allows them to find a lot more reading material besides that literature. This feature has streamlined knowledge search and has also saved time and effort.

## 3. Electronic Databases and Journals

Through electronic databases and journals, readers can access and use the library at their own convenience. For example, the library now has access to JSTOR, PROQUEST, SCOPUS and IEEE, as well as several other electronic databases that provide users with access to full-text articles and conference proceedings and reports. This platform can provide cutting-edge research and increase academic productivity. Access to e-journals helps in ensuring rapid dissemination of knowledge by overcoming geographical and logistical barriers.

## 4. E-Books and Digital Reading Platforms

E-books and digital reading platforms can save the time of readers in going to the library. In addition, the increasing availability of digital access in libraries such as remote access, Kindle, Google Books and Project Gutenberg has changed the reading habits. With this service, maximum use of digital content can be made. And in today's information literacy era, this platform makes an important contribution. This innovation expands accessibility while reducing the dependence on physical storage.

## 5. Virtual Reference Services and Chatbots

The library now uses virtual reference desks and email-based help systems and AI-powered chatbots to assist users, allowing readers to ask questions and get guidance without having to physically be present in the library.

## 6. Mobile Applications and Cloud-Based Services

Mobile applications and cloud-based services have brought about a great development in the dissemination of knowledge in libraries. Readers can take maximum advantage of the services available in libraries by using applications through mobile phones from home or from any place at any time. Like renewing books, accessing digital

collections, and participating in library events. Due to cloud technology, they can store and access their reading material on digital platforms.

## 7. Open Access and MOOCs Integration

Open access is a service that has significantly influenced library practices. Many institutions organize open repositories of scholarly works in which the library collaborates with various online programs or, it can be said, online educational courses to supplement knowledge dissemination, so that readers can get online education based on these educational online courses. The best example of which is the integration of SWAYAM, MOOCS, COURSERA, etc., which makes educational content freely accessible to a global audience.

## 8. Multimedia and Interactive Knowledge Platforms

Through multimedia and interactive knowledge platforms, libraries are no longer limited to text resources, allowing the dissemination of digital innovations such as audio books, podcasts, and interactive e-learning modules. Virtual exhibits and digital storytelling resources that encourage learning.

## 9. Artificial Intelligence and Data Analytics

AI has emerged as an important and powerful tool in modern library and information science. For example, AI can use machine learning to automate cataloguing and classification. It recommends books and journals based on readers' preferences. It helps researchers analyse large data sets using data mining and data visualization tools. And it enriches users' knowledge dissemination process through personalized AI-powered services.

## 10. Social Media and Web 2.0 Tools

In today's modern era, if there are any tools that are most important for knowledge dissemination, then it is social media and web 2.0 which includes facebook, youtube, twitter, Instagram, Blog. Through these social media, the services provided in the library, new programs and resources can be shared, through which the users can make maximum use of the library. Apart from this, information can be conveyed to the users through these social media.

## 11. Digital Preservation and Cloud Archiving

With information available digitally today, there is a special need for digital preservation and cloud archiving in libraries to preserve and access digital content. Digitization is very useful in today's time, so that the information and knowledge available in the library can be delivered to the users in digital form. And these techniques like digital preservation and cloud archiving preserve and protect knowledge resources.

## Summary of Innovations:

Digital innovation has made it possible to deliver reading materials from the library to the users. This has increased the convenience of the users. This digital innovation is faster and more interactive.

evolved towards this innovation for the dissemination of knowledge, it is very important to evaluate both, which are as follows:

## Comparative Analysis: Traditional vs. Digital Approaches

To understand the difference between digital innovation and traditional practices and the books that have



Description	Traditional Approach	Digital Approach
Accessibility	Access was largely limited to the physical space of libraries. Users had to visit in person to consult resources, often restricted by opening hours, geographical distance, and collection size	Knowledge can be accessed remotely, anytime and anywhere, using devices connected to the Internet. This has broken geographical barriers, extending the library's reach to a global audience.
Formats of Knowledge	Dissemination was text-centric, with printed books, journals, newspapers, and manuscripts serving as primary media.	Libraries now provide access to diverse formats, such as e-books, multimedia, podcasts, databases, interactive modules, and virtual reality content, offering more engaging learning experiences.
User Engagement	Engagement was largely face-to-face, with librarians guiding users through reference desks, literacy programs, and community events.	Engagement is mediated through virtual reference services, online tutorials, mobile applications, and social media platforms. Although less personal, it is more immediate and scalable than face-to-face training.
Cost and Sustainability	Physical collections require significant investments in acquisition, storage, preservation, and staffing. Maintenance costs for print collections are ongoing and space-intensive	Although the initial infrastructure and licensing costs can be high, digital systems reduce physical storage needs and offer long-term scalability. However, recurring subscription fees for databases and digital resources can strain library budgets
Information Retrieval	Users relied on card catalogues, bibliographies, and human assistance, which can be time-consuming.	Online Public Access Catalogues (OPACs), federated search engines, and AI-powered recommendation systems make retrieval fast, precise, and user-friendly.
Preservation and Archiving	Physical preservation of manuscripts, rare books, and archival documents was critical but prone to deterioration due to environmental factors	Digital preservation ensures long-term storage, easy duplication and disaster recovery. However, digital obsolescence (outdated file formats, changing software) poses new challenges
Equity and Inclusivity	Libraries provide inclusive spaces for all community members, including those without technological access. However, rural and marginalized populations often had limited access due to lack of nearby facilities	Digital platforms democratize knowledge globally, but digital divides persist where Internet access, devices, or digital literacy are lacking. Thus, inclusivity depends on both technological infrastructure and user competence
Community Building	Libraries traditionally fostered community spirit through lectures, exhibitions, and group reading activities, providing a cultural and intellectual hub	Online forums, webinars, and virtual reading clubs allow global communities to form, but may lack the tangible interpersonal connections of physical gatherings
Speed of Dissemination	Dissemination is often delayed by publishing cycles, acquisition processes, and physical distribution.	Knowledge can be disseminated instantly through digital uploads, open access platforms, and online repositories, ensuring real-time access to the latest information
Role of Librarians	Librarians act as custodians, reference guides, and facilitators of reading culture. Their expertise was rooted in classification, cataloguing, and personal interaction	Librarians now function as information managers, digital curators, trainers of digital literacy, and technology navigators. Their roles are more dynamic and interdisciplinary, requiring continuous professional development

### Challenges in Modern Knowledge Dissemination

With the advent of digital innovation, some questions also arise in which information is available quickly, but it is also necessary to understand some questions, which are as follows.

#### 1. Digital Divide

The biggest and most important issue has been the internet, in which the presence of internet is very important for digital resources. It can be said that the people in the face of good internet high speed and modern ICT infrastructure get the benefit of internet. However, in rural and tribal areas, internet connectivity is not seen. In addition, they are not economically viable. Therefore, they

cannot afford some ICT equipment and internet, so they are deprived of studying digital literacy.

#### 2. Information Overload and Quality Control

Along with digital innovation, a question also arises in which consumers receive a vast amount of information in which they do not realize which information is reliable and which information is unreliable. In which it can be said that the quality is not maintained. Librarians now face the challenge of teaching users critical information literacy skills to evaluate the sources.

#### 3. Copyright and Licensing Issues

Despite the increasing use of open access in digital innovation, there are many digital resources that require expensive subscriptions, which raises copyright and licensing issues. This also ensures that digital resources can



be used in a limited manner and are not misused. Libraries often face restrictions on the use, copying, and sharing of digital content. Licensing agreements may limit simultaneous access, interlibrary lending, and archiving rights. These constraints hinder the equitable dissemination of knowledge and challenge libraries' traditional role as free-access providers.

#### 4. Technological Obsolescence

A question also arises in which technology cannot be fully trusted. There is a possibility of information being lost at any time and some problems also have to be faced such as file formats, storage media and software changing from time to time, new updates keep coming due to which the information does not remain secure. Libraries must constantly invest in digital preservation strategies to maintain access to their collections over time.

#### 5. Privacy and Data Security Concerns

Historically, the reading choices of consumers have been very important, in which the personal recommendations of consumers for reading were kept private, whereas on these digital platforms, that privacy is at risk. A breach in the library system or even the remote use of consumer data can destroy their use and even compromise their own intellectual freedom. Libraries are tasked with balancing convenience and ethical responsibility to safeguard user privacy.

#### 6. Skill Gaps among Librarians and Users

Digital innovation requires skill development of both librarians and users in which they both need to be skilled in using digital resources. Bridging these skill gaps is a major challenge, particularly in institutions where professional development opportunities are limited to a few.

#### 7. Balancing Traditional and Digital Roles

In today's era, both digital and traditional resources are very important. While both are very useful, it is very important to maintain a balance between the two. It is very important to maintain the digital platform along with the traditional one.

#### 8. Pandemic Lessons: Accelerated Digital Transformation

The Covid 19 pandemic has put a lot of emphasis on readers turning to digital media. In this Covid 19, books have become easily available on online platforms and digital transformation has taken a new turn. Educationally, online information has also been provided to students.

#### Conclusion

Knowledge plays a very important role in a person's life. In which it is very important to know whether the books and information available are accurate. In today's time, due to the explosion of information and information can be easily found on digital platforms, it becomes difficult to determine which information is true and accurate. The digital age has transformed the dissemination of knowledge through some applications such as online repositories, e-journals, AI, etc. Innovations like open access have also been used extensively, reducing geographical limitations and personalized and interactive education has come into existence. Moral laws like copyright have also been

formulated for the maintenance and preservation of some digital resources.

If we look at it this way, both traditional and digital show integrative analysis. Traditional loves the religious and cultural heritage of the community while digital includes the activities of art. If we talk about the future, both traditional and digital platforms are very necessary. A hybrid model is also seen between both. In addition, it can definitely be said that due to increasing technology, this knowledge is becoming accessible to all.

#### Acknowledgment

The authors would like to express their sincere gratitude to Department of Library and Information Science, The Maharaja Sayajirao University of Baroda for providing the necessary facilities and support to carry out this research. We also thank Dr. Niraliben Upendrakumar Sevak, Department of Library and Information Science The Maharaja Sayajirao University of Baroda for their valuable guidance and insightful suggestions during the course of this study.

#### Financial support and sponsorship

Nil.

#### Conflicts of interest

The authors declare that there are no conflicts of interest regarding the publication of this paper.

#### References:

1. Anderson, R. (2018). *Scholarly communication: What everyone needs to know*. Oxford University Press.
2. Borgman, C. L. (2007). *Scholarship in the digital age: Information, infrastructure, and the internet*. MIT Press.
3. Chowdhury, G. (2016). *Digital libraries and information access: Research perspectives*. Facet Publishing.
4. International Federation of Library Associations and Institutions. (2021). *IFLA trend report 2021: Global perspectives on libraries*. IFLA. [<https://www.ifla.org>] (<https://www.ifla.org>)
5. Smith, A., & Wong, M. (2020). Digital knowledge dissemination: Challenges and opportunities for libraries. *Journal of Library Innovation*, 11(2), 45–62.
6. Tenopir, C., & King, D. W. (2000). *Towards electronic journals: Realities for scientists, librarians, and publishers*. Special Libraries Association.
7. United Nations Educational, Scientific and Cultural Organization. (2022). *UNESCO recommendation on open science*. UNESCO. [<https://unesdoc.unesco.org/>] (<https://unesdoc.unesco.org/>)
8. Witten, I. H., Bainbridge, D., & Nichols, D. M. (2010). *How to build a digital library*. Morgan Kaufmann.
9. Priya, N. K., Mishra, I., Shastri, S., Saikanth, D. R. K., Pathak, A. K., Tripathi, S., Patil, S. S., & Vishwakarma, S. K. (2025). Digital Innovations in Extension Education: A Review of Emerging Technologies and their Impact on Agricultural Knowledge Dissemination. *Journal of Experimental Agriculture International*, 47(5), 408–423. <https://doi.org/10.9734/jeai/2025/v47i53430>



10. Ali, A., Abu Bakar, S. Z. S., Thoe, N. K., Lee, T. L., & Ismail, N. (2019). TRANSFORMING PUBLIC LIBRARIES INTO DIGITAL KNOWLEDGE DISSEMINATION CENTRE IN SUPPORTING LIFELONG BLENDED LEARNING PROGRAMMES FOR RURAL YOUTHS. *Acta Informatica Malaysia*, 3(1), 16–20. <https://doi.org/10.26480/aim.01.2019.16.20>
11. Sharma, R., & Sharma, C. (2013). Knowledge Dissemination in Research Libraries of Haryana. *Pearl: A Journal of Library and Information Science*, 7(2), 90. <https://doi.org/10.5958/j.0975-6922.7.2.014>
12. S, D. (2022). DIGITALISATION OF LIBRARIES (DIGITAL LIBRARIES) AND ITS SCOPE. *EPRA International Journal of Research & Development (IJRD)*, 40–42. <https://doi.org/10.36713/epra10724>