DIGITIZATION OF LOCAL COLLECTION FOR ACADEMIC PURSUIT: A CASE STUDY OF CENTRAL LIBRARY, GOA.

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CERTIFICATE OF ORIGINALITY

This is to certify that the Project Report titled "Digitization of Local Collection for Academic Pursuit: A case Study of Central Library, Goa". Submitted to Goa University in partial fulfilment of the requirement for the award of Master's Degree in Library and Information Science (MLISc) is an original work carried out by Miss Anuja A. Halarnekar.

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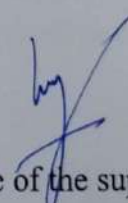
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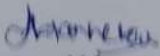Behavioural Studies.

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II

I hereby declare that the data presented in this Dissertation report entitled, "Digitization of Local Collection for Academic Pursuit: A Case Study of Central Library, Goa is based on the results of investigations carried out by me in the LIS Programme at the D.D. Kosambi School of Social Science and Behavioural Studies, Goa University Under the Supervision of Dr. Carlos M. Fernandes and the same has not been submitted elsewhere for the award of a degree or diploma by me. Further, I understand that Goa University or its authorities will not be responsible for the correctness of observations or other findings given the dissertation.

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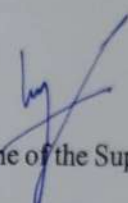Signature and Name of Student

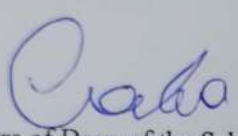Place: Goa University

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II

COMPLETION CERTIFICATE

This is to certify that the dissertation report "Digitization of Local Collection for Academic Pursuit: A case study of Central Library Goa." is a bonafide work carried out by Miss. ANUJA ARUN HALARNEKAR under my Supervision in partial fulfilment of the requirements for the award of the degree of Masters of Library and Information Science Programme in the discipline LIS Programme at the D.D. Kosambi School of Social Sciences and Behavioural Studies, Goa University.

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III

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TABLE OF CONTENTS

v

Scanned with OKEN Scanner

LIST OF TABLES

8	5.3.8	Storing of original documents	
9	5.3.9	Special training in Digitization techniques	
10	5.3.10	Sufficient staff	
11	5.3.11	Digitized content made available to users	
12	5.3.12	Foreign Literature available to users	
13	5.3.13	Maintenance of Digitised services	
14	5.3.14	Do the users pay for digitized content	
15	5.3.15	Easy reference books available	
16	5.3.16	Satisfaction of Web based services	
17	5.3.17	Subscription to different free websites	
18	5.3.18	Is the process time consuming for librarians	
19	5.3.19	Suggestions to improve the overall digitization process as per the latest technology	

LIST OF CHARTS

LIST OF GRAPHS

CHAPTER - I

INTRODUCTION:

Digitization is the trend, which is employed by libraries to preserve documents, and make the information available to the researchers and users with the help of information technology. Libraries are now digitizing local collection for academic pursuit via electronic media each as the World Wide Web. Internet and other available technologies. Rare documents are also being preserved and stored for users and researchers.

Library and information science has undergone vast changes in today's world compared to the last century. Digitizing of its vast resources in all formats has helped the library users and academicians to get the required information at a faster pace at National and International level.

A digital library stores information in digital format like texts etc. which are also available to the business community. During digitization a set of technologies whether hardware or software are utilized as well as are employed to take the process of digitization forward.

A digital image comprises of pixels which are arranged in a set of columns and rows and each pixel consists of tonal values. These tonal values are digitally represented in a binary code which are called bits and so stored in a sequence.

1.1.1. DIGITISATION AND ITS USES:

Rapid and accurate access to the library uses specially the academicians/ researchers etc.

Foreign contents and local contents are easily accessible via the internet and other electronic devices.

Different library science materials like books journals print materials teaching materials can be found via digitization content.

The virtual library or e- library is also known as digital library where local collections are digitized.

A wide variety of collections such as electronic journals to electronic versions of public libraries etc. are termed as a digital library.

1

1.1.2. CONCEPT OF DIGITIZATION OF LOCAL COLLECTION:

This concept denotes how traditional or content from another format was converted into an electronic form. The Analog content is converted into digital form and is hosted on the internet/ or intranet or it can be a Portable Document Format (PDF) or TIFF (Tagged image file format).

Rare books etc. which are fragile contents, are well preserved for posterity via digitization so also pages of Manuscripts, Images and Audiovisual matter which are important to scholars are digitized.

Digitized content, which is archived, can be stored retrieved and accessed electronically. It refers to Os and 1s and available in machine-readable format and is the connection between the provider and consumer of information OCR. Software, scanners are used.

1.1.3. SIGNIFICANCE OF THE STUDY:

The Purpose of digitization of local collection in a library, is it brings to the fore how different types of methods, technology, manpower etc. are used to preserve and digitized content. How it can be easily made available electronically and a faster pace even when the user does not visit the library the can get access to the various sites via the internet and obtains information from various sources now in modern times with the latest technology.

1.1.4. STATEMENT OF THE PROBLEM:

The Central Library, Goa has been making a lot of effort to preserve and digitize old and rare content so as to make it available for posterity. There are a lot of historical documents from the Portuguese era dating back to the 1800's and they are being disintegrated slowly. So far lakhs of pages of information of old and rare books have been scanned and preserved.

1.1.5 OBJECTIVE OF THE STUDY:

1. To study the process of digitization of local collection and benefits to the different users in central library be it researchers' users and academicians.

2. To study the modalities to provide effective and efficient collections storage organization and retrieval of digital information and preservation of rare documents.

3. To examine the infrastructural facilities required for digital information system to make data more structured. More organized and easily accessible to users.

4. To digitize rare books of the 16th and 17th century which were procured from convents in Old Goa as well as published in 17th century in Goa and also to design the pre-liberation books of Bibliótheca National received under Press and Registration of Books Act 1867.

1.1.6. HYPOTHESIS:

1. The present technology adopted by the Central Library Goa is not adequate for digitizing collections as per observation.

2. Digitization process today lacks proper guidance from trained professionals although technology is now available but cannot be used properly.

1.1.7. NEED OF THE STUDY:

Local collections in Central Library Goa must be made electronically available to its users and the academicians at large. And to get to this point the focus is on proper digitization techniques to be used be it books pages etc. electronically. A well trained technical and local staff is a must Also the Library must have a proper LAN/ WAN system and new PCS to support this technology for the digitization process.

1.1.8. LIMITATIONS OF THE STUDY:

The study of digitization is limited to the local collection available to the central library goa with focus on the existing methods used for digitization and will benefit the users who frequent the library and also to internet users online.

1.1.9 RESEARCH METHODOLOGY:

1. The researcher has browsed all the literature available on the topic.

2. Further the researcher has visited different portals involved in digitization

3. Researcher has tried to discuss the issues of digitization with experts and working professionals.

4. Further the researcher had prepared a detailed questionnaire and was distribute among all

  stakeholders to know the topic in depth
5. Further the researchers had used all the statistical techniques and graphs and charts to
  conclude the topic with clear and precise interpretation.

1.1.10. POPULATION OF THE STUDY:

The study has included the Central Library professionals who are engaged in library digitization process.

1.1.11 ORGANISATION OF THE STUDY:

The study will have the following chapters

CHAPTER I: INTRODUCTION

CHAPTER II: REVIEW OF LITERATURE

CHAPTER III: DIGITIZATION IN LIBRARIES

**CHAPTER IV: ADVANCES IN DIGITIZATION AT NATIONAL AND
INTERNATIONAL LEVEL**

CHAPTER V: DATA ANALYSIS AND INTERPRETATION

CHAPTER VI: OBSERVATIONS, FINDINGS SUGGESTIONS AND CONCLUSION

1.1.12. CONCLUSION:

This study will aid the users and academicians to know the technology used and its benefits Technology advances with respect to information retrieval etc. in library has revolutionized the entire system in recent times and with it comes the faster pace at which information can be obtained in the library and also online in the library.

Printed matter is slowly being pushed in the background as users opt for technological data available but yes, traditional books are also in demand, as total information cannot be obtained via digitization. There is a hitch to the process and all this is possible with modern technology –LAN internet high speed full text search engines subscribed websites as well as free websites for browsing to obtain information accurately and from advanced sources.

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2   **INTRODUCTIONS:**

Libraries the world over are making all efforts and leaving no stone unturned to Digitize their collections with modern technology and efficiently, so that content is made easily available to the users, researchers and others. Content that is digitised can be found via the internet and other devices. Digitization involves various procedures to convert analogue content into digital. Technology is involved as such experts in the field along with the library personnel and other staff are to be actively involved in the process. Different web sites must be browsed an techniques studied as various steps are involved. Different countries have digitised their content and stored, preserved, retrieved have a knowledge about the priority in which the content must be selected for digitization. So here we have to have a knowledge about rare and fragile documents as well their digitization and preservation.

2.1   LITERATURE REVIEW

1. **Bertot et.al.** (2016)[1] Have described in this article the initiatives/ three methodologies used in libraries to create an evaluation and account for the needs of diverse uses of population, usability, functionality and accessibility of library services for providing high quality services to users in the library.

2. **Montgomery, and King** (2012)[2] Have specified the cost of subscribing to electronic publications, with the migration to electronic journals and the changes in the library's operational costs of maintaining print and electronic versions of journals. They have also analysed differences in scientist's use of print and electronic scholarly journal.

3. **Smith, L and Rowley J** (2022)[3] This study shows that the application of digitization in public library and local studies conducted on collections progress for digitization is limited. A two phased approach i.e. A website analysis and interviews with local studies conducted shows this result.

4. **Alam and Maity** (2022)[4] Developing a website with C M S. A Case study of Delpy of Library and Information Science (DLIS) Jabalpur University example is given by Alam and Maity with the application of I C T. in libraries and this helps in bringing a change in providing information to the end users. Documents are available in different forms such as XML, HTML Multimedia and text documents. The University is currently investigating new ways of collecting and preserving scholarly information.

5. **Dutt, Mahipal and Kaur, Baljinder** (2022)[5] Have projected the use of CMS or Content Management System as a computer application which helps in creating, organizing, modifying and publishing digital content which can make use of HTML which is provided free of cost by the developers and can be used as per our requirements in the library.

6. **Astle and Muir** (2012).[6] Examine the relationship between access and preservation in digitization projects in public libraries. The preservation of original material and objects and the financial aspects surrounding digitization projects, it is found that the range of content that has been digitised is very narrow and largely driven by copy right restrictions.

7. **Srivastav and Saraf** (2016).[7] Says that it is important to realise that electronic publications revolutionise the world of information disrupting historical balances that have set rules according to which publisher's and libraries have cooperated for centuries. This change yields considerable advantages but also gives rise to problems. On one hand information providers can publish information faster and cheaper. Consumers can consult a multitude of information sources located all over the world from a single point of access.

8. **Ramana, P.V.** (2020)[8] Presents a brief overview of digital preservation, digitization of manuscripts and preservation techniques which are currently in use in India. He highlights the role played by multimedia technology in digital preservation of Indian manuscripts., projects also the manuscripts resources and manuscripts conservation centres in India and the requirements in promoting preservation of digital materials.

9. **Whalen, M (2020).**[9] discusses intellectual property and licencing issues with the digitization of special collections in libraries and the fair use, law and whether permission is needed from the rights holders before a library can digitize a document.

10. **Greg, Zick** (2015).[10] reviews the history of early efforts by librarie to build local collections and how it was tough to build without modern technology. The content had to be developed with the available software at the University and help libraries around to build and maintain their local collections.

11. Yan, Quan, Liu (2009)[11] Studies the current practice in digitizing library materials. Building a good collection has been a task in all libraries and now a days more crucial, as digital matter can be easily accessed by users and this reveals the digitization practice methods and challenges faced in digitization.

12. Lopatin, L (2016)[12] explains the importance of various digitization project issues and how they can be resolved and provide practical guidelines. The following issues like project management funding, legal issues, metadata creation, and preservation are highlighted so as to provide wider access and preserve materials.

13. **Boock and Vondracek** (2016)[13] have discussed how libraries have reformatted documents to digitise especially mass documents. Libraries have begun microfilming projects to preserve print holdings like old newspapers, rare documents, postcards, photographs etc to preserve them for posterity and for future use to researchers.

14. **Jeevan, V. K.** (2010)[14] Has stated that digitization of collection enhances the shelf life of library collection and digital libraries have brought about a development in the Library and Information discipline. Advancement in computers and Information Technology has helped digital library the world over.

15. **Laurel. Sammonds** (2018)[15] discuss about research. Analysts who challenged traditional thinking about collection and preservation thinking, about collection and preservation activities in the library digitization. Two important programmes were discussed about what to digitise and what to withdraw during digitization.

16. **Pandher. B. Kaur** (2022).[16] has stated that archives contain millions of documents like manuscripts, rare books, paintings, photos etc. Lamination does not seem to be the solution for preservation of these documents. The option for digitization aids in preservation of originals through reduced need for physical handling.

17. **Gessesse, K** (2010)[17] says that the collection in a library should be established with a specific purpose specially for instructional and research and users. Traditional formats for information such as books etc have been changed with the use of electronic sources through the use of computer technology.

18. **Swanick. S and Garland, J** (2019)[18] State that the purpose of collection development brings out the valuable heritage resources, which are vital for teaching, researching and learning. Curation of special collections as a means of exposing hidden collections has brought about unique print materials into lime light.

19. **Danielson.** (2020)[19] states with growing interest in evaluating the effectiveness of Libraries it is increasingly important that libraries find efficient ways to evaluate the collection development and acquisition process. Access collection development with 2 separate studies. Acquisition data with statistics to determine what was actually used and to develop the same.

20. **Sharma and Vishwanathan** (2016)[20] Have stated that libraries are the order of the day and the conversion of traditional to digital is being developed. Globalisation of the concept will not be possible until we overcome the technological gap between developed and developing countries.

21. **Singeh, Feria and Kiran, Kaur.** (2022)[21] Have stated that the purpose of this paper is to describe a new benchmarking framework on the factors that influence library. Concept mapping is used to illustrate the relationship between the information systems success model and D L Frameworks.

22. **Roknuzzaman, and Umemoto,** (2015)[22] have stated that these local collection management process. The study is based on view points of practitioners worldwide. The process of acquisition, organisation, storage and retrieval and dissemination of knowledge through library is vital.

23. **Demas and Miller** (2019)[23] have stated that with the emergence of shared print repositories has created new opportunities for libraries through collection management. Formal collection management plans and policies should be used as a practical framework for decision making.

24. **Kinner and Crosetto** (2018)[24] Have stated that collection development remains a major focus and concern of current interest for all types of libraries. The library has to balance its individual collection needs when it is a member of the consortium. The academic library engages in collection development at the local and consortia levels.

25. **Horava and Levine-Clark,** (2018)[25] state that collection development policies demand driven acquisition models using collection budget rationalising legacy print collection and showing value for the collections. Collection budget is used to fund many costs other than content with the limitations the results provide the librarians with an overview of current practices.

26. **Maclean, L** (2020)[26] aims to provide a roadmap for public librarians for digitizing collections with limited staff and funds. It deals with the 3 key principles.1 Expectations of technology community who expect information online. 2 Originals are preserved with minimal handling 3 The improved access to collection.

27. **Moghaddam, G,** (2015)[27] Aims to provide an overview of the challenges imposed on libraries regarding digital resources. Information Technology and the Web are challenging for librarians in preserving library materials for future generations.

28. **Mills, A.** (2020)[28] states that libraries digitise their special collections of rare materials to ensure that users meet their needs and build digital collections that reflect their priorities.

29. **Pancheshnikov, Y** (2017)[29] indicates in her preface about the basic steps of development in the electronic age. Collections must be organised and acquired accordingly in libraries. Technological issues are addressed in every aspect of digitization.

30. **Skekel, D,** (2012)[30] states in this article about the number of digitised collections which are produced by academic, public and special libraries in implementing and maintaining digital collections and providing, organising access to resources.

31. **Schwartz, C.** (2005)[31] states that Digital Libraries are complex systems that offer opportunities for new and improved user services and maintain collections of purchased or converted digitised information. The planning, creation and execution of a digital library requires the expertise of many at almost every step.

37. **Sreenivasulu, V** (2010)[37] stresses that the nature of digital libraries is to be a specialist librarian who has to manage, organise and handle the specialised tasks of massive digitization, storage, access, digital knowledge etc. He has to take care of digital libraries and manage the digital information system.

38. **Harris, V and Weller, A** (2020)[38] have stated that academic special collections librarians have taken great efforts to make their collections known. Electronic finding aids, digitising materials are used as a special study.

39. **Daigle, B** (2020)[39] says that the effect of digital technology on special collections has been immense and ongoing. This study will focus on how archival materials have been transformed by digital technology for new online environment.

40. **Stewart, C** (2020)[40] This article offers a brief introduction to some of the core issues in digital preservation. Academic Libraries have now been facing a challenge of preserving their own digitised collections as new opportunities in preserving other electronic content are in fore. This requires in collaborating with other libraries to solve the problems faced.

41. **Lampert, Cory** (2020)[41] says that Digital Library managers today are faced with challenges with regards to digitized content in a library on a large scale. The staff-funds and technology are to be considered but much of the literature is focussed on philosophy, user access and meta data.

42. **Peter, Michel** (2010)[42] says that the aim is to present issues related to digitization and academic special collection and management of traditional print. Special collections librarians have a better understanding of the different perspectives of digitizing library collections.

43. **Skott, B** (2022)[43] stresses that digitization of the public libraries and the transition to online services has a lot of implications to the staff members in perception of their skills. Library staff members have been appointed as key facilitators of citizens continued attachment to Civil Society. Library professional rapports and research literature were identified and applied as a theoretical framework in the creation of the analytical apparatus.

44. **Kichuk, D** (2015)[44] says this paper seeks to provide recent case study evidence for the growth of electronic resources in an academic library collection and to analyse growth patterns and impacts in electronic resource types i.e. bibliographic, full text and reference.

45. **Walker, W and Keenan, T** (2022)[45] describes the methods for restructuring workflows and efficiently using staff members to work on multiple digital collection projects as budgets and resources fall. The library uses varied methods to several digital collections supported by literature and volunteers in libraries.

46. **Powell, C** (2018)[46] makes it known that the aim of this paper is to provide an overview of the OPAC integration in partnership with Google. Various strategies are used which provide metadata integration with digital resources and presents the digital objects to the user in the OPAC.

47. **Winzenried, A** (2015)[47] As per the author this work is to envision future library innovations in a digital age. New technologies, artificial intelligence, computing systems are emerging as the new forms of development and speedy digitization of content in library. Long established practices and beliefs have been challenged and often wiped out. Digital technologies have changed the expectation of the users in the library.

48. **Davenport, Nancy** (2012)[48] summarises that new forms of scholarship and publishing are radically and rapidly changing among librarians and library personnel who create, store and distribute and use information. Digitising of library collections and technology have resulted in advancement which is required by the next generation of users and librarians.

49. **Haines M and Jones W** (2020)[49] have brought into the limelight the many aspects that shape the digital library. A library means different to a lot of users and it is the collections in the Digital Age which are of importance. Print based collections have adapted to an era of electronics digitising their analog collections to a digital form.

50. **Pan, R and Higgins R** (2005)[50] provide a brief overview of some of the digitization projects undertaken at Durham Library. These projects cover the range of the collection and include digitizing photographs, maps, topographical prints etc. The funding, technical base, standards used are described.

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2

Chapter 3

TITLE: Digitization of libraries

3.1 INTRODUCTION:

3.1.1 Digitization is the process of converting the contents of a document i.e. local collections into electronic form library materials are selected of intellectual content. They are processed, scanned and saved into the computer to be accessed locally and remoted via the internet. In the library traditional library materials, the form of books papers etc. are converted into digital form.

Digitization of library collections brings the library nearer to the users who can avail of the faculty as per their convenience. There were many digital library projects which were started in the early 1990's and one of the first projects was the Vatican library Accessible worldwide situated in the papal complex in Rome here collections to be digitised were selected from the rare book collections of 75000 codices from. After this early activity vast changes has taken place in the areas of digital libraries with respect to publishing preserving making adaptation to change in digital forms in libraries so that users as well as researchers and other people can avail of the library facilities from time to time and at their own convenience.

3.2 Definition of Digitization.

According to the Library of Congress 2019 Digitization refers to the process of translating information like books sound recording picture or video into bits. Bits are the fundamental units of information in our computer systems which convert binary digits called digitization. A digital library is the new way wherein the functions of libraries are classified catalogued networked with dramatic shifts in intellectual organisation and electronic practices. Different writers/authors have described the digital objects including text images videos and audio methods of access and retrieval for the selection creation organisation maintenance and sharing of collection.

The digital library federation 2019 defines a digital library as an organisation that provide the resources, including the specialised staff to select structure allows intellectual access to interpret distribute preserve the authencity of local collection of digital works so that they are easily. Available for users and other library clientele digital libraries are organisation that provide digital information to user's local collections are digitised using the modern/techniques

available so as to digitise the items faster and users can have access to the information resources anywhere at any time.

Functions in digitization of local collections involve the selection access interpret and distribute information to users. They are a special forms of information retrieval systems. Digital library consists of a critical mass of digital information in different formats like word still images moving images sound and combinations online/ offline made available via the internet to users anytime and anywhere in the world.

3.3 Basic functions of digital library (2015)

Acquisition

Dissemination

Interpretation

Search and retrieval

Preservation

Adopted from the key functions of digital library source book library a growing organism

3.4 Types of Digital Libraries:

3.4.1. Standalone Digital library (SDL)

This is a classical library which is a fully computerised one wherein the holdings and digital like electronic scanned or digitised it its self-contained and the local collection is centralised with the benefits of computerisation like the library of congress (lc) and the National Digital Library.

3.4.2 The Federated Digital Library (FDL) This library is a federation of several independent standalone libraries (SAC'S) in the network which are organised around a common theme and joined together on the network. Nit comprises of several autonomous standalone libraries with a user interface and they are connected through communication networks.

The major challenge in the construction and maintenance of FDL is interoperability as the different repositories use different metadata formats and standards. The examples of fdl are the networked computer science technical reference library (NCSTRL) and networked Digital library of theses and dissertation.

3.4.2. Harvested Digital Library

This is a virtual library that provides summarised access to related matter over the network. It holds only metadata with pointers to the holdings available on the cyberspace the material held in libraries is converted and summarised harvested according to the definition of an information specialist (IS) it has regular digital characteristics and is subject focused. The information specialist is responsible for annotating the objects in the library. Examples of HDL'S are the internet public library (IPL) and the www.virtual library.

3.5. Digitisation Process

Content selection involves the local content selection depends on the utility value and rarity of the collection which may be internal/external free commercial owned on licensed print or in electronic format. The content includes staff publications e-mail archive news report policies plain documents drawings software press release presentation courseware lectures etc.

Network and Interoperation Networking

During metadata and open access allows access to the various local collections to users to gain access to the desired information. Digital object identifiers also play an important role in content organisation local content organisation is the basis of digital library services and products. It involves a basic process of different types of hardware and software technologies which is linked to the use and purpose of the following methods are used in the digitization of local collection.

A Manual data entry scanning

B Optical Character Recognition OCR

C Excalibur technologies and pattern recognition technologies

D Document Imaging

Manual method of converting an image of a page into digital form is to enter it manually this is time consuming but it's useful from the point of view of information retrieval.

In the second method scanners are used to take digital pictures of objects scanners can be simple desktop machines or can be very large and complex systems that are used to process of OCR involves the scanning of printed page and their turns it into digital text which can be edited or fully indexed. The third method involves the next generation of OCR'S represented by pixie

28

which is developed by Excalibur technologies. This technology uses Adoptive pattern recognition which minimise the neutral patterns of this brain. It can be taught to recognise variations and relationships pattern.

Next is Document Imaging which is a simple method of capturing image and taking picture electronically of each page of text with the same type of scanner like in the case of OCR but the images are stored as graphic files other than texts files the text on the page cannot be edited or indexed.

3.6 Advantages and Disadvantages of Digitization

3.6.1 ADVANTAGES

Digitised matter can be delivered at a faster pace to the concerned users

It uses less space in a library for storage of digitised local collections especially for business that deal with large volumes of paper work

Fast retrieval of local collections which are digitised computers hold the key to the digitised matter retrieval and are accessed. Quickly.

Digitised documents and files etc. are secure as they are encrypted digital data backups can restore files and are safer even in the failure of a major catastrophe

Digital documents are usually not worn out and can be retained for a longer period of time especially rare books etc.

3.6.2 DISADVANTAGES

The issue of copyright must be given to the client and not to the bureau. This hinders the process of digitized matter to the users

There are also technical difficulties with regards to integrating systems and data which sometimes hacked of sensitive information

Due to modern technology and is dependence on it has led to major health problems like anxiety eye damage etc and humaan work is under valued

Inspite of all the technological developments associated there is the risk of cyber attacks and digital content may be merchandised and image licensing sale of digital content

But inspite of all this costs of digitisation of local collections which are vast can outweigh the finances of an institution like the public library using modern technology for digitizing.

3.7 Preserving the Digitised Document

With the advent of changing times in technology rapid changes in the concept of local collection digitization are taking place in libraries. Now mostly all libraries have digitised their local collection and necessary preservation methods are employed to preserve rare documents etc for future generations Migration to newer systems is being followed although the costs and technology are costly in doing so Time to time man power is utilised in libraries to check on the books etc and their storage capabilities are fumigated and cleaned and dusted. Now a days mostly storage is done in small open cupboards open on both sides which are easy to handle and well aired old material i sorted out and replaced by digital content.

3.8. Digital Library System

Digital Library System is also called an Online Library

Electronic Journals and other documents (2015) have provided information these include online public access catalogues circulation control serial control management information in library loans etc.Informatiion retrieval applications include document management system.On line search services the internet cd roms.In some systems the documents may be held in microfiche or print form ie on the pages of a newspaper catalogue or the other document. The journal is available as a microfiche and only the index is in electronic form search engines support retrieval and the internet a worldwide network of tele communication provides access to a number of computers and servers The CD-ROM is supplied with a search or information retrieval software so that information can be located from a database.

Internet is the open system with a range of open system standards it is a platform where many system with a range of open system standards it is a platform where many systems can communicate with a range of network.connected with various customers and specifically is useful in libbrary science.

2. The Digital Library System (DLS) is based on a defined system and provides all types of data collections in a library like OPAC etc. The digital library management system provides

the digital library system structure to produce and maintain a digital library.It helps in providing information services and presenting it in usable ways and in communicating with users.

Data Protection and Security

Librarians use the encryption method to protect the digital collection from theft or having un-authorised access to data from librarary back up plans and recovery plans are put in place to this effect with the help of digital tools when the collection in a library is digitised.

3.9. Projects on digitization by different institutions

3.9.1. The British Council Library

The British library has a wide range of services provide to national and international users through bibliographic services. One of its main task is to collect preserve and provide access to uks National published Archive. .The British library is the national library of u.k. and accesses digital material through its leading role in the U.k. Digital preservation coalition a community of interest groups which includes national govt archives libraries museums higher education and bodies representing the publishing and information technology communities (2004). The librarys's has the International Dunhang Project(IDP) which brings together on the web a collection of thousands of manuscripts and early printed material (2019).

3.9.2 The China Digital Library.

The term digital library in china has no unified understanding or defination.it varies with different situations and circumstances. In general digital libraries have presented themselves as two major aspects in chinease publications. One as a research and involved with computer specialists and content service providers who focus on Technology improvement on digitizing, organising, distributing, preserving and searching.

These are the most significant projects and programs.

Digital library research projects in National 863 program which was launched in March 1986 with the aim enhancing china's international competitiveness and improving china's overall capability of R& D in high Technology. and these 4 digital library related projects and initiated in863 programe 1998

31

1. Strategic Research on the development of chinease Digital Libraries

2. Multimedia information retrieval system

3. Knowledge network digital library system

chinease digital library application system on china advanced info optic NET (cainonet)(2019).

3.10   Conclusion

Digital libraries whether serving the uses across the globe or across a small campus, provide a quick and cost effective means to distribute learning resources to students or general user population with the ICT ie information communication Techologies a more advanced digital library can be built giving then wider access to the contents available in the world.

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Title: Digitization At National And International Level

4.1. Introduction:

Digital Libraries state local collection which are digitized in an electronic form and use those collections effectively so as to benefit the users and the researchers also who utilize library services.

Digitized collections offer capabilities beyond the traditional library. A digital library is a global virtual library of thousands of collections in an electronic form in libraries. Now in modern times India too is moving along with the world at large and makes along with the world at large and makes use of modern technology to digitize its collections so that the users have access to its resources and it uplifts the economy and education policies in par with the rest of the world.

4.1.1. Advances in Digitization at National level

The digital libraries were developed in India in the mid 1990's when information technology came into being on a large-scale internet was used for digital initiatives and information communication technology (ICTS) in adopted in the education section i.e. in schools, etc. It is more prominent in technology literacy and in every profession in modern times, ICT'S have great influence in teaching, learning research activities. The Indian govt has initiated a number of Advances in Digitization in libraries in India The Ministry of education launched the NDLI through the National mission on Education through Information Communication Technology (NMEICT) Project which is developed by the Indian institute of technology Kharagpur (IIT KGP) on 10th November 2006 and is available in 11 languages. It has about 20 lakh users as of January 2019 as per Wikipedia sources it is a virtual repository of learning resources with search browse facilities and has plenty of services for the learners. B S Kesavan was the first librarian at NDLI Calcutta. The resources are stored in a variety of electronic forms and are available for all the user community.

4.1.2. Functions of NDLI are

1) 1 content creation storage search and access retrieval and preservation

2) 2 It generates new of information resources

3) 3 New approaches to acquisition cataloging and classification are adopted

4) 4 An extensive use of electronic system and networks and electronic practices are used.

4.2.2 NDLI -services in library

1 It is a repository of digital information

2 It accepts all types of literary matter mostly in public domain

3 It shares data through networking

4 It has bibliographic

5 It is a center for cultural and technical heritage of the Indian nation

6 It provides electronic current awareness services (E-CAS)

The website of NDLI is http://ndli.iitkgp.ac.in

4.2.3 The Indira Gandhi National Center

For the arts (IGNCA) together with the Ministry of Communication and Information Technology brought out a digital library on indigenous cultural heritage named Kalasampada. Digital library resources of Indian cultural heritage (DL-RICH) for the development of a data bank of cultural heritage (2008) DL-RICH provides online access to digital images of cultural heritage resources such as manuscripts, rare photos rare books rare paintings sculptures handicrafts, monuments artifacts festivals, textual, graphical audio-visual and multimedia resources. The portal provides access to different types of collections with English interface and metadata scholars can gain access to 272000 manuscripts, 10000 slides thousands of rare books 4000 rare photos 400 hrs. Of audio and video etc., which are ever increasing in the recent years.

It received the golden Icon Award for Exemplary Implementation for E-governance initiatives under category Best Documented implementation and case study given by the Indian government Dept. of Administrative Reforms and Public Grievances in 2005.

Digital library under the Dept. of Science and Technology. Govt of indie was established in the year 1989. It maintains an Open Access Digital library and has a collection of full-text versions of scientific works. It publishes over 80 books in English over 49 books in Hindi and over 17 books in other languages. Audio–video scientific content in CD-ROM are available. Dream 2047 is a Bilingual Monthly Newsletter brought out by Vigyan Prasar and is a science magazine and open-access periodical. Vigyan Prasar Network of Science Clubs (VIPNET) was established in 1998 to strengthen the popular science movement in India participating institutions are the National Council for Science and Technology Communication (NCSTC) new Delhi NCSTC Network N Delhi National Children's Science Congress (2008) to name a few

Website site https:// vigyanprasar.gov.in>ab

Functions of Vigyan Prasar are

35

1) 1 to organize training programs to popularize science in urban and rural ruler areas.

2) 2 To bring out suitable literature and the monthly newsletter for VIPNET

NISCAIR Research Journal

http://nonprescription:IN/

NISCAIR has a repository of Online. Periodicals (NOPR) to preserve research journals, working papers, preprints, technical reports, conference papers and data sets in various digitization formats. The National science Digital Library (NSDL) was set up to help and provide information to students of science engineering and technology (2008) NSDL provides access to textbooks and lecture notes to UG students of science.

4.2.4 Shodh Ganga: The Indian Repository of Thesis and Dissertations.

This is a national repository of electronic thesis and dissertation and was launched by INFLIBNET c notification at 1-6.2009 mandated that electronic version of thesis and dissertations be submitted in electronic form. As of now with the expanding of Academic Institutions/Universities a total of 151 have signed with INFLIBNET Centre to join the Shodh Ganga project and deposit their theses. INFLIBNET center also maintains a repository of approved synopsis submitted by research scholars to the Universities registering themselves for the PHD program. Called Shodh Gangotri web site

http://shodhgangotri.inflibnet.ac.in

With an aim to better their research and avoid plagiarism and duplication shodhganga provides access to more than 11000 electronic theses and dissertations and received the e-India Jury choice Award for Best ICT Enabled Higher Education institute of the year 2011,

Shodh Gangotri provides access to more than 1712 synopsis (2008)

Website of Shodh Ganga

https://shodhganga.inflibnet.

4.2.5 GYANDOOT

Gyandoot is Digitization in library in the Dhar district in Madhya Pradesh DT Jan 1st 2000. It connects rural public cybercafés with a corresponding website of Gyandoot Intranet having global access via a portal. It is a unique form of G2C (Government of citizens) and has a vast clientele of millions rural citizens who use it to access various government and market-related needs through IT. Booths.

4.2.6 INDEST-AICTE Consortium (merged with e- Shodh Sindhu)

The Indian National digital library in engineering sciences and technology (INDEST) was set up by the Ministry of Human Resources Development. The consortium has an active mailing list and a web site at the IIT Delhi. The benefit of consortia-based subscription to electronic resources has extended to all AICTE accredited and UGC affiliate institutions. As of

now a total of 250 engineering colleges and institutions have joined INDEST and it is still going on

INDEST consortium has the AM digital library ASCE journals ASME journals etc. like ProQuest science direct springer's link etc.

Digitization in library consortium web site www.ugc.ac.in

It is a national initiative which provides access to scholarly electronic resources like full text and bibliographic databases in all subject disciplines in the universities and other academic institutions in India.

The National Library of India web site www.nationallibrary

This library in Kolkata is one of the oldest libraries of India.it is a permanent depository and houses books and printed matter of old and rare literary records. A project called 'down memory lane" to digitize and preserve its rare and brittle books was under taken in the late 1990s especially English books published prior to 1900 and Indian books before 1920. A total of 9901 books containing more than 25 million pages were scanned and archived in 548 CD. Rom before June 2001.

The National Library has a small holding of manuscripts representing important branches of knowledge (2004)

The Indian Institute of Technology

Web site http:// home-iitd.in

It was established in 1961 by the minister of scientific research and cultural affairs and was later decreed in the institutes of National importance. This institute has installed a fiber optics- based campus LAN connected to a 2 Mbps-SNIVEL in 1998 and radio link enabling faster internet access for its community. For the digitization of old books complete process which comprise of scanning with scanners cropping cleaning of images and using software for the OCR conversions of English documents format conversions and search engines have been developed with the modern technologies digitization of books and other documents on web can be done in about 2 hours tome without unbinding the book which proves that digitization of scholarly collections is done at a rapid pace and users can browse it at a ready and available time as per their convenience.

4.3. Information infrastructure and services in digital libraries

Most of the library and information centers of India have started using technologies in organizing their collections housekeeping operations retrieval and dissemination of information to the end uses. National agencies and networks like NICNET, INFLIBNET, and DELNET etc. have started developing and using databases of their holding NICNET and ERNET have made their services available to the academic as well as govt. sectors. Some of the metropolitan and city library networks like malibnet calibnet etc. have also been initiated and started functioning and providing on line services through these networks. The sharing of information at regional national and international global learning.

These libraries are equipped with the latest ICT gadgets using fully automated computerized library housekeeping operations and LIS for the end user's campus wide network

well connected to the Internet either by base line radio frequency or by broadband dial up connection and also having access to the digital or e-resources like a journal or database.

4.4 Problems in digitization of collection.

1. There is a lack of internet on the past of academic institutions and the absences of places of priorities are major hindrances. Also, there is an acute shortage of manpower to take up the task of digitization local collections and creating information repositories.

2. There is a need to retain the existing staff. Till the new staff. Learns the ropes of handling digitizing and preserving of collections which saves time. As such new staffs who are not conversant with the work of digitizing of collections may find it time consuming to do a single task and old staff can handle the work till digitization is done. This is a suggestion and the authorities can look into it.

3. Digitizing of collections is a digital divide. Access to digital libraries is dependent upon software requirement. As such people from or better of it social status are able to afford the expensive technology to meet their requirements whereas people from a little less strata financially find it difficult and so information and knowledge and not equally provide.

4. Lack of clear-cut policy at National level with main focus on sustainability which is the main concern for digitization of local collection several factors contribute to the overall energy and environmental costs of ICT in general and in Digital information systems and services.

Correct user research transaction log analysis etc. can reduce user time and environmental costs.

4.5 Conclusion

It is concluded thus Advanced Information and communication technologies has helped India to come in par with the rest of the word at national level. Digitizing of collection specifically with the use of modern technology like rare documents journals publications has helped the library user to access matter which was not available traditionally but has now been digitized for posterity for researches and students who do their theses/ dissertations library studies especially in specialized subjects' matter can be accessed electronically. Higher education institutes have also been benefited in India from digitization of collections at all libraries at National level.

4.6 Advances in Digitization at International level

The growth of Digital libraries initiatives in various countries is a step towards making the dream come true of global information society governments and non-government organizations are now investing on library project s with a view to meeting the needs of their communities. The design and implementation of Digital library initiatives change and each project is so designed meet to needs with regards to information needs of their community.

4.6.1. World Digital Library.

World Digital Library (WDL)

World Digital Library is a collaborative project of the United States Library of Congress UNESCO and partners in the world. *WDL* (2004). International and inter cultural understanding was expanded with the availability of resources for educators, scholars and general audiences. The WDL makes availability on the Internet and free of charge and in multilingual format significant primary materials from countries and culture around the world which include manuscripts rare books. Prints photos from collections. Each item contains a full and through descriptions link to similar items that are within the collections. The WDL homepage (http://www.wdl.org/en) is a new design technique that can be viewed completely on one page. The user does not have to scroll up or down to view all items. The webpage also provides the user with browsing options to search the content/collection by place time topic types of items and contributing institutions navigational tools and content descriptions which are in Arabic- Chinese English- French Portuguese Russian and Spanish languages. In the actual books manuscripts maps, photos, many more languages are represented.

4.6.2. Functions of World digital library

1. Access to digital content of WDL is made easy with consistent use of metadata that describes each item using a consistent set of bibliographic metadata relating to its geographical temporal and to find requirements.

2. Consistent Meta data provides the foundation for a site that is easy and interesting to explore. This helps in revealing connections between items.

39

4.6.3 Europeana caters to the scholarly needs of the European countries and features content from various foreign countries of the European Union website http://www.europeana.en/portal/.

Europeana is designed with strong user interface from EU. Languages and authorized users have free access to the collections of access apply. This library was launched in the year 2004. By the conference of European National librarians (CENL) and was later termed as Europeana disseminated is data in different ways to provide a cultural heritage which was financially promoted by the European commission TEL (the European library). Now European continues to work with National libraries to make sure their digital collections are well represented. Digital collections are well represented. Digital data was migrated to Europeans Application programming interface before the closure of. The European library (TEL). A Meta data standard called Europeana semantic elements (ESE) was used to get into a single common standard and integrates into different types of digital content. A Meta data standard called Europeana data model is introduced to give users better information.

4.6.4 Harvard University Library Digitization or (LDI). This initiative was launched on July 1998 and was a five-year program to develop the university capacity to manage digital information with objective.

1. A technical infrastructure was created to digitize, acquire and archive digital collections in the library. Librarians were guided by specialists in the field on key issues in the digital environment.

2. Librarians and staff were provided with training in a wide range of technologies and digital materials to aid them in a wide range of technologies and digital materials to aid them in this process.

3. Librarians were guided by specialists in the field or key issues in the digital environment.

4. The Harvard University Library collects were integrated with the existing library structure so as to serve the users with the existing traditional collections along with digital resources.

5. The digital content in Harvard Library is managed by digital repository services that ensure the free availability of stored digital objects as well as cloud storage solution called Dura cloud is also used external preservation storage.

4.6.5   Africa Digital Library (ADL)

This library was developed in 1999 by the center for lifelong learning at Technician South Africa. As per (ADL 2012) this library was developed with resources for the use in academic institutions for the learners in AFRICA VIA THE INTERNET IN PARTNERSHIPS WITH THE Association of African universities and US commercial e- librarians firm (net library) the Africa digital library has a collection of over 8000 e-books and is available in African countries website http://www. Africandl.org.29/. This library is so designed so as to help the users to get digital content on one page and registering to use ADL within African continent is automatic.

4.6.6.   The Library of Congress

The Library of Congress is a federal institution in USA and is the USA'S oldest one. The collections were gathered during the world digital project as also those which were contributed by different organizations. It has started project called the American Memory database (AMD) which offers multimedia collections of digitized documents photos motion pictures and texts from the American historical collections of library of congress and other related institutions and has more than 7.5 million digital items from more than 100 historical collections

In addition to these libraries all countries have their own collections digitized and made available to users' researchers freely on line with the qualifies and educated library staff.

4.7 Characteristics of Libraries in developed and developing nation's world DL Europeana, Harward, Africa.

41

4.7.1 Table 1

Stream	Text images	Text images	Text images	Text images
	Audio/visual	Audio/visual	Audio/visual	Audio/visual
Services	General users and worldwide	Main user focus EU countries	Main user focus Harvard's community	Main users focus African countries
Scenarios	Multilingual search operations links to databases	Multilingual search operations links to database	Multiple search operations automated services etc.	Multiple search option off-line reader services
Structures	Consistent metadata external repository	Consisted metadata ESE external repository	Rich metadata Hollis internal repository & cloud Solutia as back ups	Rich metadata external repository
Spaces	Virtual environment rich interface	Virtual environment rich interface	Physical and virtual environment rich interface	Virtual environment rich interface

Table some common characteristics of libraries

Source: Book-Application of library sciences standard publishers India all books under one roof.

4.7.2 Table 2

Major digital library projects at National level

1	Digital libraries at national level
2	Vidhya Nidhi Digital library
3	ERNET
4	INFLIBNET
5	The Indira Gandhi National Centre
6	DIGITAL LIBRARY OF INDIA
7	LIBRARIAN'S DIGITAL LIBRARY
8	ELECTRONIC THESES AND DISSERTATION DL
9	NATIONAL LIBRARY OF INDIA
10	LIBRARY ETD

4.7.3 Table 3 Resources available in Digital Libraries

Sr no	Name of the Digital Library	Resources available in digital libraries
1	Digital Library of India	Books, collections, Journals-newspapers, Manuscripts
2	National Library of India	Collections in different languages-English and foreign languages etc.
3	Vidhya Nidhi Digital Library	Theses Database ETD collections of India etc.
4	ERNET Education and research Network	Journals Digital databases publication
5	Electronic Theses and Dissertation Digital Library	E- Theses and Dissertation Doctoral Theses MLISC Dissertation

43

4.7.4 Table 4 Services provided by Digital Libraries

Sr no	Name of the Digital Library	Services provided by Digital libraries
1	Digital Library of India	Book on loan Ref services etc.
2	National Library of India	Inter- library loan bibliography training guidance
3	INFLIB- NET	Document delivery Reprographic databases etc.
4	Vidhya Nidhi Digital library	Manuals tool kits for theses creation self-archiving publishing books
5	ERNET Education and Research Network	V.sat based links etc. connecting on internet

4.8 Conclusion

Digital Library Project Work over are focused in digitizing their various collection in all forms like manuscripts rare documents books etc. The level of development of digital libraries in developed Nations is high compared to the poor nation like Africa etc. which are still making efforts to digitize their vast collections funds and trained manpower is perhaps a great factor that hinders this progress.

Many collections are still in the print form. But despite the challenges the digested benefits cannot be overlooked. Modern technology is highly in use in developed nations which builds D L repository and Dl projects worldwide.

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5 Data Interpretation and Analysis

5.1 INTRODUCTION:

The study in question is "Digitization of Local Collection for Academic Pursuit: A case study of Central Library Goa. ".

Central Library has a vast collection of books, manuscripts, newspapers, rare and fragile collection, also theses and dissertations, journal articles, Konkani books etc. As such different types of users visit the library. The library personnel too have to cater to the needs of the clientele. Both the users and librarians have expressed their views.

A set of questionnaires were distributed among 25 users and 25 librarians. The data collected from the respondents is depicted in this chapter in tabular, graphical, statistical and percentage for

5.2.1 User Frequency of Library Digitized content

Table 1

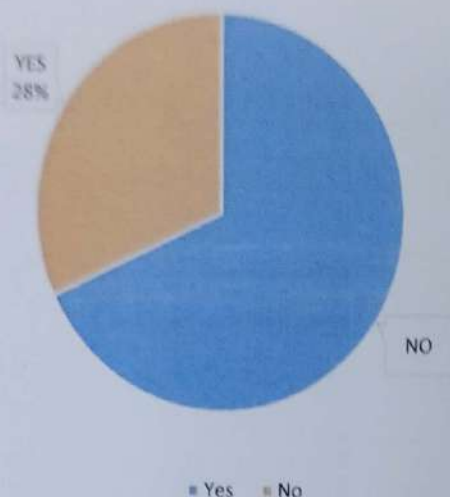| Sr. No.	Frequency of Library	No. of respondents		Percentage	
1.	Use	Yes	No	Yes	No
		7	18	28%	72%

The users were asked about their frequency of Library use and digitized content. Being students, they responded as follows Yes 7 (28%) and No 18 (72%). But overall, the digitized content was used by them even if not frequently. The pie charts no 1 is based on table no. 1.

Users like students are not frequent users of the library due to their busy schedule or studies.

5.2.1

Chart No. 1: Based on table No.1

Frequency of library use

YES
28%

NO

∎ Yes   ∎ No

The users in this case were students who frequented the library very few times ie 7 yes 28%

And 18 no. i.e. 72%. Being students they were not able to come frequently to the library due to their busy schedule.

5.2.2   Use of Library Catalogue

Table No. 2

| Sr. No.	Frequency of Library	No. of respondents		Percentage	
		Yes	No	Yes	No
2.	Catalogue used to find digitized content				
		15	10	60%	40%

The Library Catalogue is used mostly as it provides as easy way to locate books etc. for academic purpose to the users. They do not want to waste time searching the racks for books.

Bar graphs no 2 based on table no. 2 clearly show the use of the library catalogue and their preference.

5.2.1

Bar graphs No. 1: Based on table No. 2

Frequency of library catalogue use

Respondent
■ Yes ■ No
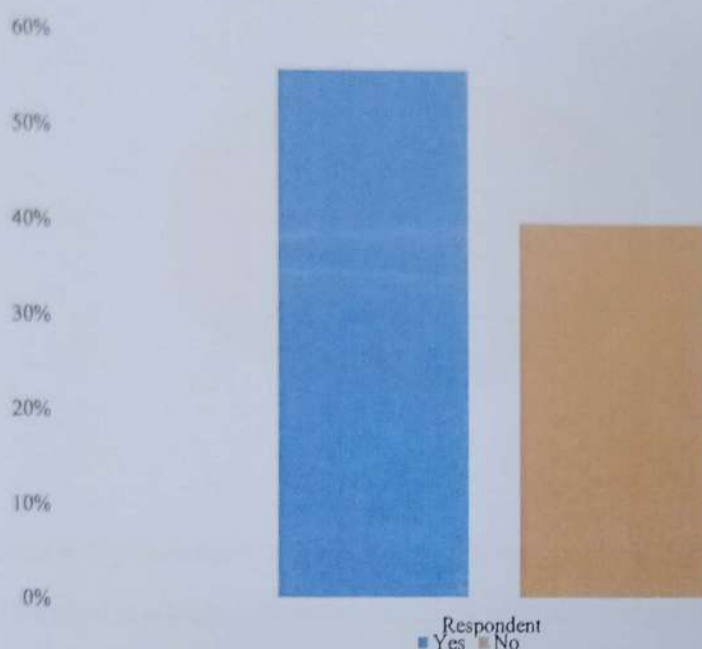
60% yes and 40% no.

This was most frequently used by the users as it saved time and the content was easy to find via the online catalogue in the library. Each section in the library had a computer where you could browse the required content.

A total of 60% were yes and the rest were no 40 %

5.2.3 Availability of original Documents

Table 3

Sr. No.	Availability of	No. of respondents		Percentage	
3.	Original documents of the digitized content	Yes	No	Yes	No
		13	12	52%	48%

Original documents are available despite digitization of the record. Racks and special cupboards house the original documents which are easily available.

5.2.3

Chart No. 2: Based on table No. 3

Availability of Original Documents
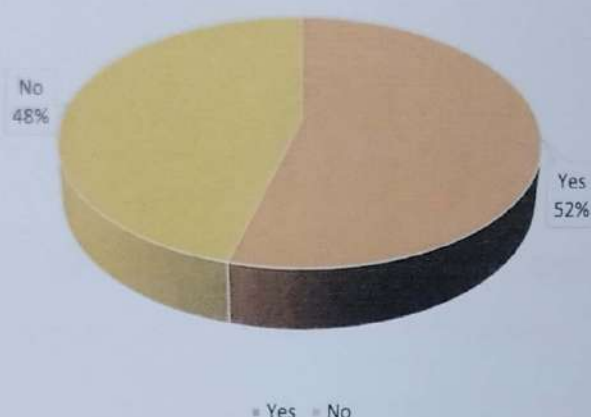
Despite digitization the original documents were available to the users. They were kept on Racks and in a special cupboard and the librarians too helped the users to find them. 52% said yes and no. were 48%.

5.2.4 Digital Resources Available

Table 4

Sr.	No. of respondent's percentage			
No	Researchers			
4	Yes	No	Yes	No
	1	2	4%	8%
	Student			
	Yes	No	Yes	No
	17	5	68%	20%
	Historians	nil	nil	nil
	nil	nil	nil	nil

Researcher had given the reply as yes 1(4%). 2 {8%} The other users who were students 17 (68%) as Yes, and 5(20%) as No. Historians were not found in the library on the day the questionnaires were distributed. Computers with different websites subscribed by the library provide an easy access online. The bar graphs on table no. 4 give the response from respondents.

49

5.2.4

Digital Resources Available

Bar graphs No. 2: Based on table No. 4
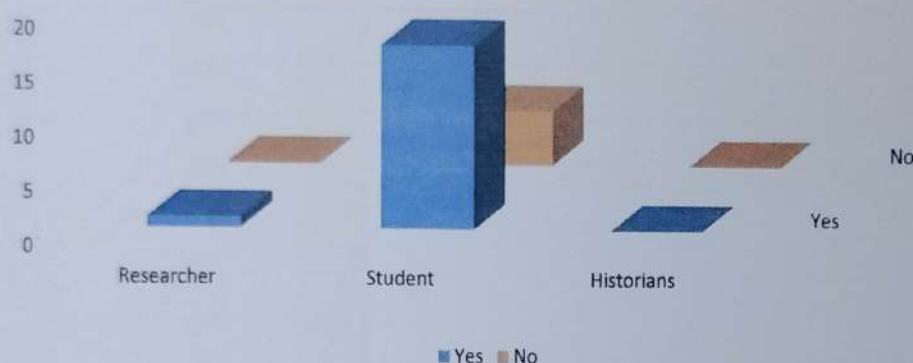
Digital resources were available to the users of the content which was digitized. All types of users like students, researchers and historians along with others frequented the library for their needs and were satisfied with the available resources in digitized content. Students 68% research

5.2.5 Prints of Pages

Table 5

Sr. No. 5	No. of Respondents		Percentage	
	Yes	No	Yes	No
	18	7	72%	28%

Most of the respondents i.e. 18(72%) have responded with affirmations that they were allowed to take prints, whereas the other 7(28%) have not responded well. Maybe they did not make the right approach or give their response etc. As the majority have responded with Yes, the library allows prints to be taken of pages. It is depicted in the graph no 5.

5.2.5

Prints of Pages

Bar Graph No. 3: Based on table No. 5
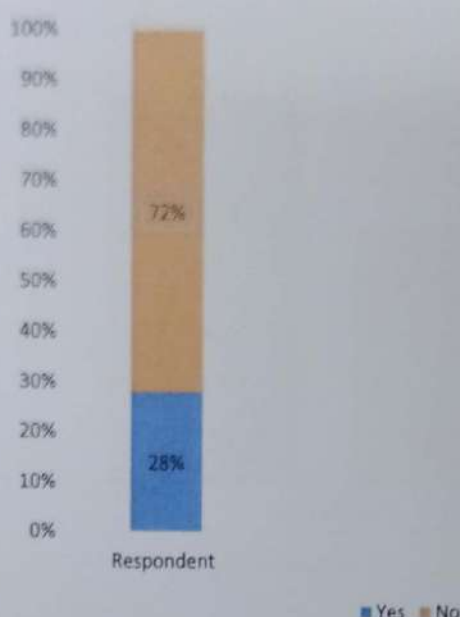
Most of the respondents responded with the affirmation that they were allowed to take prints Outs for a minimal fee. It was 72% yes and 28% no. The library had printers which were used Copy right material which was not allowed. The library has a vast collection of books which Cater to the needs of all types of users.

5.2.6 Trained Library Staff in Digitization

Table 6

Sr. No. 6	No. of Respondents		Percentage	
	Yes	No	Yes	No
	15	10	60%	40%

Most of the staff are trained and well versed to trace out the books and other references on the computer. As the collections are mostly digitized and on online mode all efforts are made so that it reaches to its cliental and fulfils their needs. This is evident from the respondents answer to this questionnaire.

Yes is 15(60%) and No is 10 (40 %). Bar graph no 6 based on this table clearly shows the respondents views.

51

5.2.6

Trained Library Staff in Digitization

Bar graph No. 4: Based on table No. 6

Respondents

■ Yes ■ No

The users found that most of the library staff were trained and well versed to trace out material
To be handed over to the users. The content was neatly arranged, sorted and preserved category
wise.

5.2.7 Time Saved in Browsing Content

Table 7

Sr. No. 7	No. of Respondents		Percentage	
	Yes	No	Yes	No
	25	nil	100%	nil

Browsing of digitized content saves precious time of the users specially researchers and
students who are time conscious in the present times. Vast matter can be browsed very easily
and from a variety of sites, Indian as well as foreign literature provides a very knowledgeable
experience when browsed from a digitized library sit.

5.2.8 System of Searching Large Volumes

Table 8

Sr. No.	No. of Respondents		Percentage	
8	Yes	No	Yes	No
	17	8	68%	32%

With the process of mass scale of digitization of collections, all types of collections are digitized and steps are taken to see that they are done by experts and trained personnel. As such any error arising is quickly rectified and also the Librarians involved are mostly well versed. This is proved by the users Yes 17(68%) and No 8(32%) The bar graph no. 7 is based on table no. 7.

5.2.5 Bar Graph No. 5: Based on table No. 8

Large Volumes of Text Searching
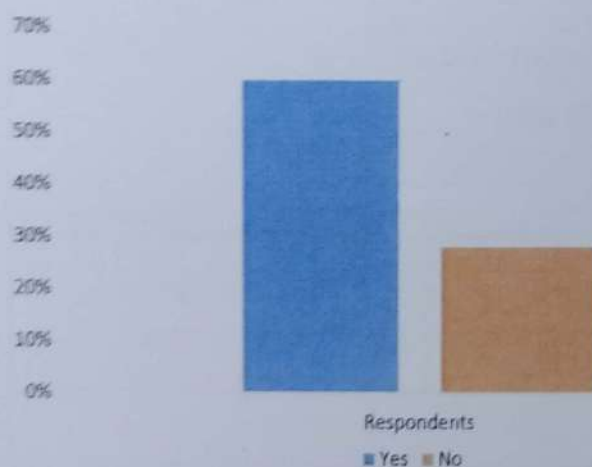
Respondents
■ Yes ■ No

Yes, it was easy to search large volumes of text via the computer systems. Lots of time was saved. Yes was 60% and no was 40%. May be the users did not find time to browse.

5.2.9 Systematic Storing of Content

Table 9

Sr. No.	No. of Respondents		Percentage	
9	Yes	No	Yes	No
	25	nil	100%	nil

When content is digitized, it is stored systematically in the system. Not like manual system and very little space is taken up since it stored electronically. The whole process is very well organised from analogy to digital form. Of course, the originals are also stored systematically but take up a lot of space in the library.

5.2.10 RFID Technology

Table 10

Sr. No.	No. of Respondents		Percentage	
10	Yes	No	Yes	No
	15	10	60%	40%

The Library has a drop box with RFLD Technology for those who come to the Library after close of Library hours. Only a few are aware of this, but yes, it is operative and the other users must not be aware of how it works, or otherwise. This is evident from Yes 15(60%) and No 10(40%). The bar graphs no 8 shows how RFID technology helps the users.

5.2.10 RFID Technology

Bar graph No. 6: Based on table No. 10
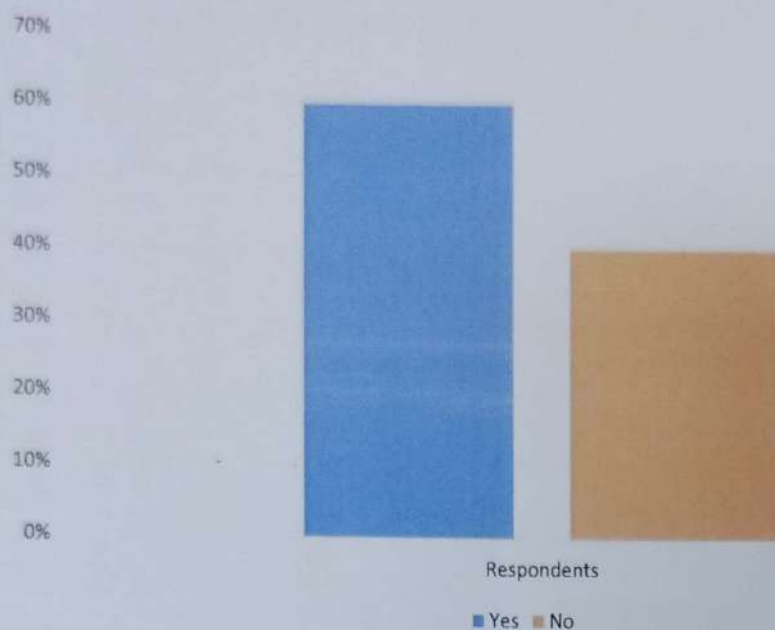
The Central Library has a drop box in the front portion of the library for users who come to return their books after close of library hours. A total of 15 respondents ie 60% said yes and 40% said no.

5.2.11 Digitized Books and Rare Documents

Table 11

Sr. No.	No. of Respondents		Percentage	
11	Yes	No	Yes	No
	23	2	92%	8%

The Krishnadas Shyama State Central Library has 9 vast collection of rare documents which are preserved and also digitized. These are helpful to historians, researchers and other users for their projects etc. Most of the users are aware of them and they are housed on a separate floor. The bar graphs no 6 based on table no. 11. Shows how the rare collections are helpful.

5.2.7

Digitized Books and Rare Documents

Bar graph No. 7: Based on table No. 11

90%
80%
70%
60%
50%
40%
30%
20%
10%
0%

Respondents

■ Yes ■ No
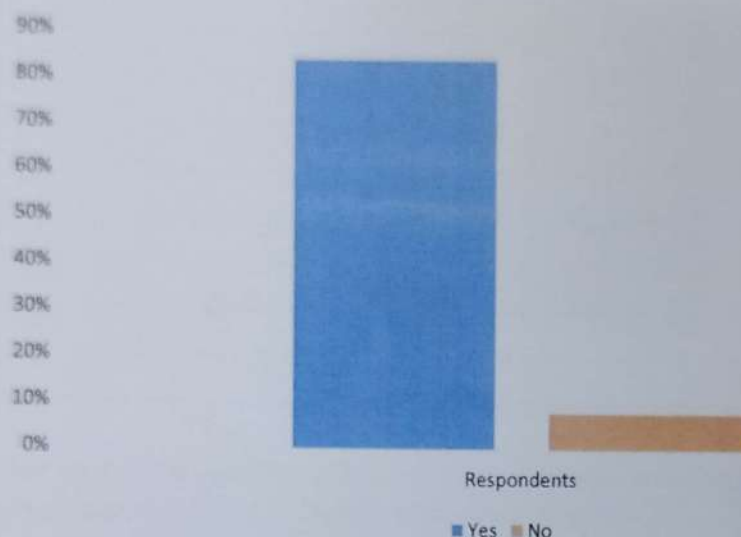
As per the user's profession the libraries digitized books and rare books are helpful to the users. The library has a collection of pre liberation and after liberation books and newspapers, manuscripts etc

5.2.12 Matter Browsed Via OPAC

Table 12

Sr. No. 12	As a scholar/ researcher/ user do you find digitized matter via OPAC easier	No. of Respondents		Percentage	
		Yes	No	Yes	No
		22	3	88%	12%

The Central Library OPAC system is very much helpful to all it users who can avail it 24x7, the place and time they are in. They do not have to visit library for their needs. Of course, in case of hard copies of literate, the library has the same in a vast number but that is available during library hours. A total of 22 (88%) said yes.

5.2.8. Chapter 12 Matter browsed via OPAC.

Bar graph no. based on Table no. 12

Chart Title
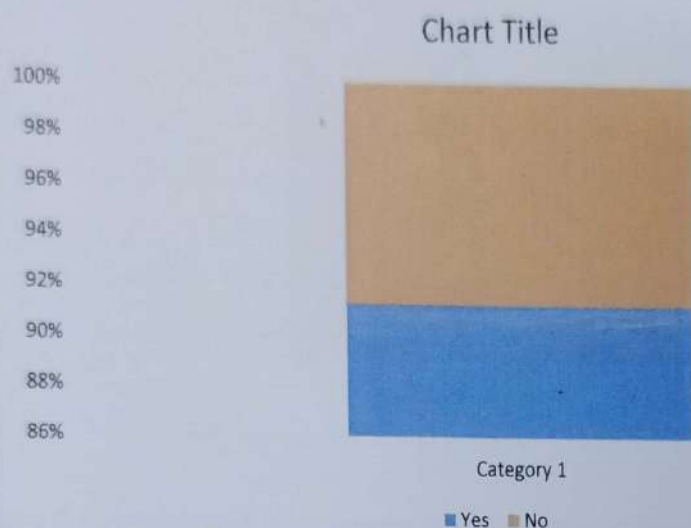
88%

said yes and 12% said no. OPAC the online catalogue in the library was found on each and every floor of the library. And the users could browse it.

5.2.13   LIS Seminar

Table 13

Sr. No. 13	Library has conducted LIS seminars 2017-2018-2023 etc helpful to users	No. of Respondents		Percentage	
		Yes	No	Yes	No
		20	5	80%	20%

The Central Library conducts LIS seminars wherein different topics are discussed, participants take part in them, thesis are written, etc. This is very helpful to the scholars, students, historians, researchers and others. Their papers are published in the Library and several LIS seminars books are stored where you can browse them in the Reference Section. 20(80 %) said Yes and a negligible 5 (20%) said No, which shows that a lot of users take part in them. The bar graph below no. 8 is based on this table.

5.2.13 Bar graph no 9 Based on Table 13

LIS Seminars
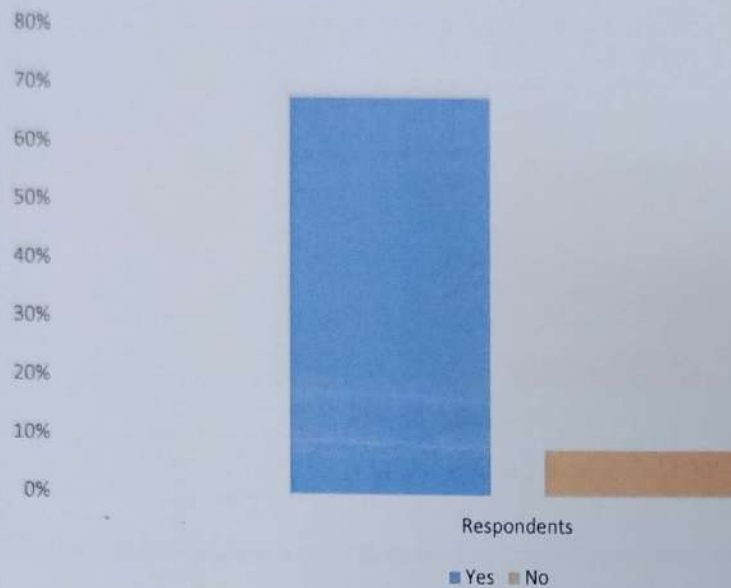
The library conducts LIS seminars where different topics are discussed. A copy of the same is Kept in the library for easy reference for those want to.

5.2.14 Konkani Literature

Table 14

Sr. No. 14	Is the Konkani literature in digitized form helpful	No. of Respondents		Percentage	
		Yes	No	Yes	No
		20	5	80%	20%

Konkani Literate section is devoted to Konkani Script in this library and is classified in Dewey Decimal Classifications 800-4. There are a variety of books, poems essays, short stories, which are written by Konkani Authors, including works which are translated. Students, Researchers, Historians ani Konkani lover of books flock to the library projects and ISAs for college and Higher Education students get a vast knowledge about our Konkani language and is helpful which shows the percent 20(80%) and 5 (20%). Everybody loves their mother tongue. The bar graph no. 9 is based on this information.

5.2.14

Bar graph No. 10: Based on table No. 14

Respondents

■ Yes ■ No
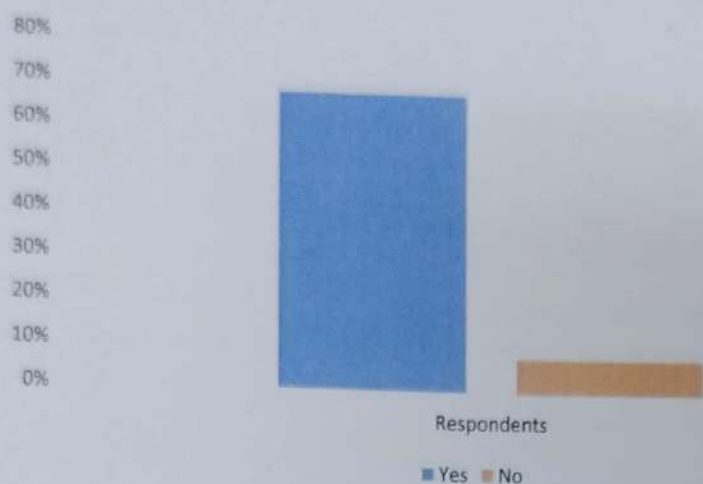
The Central Library has a section in the book lending section which houses the Konkani Section. There are a variety of Konkani books, poems, drama, katha etc. Most of the users can avail of the facility to take books home for easy reference etc. yes is 80% and no is 20%.

5.2.15 Table 15

Sr. No.	Your opinion about the digitized Krishnadas Shama State Central Library Goa	No. of Respondents	Respondents percent			
			Y	N	Y	N
15		25	14	11	56%	44

Users were asked whether they were satisfied with the services and digitized content available in the library yes was 56% and no was 44%.

About 14 /users gave their views about how technology. Also, the Server is mostly down. He was a researcher. Some said old newspapers must be digitised and it was not permitted to access hard copies. OPAC was very helpful and most of them found matter online easily.

Different books were found depending on the choices of users. Also, some felt the staff must also be updated with respect to new content.

OPAC was very helpful because it saved time for the users. You could find data in a fraction of a second. Library staff was well versed, trained and traced the books soon.

This type of digitized system must be installed in all libraries which will save the time of the users and librarians as well. Now a days technology is fast developing and ll prefer digitized content. Preserve endangered library resources. Improve the efficiency of information search mechanisms and access to library resources. Friendly staff and helpful to search. Easy to get and find the books.

59

Digitization of Central Library Goa

5.3.1   Table 1

Sr. No.	Central Library	No. of respondents		Percentage	
1	digitization	Yes	No	Yes	No
		23	2	92%	8%

The State Central Library is digitized but there are still many contents left to be digitized as per the say of one or two librarians. All efforts are being made to tally digitize the new content which is being added. At present as per the questionnaire reply recorded the librarians have stated it is 23 (92%) digitized while 2(8%) say there is some left. The pie chart below depicts the no of respondents who have given their reply.

Digitization of Central Library Goa

5.3.1   Chart 1 based on table   1
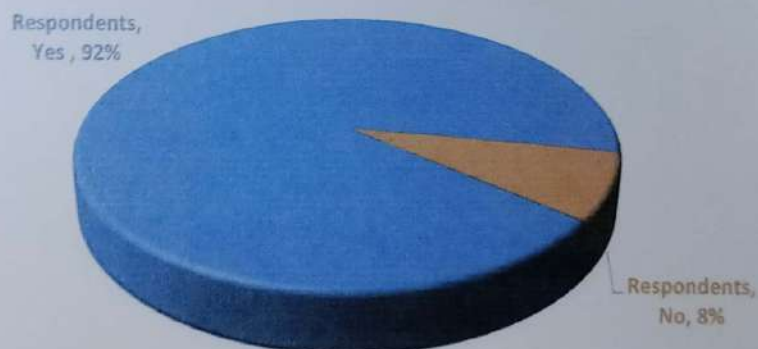
The librarians responded with a yes of 92% and 8% said that some content was yet to be digitized and would be done.

The library personnel, staff and technical experts actively participated in the whole process.

Steps involved in Digitization

5.3.2   Table 2

Sr. No.		Respondents		Percentage	
2	Scanning	Yes	No	Yes	No
		25	-	100%	
	Indexing	Yes	No	Yes	No
		21	4	84%	16%
	Storage	Yes	No	Yes	No
		16	9	64%	36%
	Retrieved	Yes	No	Yes	No
		11	4	44%	16%

Digitization of collection for preserving- storage- Retrieved- indexing- scanning has to be done on priority for analog to digital Library personnel and experts are involved in the process which has to be done first. It consumes a lot of time and is tedious and it also involves lot of expertise. The bar graph below denotes the yes and no. percentage with regards to the steps involved in digitization.

What is the Collection Digitized.

5.3.3   Table – 3

Sr. No	Respondents		Percentage	
3	Archives			
	Yes	No	Yes	No
	24	1	96%	4%
	Staff Articles			
	Yes	No	Yes	No
	24	1	96%	4%
	Newspapers			
	Yes	No	Yes	No
	24	1	96%	4%
	Policies			
	Yes	No	Yes	No
	nil	nil	nil	nil

The collection that is digitized as per the response from the librarians is Archives which is

Yes 96%. Then are staff articles yes 96% and newspaper articles which are 96%.

Rare documents and other articles of pre liberation period and also after liberation collection

Is digitized. But collections have been increasing every day and all efforts are made to digitize them.

Methods involved in Digitization.

5.3.4 Table no 4

Sr. No	Respondents		Percentage	
4	Manual Data Entry			
	Yes	No	Yes	No
	23	2%	92%	8%
	OCR	–	–	
	Yes	No	Yes	No
	–	–	–	–
	Pattern Recognition			
	Yes	No	Yes	No
	–	–	–	
	Documents Imaging			
	Yes	No	Yes	No
	23	2%	92%	8%

Digitization also involves a lot of process 1. Manual Data Entry OCR- Pattern Recognition

- Document Imaging. At present two processes are done as per the questionnaire reply in Manual Data Entry 23 (92%) and document Imaging 23 (92%).

**Total Collection of Digitization documents in pages**

5.3.5   Table 5

Sr. No.	No	Respondents		Percentage	
5	10000	Yes	No	Yes	No
		5	20	20%	80%
	50000	Yes	No	Yes	No
		3	22%	12%	88%
	1 Lakh	Yes	No	Yes	No
		1	24%	4%	96%
	More than	Yes	No	Yes	No
	1 Lakh	15	10%	60%	40%

As per the librarians say a total of above one lakh pages have been digitized. Apart from that it is noted that rare books and documents have been digitized. The librarians involved have given their views about the total collection of pages which are digitized. This is shown in the bar graph no. which is based on the subject.

Total collection of digitization documents in pages

5.3.   Bar graph 3   based on table 5
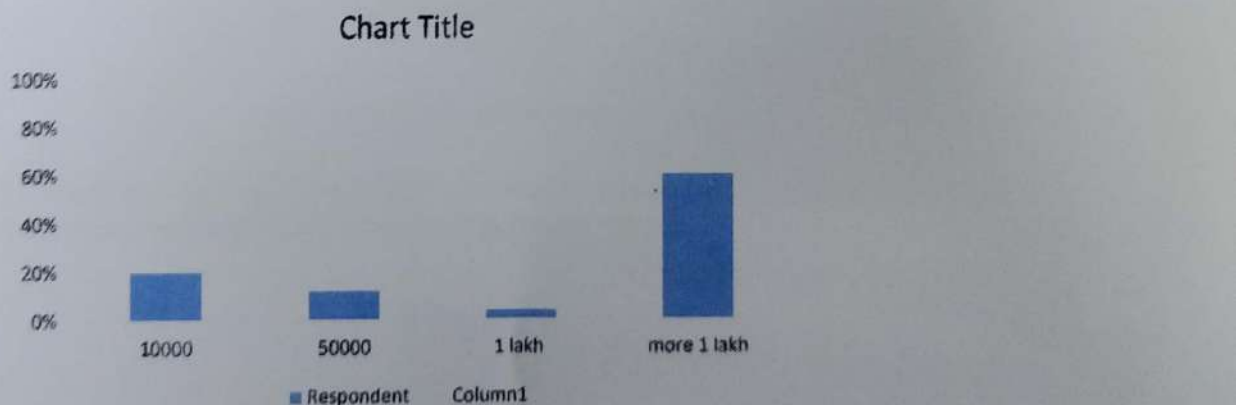
As per the librarians views a total of above one lakh pages have been digitized.
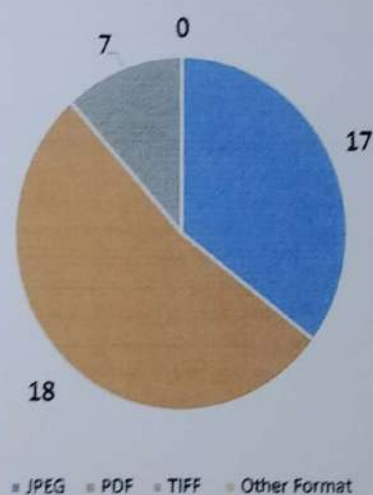
Types of Formats used for digitization

5.3.6   Table 6

Sr No.	Respondents			Percentage	
	JPEG	Yes	No	Yes	No
6		17	8	68%	32%
	PDF	Yes	No	Yes	No
		18	7	72%	28%
	TIFF	Yes	No	Yes	No
		7	18%	28%	72%
	OTHER	Yes	No	Yes	No
		nil	nil	nil	nil

Types of Formats used by Respondents

5.3.2   **Chart 2   based on table 6**

JPEG   PDF   TIFF   Other Format

Librarians were asked as to what format was used by them most. They replied it was PDF which was mostly used followed by JPEG and then it was TIFF.

Is the Central Library Goa a member of the National Digital Library

5.3.7   Table 7

Sr. No.	Respondents		Percentage	
7	Yes	No	Yes	No
	25	-	100%	

The National Digital Library houses a variety of Digital resources and in different disciplines and the Goa State Central Library is a member of the National Digital Library.

Storing of Original Documents

5.3.8   Table 8

Sr. No	Respondents		Percentage	
8	Yes	No	Yes	No
	25	-	100%	

The Central Library has presented its original documents even after digitization. Users can avail of the documents/ books from a rack and carefully preserved from a cupboard easily available in all sections.

5.3.9　　　Table 9

Sr. No	Respondents		Percentage	
9	Yes	No	Yes	No `
	19	6	76%	24%

Digitization involves a lot of processes and for it to be accurate the library staff have to be trained accordingly. As per the questionnaire the respondents were given training which shows Yes 19 (76%) and No 6(24%). This training was imparted along with the professionals in the technical field as per reports but it is not possible to format the same as per new technologies which are in force as years go on. The pie charts no 13 based on table no. 24 Shows how training to librarians is a must as local collection increases day by day.

Special Training in digitization techniques

5.3.3　　　Chart　3　　Based on Table 9
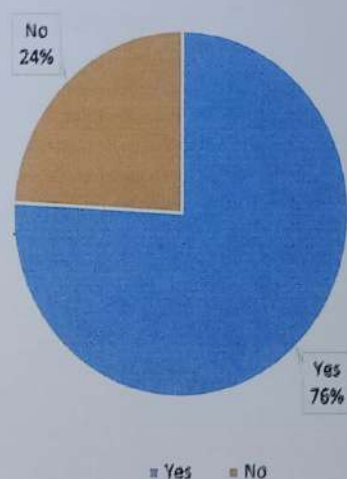
The librarians and the new entrants were given a special training in digitization with yes at 76%.

It is needed that all he staff of the library handling books whether in the reference section, lending section or other sections must be aware of the techniques of digitization of new content.

Sufficient staff

5.3.10 Table no 10

Sufficient Staff	Present Staff sufficient due to digitization	Respondent		Percentage	
10		Yes	No	Yes	No
		11	14	44%	56%

When materials are digitized, there is the possibility that staff may be curtailed as traditional method is discontinued and online method adopted. The Librarians were asked if the staff was curtailed Yes 11 (44%) and No 14 (56%). Pie chart which is shown on table no. 25

That even after digitization there is requirement of staff in the library.

Staff sufficient after digitization.

5.3.4 Chart no 4 Based on Table 10.
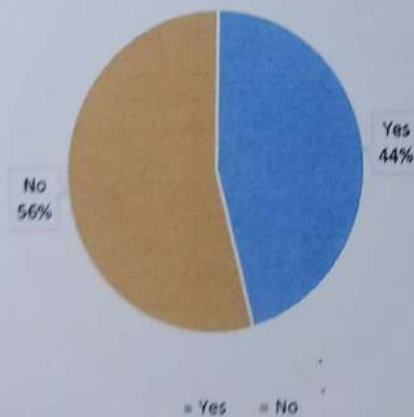
The Library has a variety of works wherein staff is required. S staff has not to be curtailed.
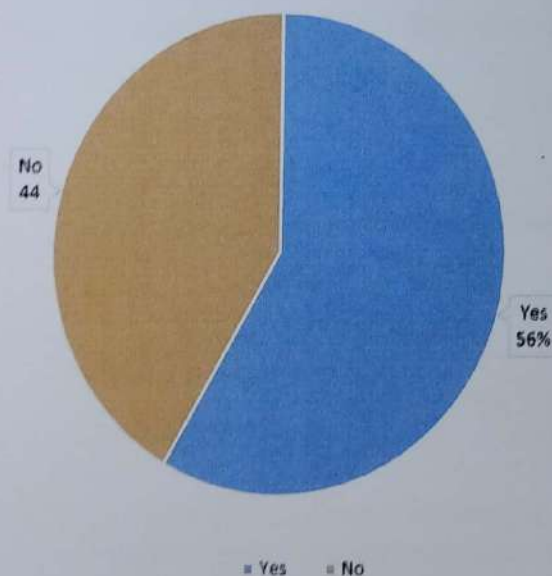
Digitized content made available to the users.

5.3.11   Table no 11

Digitized content made available to users.3.11 r. No.	Respondent		Percentage	
11	Yes	No	Yes	No
	14	11	56%	44%

The Library has uploaded the content on its website and it also subscribes to different websites wherein the user can make use of to get information online. This is possible when the user browses the net. Majority of the librarians said Yes 14 (56%) and No 11 (44%)

Content in digitized form available to users.

5.3.5   Chart 5   based on Table no 11

No
44

Yes
56%

▪ Yes   ▪ No

The digitized content is made available to the users in the library via online catalogue OPAC.

Foreign Literature available to users

5.3.12   Table 12

Sr. No.	Respondents		Percentage	
12	Yes	No	Yes	No
	12	13	48%	52%

When the system is online it is possible that foreign web sites are also subscribed.

Maintenance of Digitized Service

5.3.13   Table 13

Sr. No.	Who maintains the digitized services Library staff Computer Professionals	Respondents		Percentage	
13		Yes	No	Yes	No
		23	2	92%	8%

The library services since digitization are maintained by library staff 23(92%) and only 2(8%) say the same is maintained by computer professionals.

Hence the library staff need to be trained in this matter as technical aspects are to be looked by technical experts.

Do the Users pay for digitized content

5.3.14   Table 14

Sr. No.	Do the users pay to use the digitized content	Respondents		Percentage	
14		Yes	No	Yes	No
		17	8	68%	32%

The digitized content is uploaded on computers but sometimes users require a printout/ or to download or browse the matter in the computer section. As such there is a fee for all these transactions which is very minimal.

5.3.15. Table No 15

Easy Reference books available

Sr. No.	Does the library maintain books for easy reference to search digitized literature	Respondents		Percentage	
		Yes	No	Yes	No
15		25	-	100%	-

Despite digitization there are manual books- the matter which is uploaded on the net and at times it is necessary to search the matter manually/ references. The library maintains two or three books to refer where the contents are found.

Satisfaction of webs-based services

5.3.16   Table 16

Sr. No.	Are the readers satisfied with the webs-based service	Respondents		Percentage	
		Yes	No	Yes	No
16		25	nil	100%	nil

The librarians have replied that the users in the library are fully satisfied with the online services they get from the digitized library whatever they require they find online except for a few literatures which they can find manually.

Overall, there is quick search and no time is wasted.

Yes is (100%).

Subscription to different free websites

5.3.17   Table 17

Sr. No.	Does the library subscribe to different websites for users to browse	Respondents		Percentage	
		Yes	No	Yes	No
17		22	3	88%	12%

In the computer section a user/ researcher/ and others can browse the different free websites subscribed to and pay a very minimal fee. Also, using OPAC they can browse as they find as per their convenience.

Is the process time consuming for Librarians

5.3.18   Table 18

Sr. No.	Digitization distribution and retrieved of content Time consuming	Respondents		Percentage	
		Yes	No	Yes	No
18		18	7	72%	28%

The Librarians found the whole process time consuming. Maybe they did not have the technical know-how or were not trained when it was digitized

Suggestions

Table no 19

Sr. No.   Any suggestions to improve the overall digitization process as per the latest

19   technologies.

	Respondents		Percentage.	
	Yes	No	Yes	No
	9	16	36%	64%

The librarians have given their views about the digitization which is an ongoing process, in the Central Library Goa. More trained staff like I. T professionals are required   for the digitization process. Digitization is a new concept in the field of

Library Science and so advanced technology is a must with the changing times.

The users like students, researchers' historians prefer faster mode of online content availability.

CHAPTER- VI

FINDINGS, SUGESSTIONS AND CONCLUSION

6.1 INTRODUCTION:

Findings based on the users and librarians' response to the questionnaires and the suggestions given is depicted in this chapter.

Each respondent has given valuable findings which can lead to the over all improvement of the services provided as well as the satisfaction they have received with the digital library and the digitised content which can be browsed online via the library OPAC catalogue.

Researchers, users, historians find it useful in their respective studies as the library has subscribed to various web sites.

Over all the Central Library has maintained good services.

Finding as per the users' response

1. As per question most of the users were not frequently using the digitized content. Maybe they did not find the time to do so or maybe they were not aware of the digitized library.

2. The users who visit the different sections in the library will find the online catalogue website near the computer (https://scl.goa.in/opac) to trace out books etc

3. The original documents are preserved and made available. Special cupboards and racks house these records. even when content is digitised.

4. Availability of digitized content for all types of users. The answer is affirmative be it students -historians – researchers.

5. Were they allowed to take print and the answer was yes. Also download to WAN / LAN could be done with the library charging a minimal fee.

6. Trained library staff and very helpful to help the users to trace content whether personally from racks or the computer.

7. Was time saved in browsing-yes it was quick and accurate and very easily found as the entire details like book cataloguing was done and digitized as per the required books etc

8. Large volume searched. The library has an accurate system even searching large volumes of works on the website / computer

9. Systematic storing of matter and the occupation of less space is possible with digitisation. And this has helped the library to manage and use their content

10. The library has RFID Dropbox at the front portion which the users are made aware of and can use at the close of library hours.

11. Rare books and different sections have mostly digitized their content and made it available to users.

12. Matter browsed via OPAC whether you are a historian-researcher- student or other user and it is affirmed that it is done so and very helpful.

13. Seminars conducted like LIS 2017 -2018 -2022 etc. are very helpful to those who attended them.

14. Konkani literature is housed in a section in the reference section and you can browse find and take books home for reference. It is very useful and most used by all types of users.

15. Response of users'.

Users were asked whether they were satisfied with the services and digitized content available in the Central Library and the majority of them responded with yes 56%. No. was 44%.

About 14 users gave their views about how technology is working, Also a researcher said most of the times the Server was down

Suggestions

1. As the publications/ local collections are increasing day by day and the need of the user is moving in the direction of digitisation of content and availability online.

2. There is need to provide training for librarians to move towards new methods of digitisation. The new methods of technology and computer professionals must be at hand to help out with the problems faced by users.

3. Modern times bring out newer technology and with the faster space the users' want to browse in the OPAC system at the place where they are, as such the electronic system maybe kept updated

4. Librarians specially the younger generation are computer savvy and they must be trained to develop a policy for selecting content on priority for digitisation.

5. Also operating staff must prioritize what is to be digitised first and how to preserve the content.

6. The librarians of course have a knowledge as to what matter is frequently used and suggestions are to be made to procure and subscribe to the same so that more users' researchers, historians and others frequent the library.

7. OPAC is a good website the library provides for online searching and as we have seen it must be updated regularly so that other libraries follow in the footsteps of this Central Library.

8. The State Government Department of Art and Culture makes all possible efforts to provide staff but funds and new technology must also be provided for the upkeep of the library.

9. The overall efforts by the staff, users and the other library personnel have of course paid off. The library can now boast of a collection of various categories and cater to the needs of children, braille section, lending section, reference section, RFID Dropbox seminars conducted etc

Conclusion

1. There is need to develop the digital content and also add the new and latest local content to its collection.

2. Library professionals must be well trained and updated to promote our Konkani literature and the writers, poets and others must be encouraged.

3. The application of the ICT is very encouraging in accessing the change of needs of the user and updating the latest information on the net. ICT has changed the very concept of librarianship as it concerns electronic selection and uploading of content as such trained personnel are needed for the purpose

4. Digital library is an organised collection of digitized material accessible from a computer over a network. Most of the new information created in modern times is in the digital form and has to be conversed to formats appropriate to Digital Library.

5. Digitisation projects have been important for libraries. The digitisation of manuscripts, theses, dissertations, special collections are a priority.

6. For any Institution digitisation is the need of the hour. Every library should follow in the food steps of the State Central Library Goa and digitize their collection and make every effort to make the same known to all

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TITLE: - DIGITIZATION OF LOCAL COLLECTION FOR ACADEMIC PURSUIT: A CASE STUDY OF CENTRAL LIBRARY GOA

INTRODUCTION:

Digitization is the trend, which is employed by libraries to preserve documents, and make the information available to the researchers and users with the help of Information Technology.

Libraries are now digitizing their local collection for academic pursuit via electronic media such as the World Wide Web, internet and other available technologies.

Rare documents are also being preserved and stored for users and researchers and the academicians and historians frequenting the library in their quest for knowledge.

The Central Library Goa has a vast collection of local content of books and journals in Portuguese, French, Latin, English and a lesser collection of Konkani and Marathi of the 16th and 17th century.

Besides the library has a collection of 167 pre-liberation bound newspapers and journals published in Goa. Manuscripts, Chronical and Imprints on the history and culture of Goa including Indo-Portuguese history bound volumes of local journals and newspapers and books received under the Press and Registration of Books Act 1867. It has also the rarest of the rare book published since 1539.

The total pre-liberation collection was in thousands of volumes. These works were written by European Missionaries in Portuguese and Roman script was used for local languages like Konkani and Marathi.

Imprints and Manuscripts contained church teachings of the Portuguese era. Some were in Tamil language of the 18th century. Kristha Purana written in1616 originally was also updated. Official Gazettes period 1838 to 1878 were also preserved.

Chronicles about the history of facts and events were also found. The author of the chronical was appointed the Keeper of the Goa Archives in 1631.

Apart from the pre-liberation period collection the Central Library also has a collection of the literature content after-liberation period till date. This consists of books, periodicals, newspapers, by local authors and writers which depict the life, culture, education, sports, religious festivals, etc. of Goan people. With modern technology the collection has increased to children's books, reference books, on local happenings, magazines, maps, globes, gazettes braille booksetc. The Art and Culture Dept of Goa gives a boost in this field.

In the post-liberation period, the library also has a vast collection of books in English, Hindi, Marathi Portuguese and Konkani. Which can be obtained in a digitized format. and accessed via the internet. even at odd hours via the library web site. The collections are now included to the various sections like children's section, reference and lending section computer section CD-ROM-DVD official gazettes Braile books etc. which r frequently used by all library users at leisure for academic purpose and otherwise.

REVIEW OF LITERATURE

Smith, Abby (2008). Highlights libraries have been digitizing collections of rare, special and general category content and making them online. Her collective experience has produced a depth of technical expertise and a set of tested practices.

Lewis, David; W. (2013) Describes the existence of worldwide communications network that increasingly makes documents easily and freely available and require a transformation of academic Library data collecting practice.

Melissa, M, Terras (2016) highlights the rise of digitization. Process for academic use.

https://doi.org/10.1007/978-94-6091-299-3 _1.

OBJECTIVE OF THE STUDY

1. To study the process of digitization of local collection and benefits and to its different users in central library and researchers.
2. To study the modalities to provide effective and efficient collections storage, organization and retrieval of digital information and preservation of rare documents.
3. To examine the infrastructural facilities required for the digital information system to make data more structured, more organized and easily accessible to users.

SCOPE OF THE STUDY

Libraries assemble very quantities of academic and other scholarly material. The local collections have to be archived dispensed to users and bibliographed into catalogues and so have to be digitized.

The actual needs of users have to be accessed so that the library staff can provide good services to the users via electronic/digital means.

HYPOTHESIS

1. Technology adopted in central library is in its current state of development and is not adequate for digitizing the collections.
2. The whole process of digitization lacks proper guidance.

LIMITATIONS OF THE STUDY

The study is limited to the users/researchers and other academicians from Central Library. with focus on new digital resources and skilled personnel for the digitization of local collections, so as to remain relevant in the present digital environment.

RESEARCH METHDOLOGY

1. The researcher has browsed all the literature available on the topic.
2. Further the researcher has visited different portals involved in digitization
3. Researcher has tried to discuss the issues of digitization with experts and working Professionals.
4. Further the researcher had prepared a detailed questionnaire and was distributed among all stakeholders to know the topic in depth.

90

5. Further the researchers had used all the statistical techniques and graphs and charts to conclude the topic with clear and precise interpretation.

POULATION OF THE STUDY

For the digitization of local collections in Central Library Goa skilled personnel having knowledge in the various fields of digitization were engaged like data imaging experts, scanning, preservation technicians and others in the field. Staff were employed for the various jobs on priority.

In the topic Digitization of local collections in a library one will be a set of users and the other the library personnel who are involved in the process. Using man power and technology will improve further projects at a faster pace along with modern technology. There is the view that other academic libraries will benefit from this project.

ORGANISATION OF THE STUDY

1. Chapter: Introduction

2. Chapter: Review of Literature

3. Chapter: Digitization in Libraries

4. chapter 4: Advances in Digitization at National and International level

5 Chapter5: Data Analysis and Interpretation

6. chapter 6: Observation findings suggestions and conclusion

CONCLUSION:

Digitization of local collection for Academic Pursuit will aid the user/researcher/ and academicians greatly. With new trends in technology and availability of local collections literature in digitized form the culture and history of Goa during the pre-liberation period will be made known to the literary world by the academicians.

Rare documents. journals, books imprints, manuscripts and others of pre liberation period of Goa will be available in digitized form and the originals preserved for posterity.

The Central Library has a section for rare books, manuscripts, codices imprints newspapers and journals published in Goa during the pre-liberation period dating from 17th and 18th century.

Apart from this collection the library has local collection mostly in digitized format which is housed in the various sections in the library as well as computers are available for use with access to different websites. The library has a well-trained staff as of recent times.

REFERANCES

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From

Anuja Halarnekar

Student of MLISC

Goa University

Taleigao Plateau -Goa

Date:

To,

_____

_____

_____

Sub: Questionnaire to Users'........reg

Sir/ Madam,

Kindly find enclosed herewith the questionnaire regarding my topic "Digitisation of Local Collection for Academic Pursuit: A case study of Central Library Goa." Under the guidance of Dr Carlos M. Fernandes Goa University, Taleigao Plateau Goa.

The Impact of Digitisation is vast in a library wherein library services can be improved with speedy access and retrieval of digitised matter to the users.

New technology and ideas can be implemented to improve the present local content digitised. Hence with response to the various questionnaire this will make it possible.

The information given by you will be used academic purpose only.

Thanking you and awaiting your kind co-operation and response.

Yours faithfully

(Anuja Halarnekar)
(9673080927)

94

QUESTIONNAIRE FOR USERS'

Please tick wherever required.

NAME:
Occupation:
Service/Profession/student

1. Are you a frequent user of the digitized content of Central Library?
Yes ☐

No ☐

2. Do you use the Library catalogue to find digitized matter?
Yes ☐

No ☐

3. Are the original documents available of the digitized content?
Yes ☐

No ☐

4. Are the digital resources available as per your requirement?
Researcher   Yes ☐   No ☐
Student   Yes ☐   No ☐
Historians   Yes ☐   No ☐

5. Are you allowed to take prints of pages?

Yes ☐

No ☐

6. Is the Library Staff trained and well versed to trace digitized matter?
Yes ☐

No ☐

7. Does browsing digitized content save time?

Yes ☐

No ☐

8. Digital Library has an accurate system of searching large volumes of text- Do you agree? (Please Tick)

Yes ☐

No ☐

9. Digitization allows systematic storing of matter?

Yes ☐

No ☐

10. In case of close of Library hours is there a drop box with RFID Technology?

Yes ☐

No ☐

11. With reference to your profession are the different sections of digitized books/rare documents helpful to you?

Yes ☐

No ☐

12. As a Scholar/Researcher/User do you find digitized matter via OPAC in the computer Section?

Yes ☐

No ☐

13. Library has conducted seminars like LIS 2017-2018-2022. Are they helpful.

Yes ☐

No ☐

14. Library has Konkani Literature Digitized, is it helpful to you

Yes ☐

No ☐

15. Your opinion about the digitised Krishnadas Shama State Central Library Goa.

_____

_____

_____

_____

From

Anuja Halarnekar

Student of MLISC

GOA University

Taleigao Plateau- Goa

Date:

To,

_____

_____

_____

Sub: Questionnaire for Librarians'.......reg

Sir/ Madam

Kindly find enclosed herewith the questionnaire regarding my topic "Digitisation of Local collection for Academic Pursuit: A case study of Central Library Goa Panaji Goa.

The Krishnadas Shama Central Library Goa has digitised its local collection so as to make it available to its users. But there are now new technologies available and also the staff has to be trained so as to make the collection available at a faster pace and so your valuable suggestion are required to achieve this.

It is requested that your valuable time may be spared to fill this questionnaire. The information will be for academic purpose.

Thanking you and awaiting your kind response.

Yours Faithfully

(Anuja Halarnekar)

9673080927

98

QUESTIONNAIRE FOR LIBRARIANS'

Please tick wherever required.

NAME
DESIGNATION:
SERVICE
TENURE

1. Is the Central Library Digitized and digital content available to users.

Yes [ ]

No [ ]

2. State the four steps in the process of digitization done.

a. Scanning   Yes [ ] . No [ ]
b. Indexing   Yes [ ]   No [ ]
c. Storage   Yes [ ]   No [ ]
d. Retrieval Yes [ ]   No [ ]

3. In brief, name the Local Collection digitized.

a. Archives   Yes [ ]   [ ]
b. Staff articles Yes   [ ]
c. Newspapers   Yes   [ ]
d. Policies   Yes   [ ]
e. Other State
   the content

4. Methods in digitization used.

a. Manual Data Entry-Scanning   Yes [ ] No [ ]
b. Optical Character Recognition   Yes [ ] No [ ]
c. Pattern Recognition Technologies Yes [ ] No [ ]
d. Document Imaging   Yes [ ] No [ ]

5. Total collection of Digitisation documents in pages?

10,000 [ ]   1 lakh [ ]

50,000 [ ]   More than lakhs [ ]

6. Type of formats used for Digitisation process

JPEG [ ]   PDF [ ]
Other [ ]   TIFF [ ]

99

7. Is the Central Library a member of the National Digital Library?

Yes ☐

No ☐

8. How are the original documents stored, and made available to users?

In a special Cupboard   Yes ☐   No ☐

9. Is special training in digitization given to the staff and new entrants?

Yes ☐

No ☐

10. As the Central Library is digitized is the present staff sufficient?

Yes ☐

No ☐

11. Is the Digitized content made available to the users on the library website.

Yes ☐

No ☐

12. Is foreign Literature made available to the users in this digital library?

Yes ☐

No ☐

13. Who maintains the Digitised Services? (please Tick)

-
a. Library staff ☐
b. Computer Professionals ☐

14. Do the Users have to pay to use the Digitised material?

Yes ☐
No ☐

15. Does the Library maintain books/for easy reference to search digitized Literature like Kurpane/Sasal etc?

Yes ☐

No ☐

16. Are the readers satisfied with the web-based services provided in the digital Library?

Yes ☐

No ☐

17. Does the Library subscribe to different free websites for users to browse digitized content from other libraries?

Yes ☐

No ☐

18. Does the Librarian find digitization and distribution and retrieval of content time consuming?

Yes ☐

No ☐

19. Any suggestions to improve the overall digitization process as per the latest technology? (please specify)

_____

_____

_____