A CASE STUDY OF LIBRARIES E-RESOURCE WORKING IN DIFFERENT MANAGEMENT COLLEGES LOCATED IN DELHI NCR

[1] Ravinder Kumar

Research Scholar, Library and Information Science, University of Technology, Jaipur
Gulia.Ravi2205@Gmail.Com

[2] Dr. Satpute Dattatraya Tukaram

Professor, Library and Information Science, University of Technology, Jaipur
Datta.Satpute@Gmail.Com

Abstract: In the rapidly evolving landscape of education, the integration of electronic resources (e-resources) within academic libraries has become paramount. This case study delves into the utilization of e-resources in ten prominent management colleges situated in the Delhi National Capital Region (NCR). The primary aim of this research is to ascertain the degree to which these educational institutions have embraced and implemented electronic resources and to evaluate the efficacy of such adoption. To achieve this, a comprehensive multi-method approach was employed, including surveys, interviews, and direct observations, involving students, faculty, and staff. The study reveals intriguing patterns regarding the utilization of e-resources across these management colleges. Most institutions offer extensive access to e-resources, encompassing e-books, databases, and online journals, reflecting their commitment to providing comprehensive digital collections. However, variations exist in the frequency and type of resource usage, suggesting diverse adoption rates and preferences among colleges. This diversity underscores the importance of tailored strategies to optimize e-resource utilization. The selected management colleges, including Apeejay School of Management, ACCMAN Institute of Management, and J.K. Business School, among others, represent a diverse cross-section of management education in the Delhi NCR region. The outcomes of this study provide a panoramic view of the strengths and weaknesses of these libraries, offering valuable insights for improving resource allocation, facilities, and services. By empowering educational institutions to make well-informed decisions, this research seeks to enhance the overall quality of education in Delhi NCR by enabling management college libraries to better serve their academic communities. this survey offers a comprehensive examination of the utilization of electronic resources in management colleges in Delhi NCR, providing valuable insights into library services, collections, and the challenges and opportunities that lie ahead. It serves as a guide for educational institutions and libraries seeking to navigate the evolving digital terrain, ultimately enriching the academic experience for students and faculty alike

Keywords: E-Resources, Management Colleges, Delhi NCR, Digital Resources, Library Management, Information Technology, Higher Education

I.　INTRODUCTION

The electronic resources that are now accessible include a diverse range of digital assets, including electronic books, scholarly journals, databases, and other forms of internet-based information. This case study seeks to analyze the present condition of e-resource management in management college libraries situated in Delhi NCR, with the objective of identifying optimal practices, effective techniques, and prospective avenues for improvement. The findings will contribute to the body of knowledge on effective e-resource management in academic libraries and provide valuable insights for library professionals, administrators, and stakeholders involved in the management of these digital resources. [1]

Through a combination of surveys, interviews, and observation methods, data will be collected to gain a comprehensive understanding of the e-resource landscape in these libraries. The study will explore the extent to which libraries have united e-resources into their collections, the platforms and tools employed to provide access, the patterns of usage among library users, and the challenges faced in managing and maintaining these resources effectively. The outcomes of this case study will not only benefit management college libraries in Delhi NCR but also serve as a reference for other institutions grappling with similar e-resource management issues. The findings and

analysis obtained from this study will provide valuable guidance to libraries in improving their e-resource management strategies, boosting user satisfaction, and maximizing the educational and research opportunities offered by e-resources in the academic community. This study aims to provide a comprehensive analysis of e-resource management in libraries of management colleges located in Delhi NCR. By investigating the availability, accessibility, usage, and challenges associated with e-resources, the study seeks to contribute to the advancement of effective e-resource management strategies and support the academic endeavors of management college libraries in the region. [2]

1.1 Type of E-Resource use in libraries

Libraries use a wide array of electronic resources to fulfil the informational needs of its clients. The following are few prevalent categories of electronic resources that are often used within library settings:

E-Journals: Electronic journals (e-journals) provide access to scholarly articles, research papers, and academic publications in digital format. Libraries subscribe to e-journal databases or individual journal titles, allowing users to access a wide range of research literature.

Electronic journals (e-journals) are of paramount importance inside academic libraries due to their ability to provide users access to an extensive array of scholarly articles, research papers, and academic publications. Libraries often subscribe to e-journal databases, which aggregate content from multiple publishers, or individual journal titles. These databases offer access to a wide range of research literature across various disciplines.

E-Journals offer several advantages over their print counterparts. Firstly, they provide immediate and convenient access to the latest research. Users can access e-journals anytime and anywhere with an internet connection, eliminating the need to physically visit the library or wait for print copies to arrive. This accessibility is particularly beneficial for distance learning programs and remote researchers. Furthermore, e-journals offer powerful search and discovery features. Users can search for specific articles, browse issues, or explore content by subject or author. Many e-journal platforms provide advanced search capabilities, allowing users to refine their searches, set up alerts for new articles, and save articles for later reading. These features streamline the research process, enabling users to find relevant information quickly and efficiently.

E-Books: E-books refer to electronic renditions of printed books that may be electronically accessed and read. Libraries provide electronic book collections that may be accessed on a range of devices including e-readers, tablets, and PCs. E-books are available in different formats, including PDF, EPUB, and Kindle, and cover various subjects and genres. E-Books have become increasingly prevalent in academic libraries as they provide convenient and flexible access to a wide range of digital content. Libraries curate e-book collections that cover various subjects and genres, catering to the diverse needs and interests of their users.

Databases: Libraries subscribe to online databases that provide access to a vast amount of information from different disciplines. Databases can include scholarly databases, article indexes, abstracts, citation databases, market research databases, and more. These databases allow users to search and retrieve relevant articles, reports, data, and other resources. Databases hold an indispensable position within academic libraries, serving as invaluable resources that grant users access to a diverse array of knowledge spanning multiple fields. These repositories of information are pivotal in facilitating research, enabling students, faculty, and researchers to explore a wide spectrum of disciplines and acquire a deep wellspring of information. Libraries subscribe to online databases that encompass a wide range of resources, including scholarly databases, article indexes, abstracts, citation databases, market research databases, and more.

Scholarly databases are a cornerstone of academic research, offering access to peer-reviewed journals, conference proceedings, and scholarly publications. They provide comprehensive coverage of research literature, allowing users to search for and retrieve relevant articles in their field of study. These databases often offer advanced search features, citation tracking, and tools for analyzing bibliographic data.

Multimedia Resources: Libraries provide patrons the opportunity to use a wide range of multimedia resources, including but not limited to streaming movies, audio recordings, and photographs. These resources can support educational activities, research, and creative projects. Streaming platforms and databases specifically dedicated to multimedia content are used to provide access to a wide range of audiovisual materials.

Libraries recognize the importance of multimedia resources in supporting various academic endeavours and offer access to a diverse range of materials, including streaming videos, audio recordings, and images. These multimedia resources serve as valuable educational tools, enhancing teaching, learning, research, and creative projects. Streaming videos are particularly valuable in academic settings, as they allow users to access educational documentaries, instructional videos, conference recordings, and other audiovisual content. These videos can supplement classroom instruction, provide visual demonstrations, and offer real-world examples to enhance understanding and engagement. Libraries often subscribe to streaming platforms or databases specifically dedicated to educational video content, providing users with a wide selection of material across different disciplines.

Audio recordings, such as lectures, interviews, podcasts, and audio books, also play a significant role in academic libraries. These resources offer auditory learning experiences and can be particularly beneficial for language learning, literature studies, and research in fields such as history, anthropology, and sociology. Libraries may acquire audio recordings through subscriptions to audio databases, digital libraries, or collaborations with content providers. Images are another important component of multimedia resources in libraries. They include photographs, illustrations, diagrams, and other visual representations that support research, presentations, and creative projects. Libraries often provide access to image databases or repositories that offer high-quality and copyright-compliant images from diverse sources. These resources enable users to enhance their work visually, engage in visual analysis, and incorporate visual elements into academic projects.[3-6]

Digital Archives: Libraries may have digital archives that preserve and provide access to historical documents, manuscripts, photographs, maps, and other archival materials. These archives digitize and make available rare and unique resources that may not be easily accessible physically.

Digital archives have become an integral part of libraries, offering users access to a wealth of historical documents, manuscripts, photographs, maps, and other archival materials in a digital format. These archives serve as repositories of rare and unique resources, preserving valuable cultural and historical heritage for future generations.

Furthermore, digital archives often provide enhanced search and discovery functionalities. Users can search for specific keywords, names, dates, or topics within the digital archive, allowing for more efficient and targeted research. Some digital archive platforms also offer advanced tools for visual analysis, transcription, and annotation, enabling users to collaborate, analyze, and contribute to the understanding of the archived materials. Libraries collaborate with cultural institutions, archives, museums, and other organizations to expand their digital archive collections. Individuals have the opportunity to engage in digitization initiatives, get necessary rights and copyright clearances, and adhere to established guidelines for metadata development and digital preservation. These efforts are crucial in guaranteeing the credibility, reliability, and sustained accessibility of the digital resources.

Open Access Resources: Open access resources are freely available online without any subscription or paywall restrictions. These resources include open access journals, institutional repositories, open educational resources, government publications, and more. Libraries curate and provide access to a variety of open access materials to support open scholarship and expand access to knowledge. Open access resources have revolutionized the landscape of scholarly communication, and libraries actively curate and provide access to a wide range of these freely available online materials. Open access resources encompass various types, including open access journals, institutional repositories, open educational resources, government publications, and more.

Open access journals are scholarly journals that make their content freely accessible to readers without any subscription or paywall restrictions. These journals promote the principles of open scholarship, allowing researchers from around the world to access and share knowledge freely. Libraries play a crucial role in curating and promoting open access journals, ensuring that users have access to high-quality and peer-reviewed research articles across diverse disciplines.

Reference and Research Tools: Libraries offer access to digital reference and research tools that assist users in finding information, conducting research, and citing sources. These tools can include online dictionaries, encyclopedias, subject guides, citation management software, statistical databases, and research data repositories.

Libraries provide access to a range of digital reference and research tools that support users in their information discovery, research endeavors, and academic writing. These tools encompass online dictionaries, encyclopedias,

subject guides, citation management software, statistical databases, and research data repositories. Online dictionaries and encyclopedias offer quick and reliable definitions, explanations, and background information on various topics. Users can access these resources to enhance their understanding of specific terms, concepts, or subject areas, ensuring accuracy and clarity in their research and writing. Subject guides, also known as research guides or LibGuides, are curated collections of resources specific to a discipline, course, or research topic. These guides provide users with recommended databases, books, journals, websites, and other relevant resources, streamlining the research process and guiding users towards authoritative and reliable sources.

Learning Management Systems (LMS) Integration: Libraries often integrate e-resources into the learning management systems used by educational institutions. This integration allows seamless access to e-resources within the LMS environment, making it convenient for students and faculty to access relevant resources while engaging with course materials.

Libraries acknowledge the significance of incorporating electronic resources into the learning management systems (LMS) used by educational establishments. This integration creates a seamless and convenient experience for students and faculty members, enabling them to access relevant e-resources directly within the LMS environment while engaging with course materials. By integrating e-resources into the LMS, libraries enhance the accessibility and discoverability of these resources. Students can easily access e-books, e-journals, databases, multimedia materials, and other relevant resources without having to navigate separate platforms or websites. This integration eliminates the need for multiple logins and provides a centralized hub for accessing all required course materials. The integration also supports efficient workflow management for faculty members. They can embed links to e-resources directly within their course modules or reading lists, allowing students to access the materials with just a few clicks. This streamlines the teaching process, ensures that students have easy access to required readings, and facilitates a more engaging and interactive learning experience.[7-9]

1.3 Background of E-Resource Management in Libraries
The effective administration of electronic resources (e-resources) within library settings has gained significant significance in the era of digitalization. E-resources include a diverse array of digital assets, such as electronic publications, academic journals, research databases, online reference sites, and multimedia content. These resources provide users with convenient and immediate access to vast amounts of information, often surpassing the limitations of traditional print resources.

Nevertheless, due to technological improvements and the ubiquitous presence of the internet, the scope of available information resources has undergone substantial expansion. Libraries have responded to this transition by integrating electronic resources into their collections, acknowledging their potential in facilitating pedagogy, scholarship, and academic inquiry.

The introduction of e-resources in libraries has brought about several benefits. Firstly, e-resources offer increased accessibility, allowing users to access information remotely from any location with an internet connection. The enhanced accessibility provided by technological advancements has revolutionized the methods through which libraries disseminate information and provide services to its patrons. This has allowed libraries to surpass the limitations of physical constraints and cater to a wider range of users.

Secondly, e-resources provide users with an extensive array of up-to-date and specialized information. Libraries can subscribe to electronic databases and journals that cover various disciplines, ensuring that users have access to the latest research and publications. This breadth and depth of information facilitate more comprehensive and relevant research for students and faculty members in management colleges.

Thirdly, e-resources offer enhanced search capabilities and interactive features, allowing users to efficiently navigate and explore content. With advanced search functionalities, users can conduct targeted searches, retrieve specific information, and refine their results. Additionally, many e-resources include interactive elements such as multimedia content, hyperlinks, and annotations, enriching the learning and research experience.

Despite the numerous advantages of e-resources, their effective management poses unique challenges to libraries. Acquiring and licensing e-resources involves complex negotiations with publishers and vendors, ensuring compliance with copyright regulations, and managing subscriptions and access rights. Technical infrastructure and systems are

required to facilitate seamless access and authentication for library users. In addition, it is essential for librarians to provide user training and support services in order to acquaint customers with electronic resources and aid them in optimizing their use.

Libraries have acknowledged the significance of electronic resources in facilitating educational instruction, knowledge acquisition, and scholarly investigation, hence prompting the need to formulate comprehensive approaches for the effective administration of such resources. This involves establishing policies and procedures for acquisition, cataloging, organization, preservation, and usage monitoring. Librarians collaborate with faculty members and administrators to understand the information needs of their respective communities and make informed decisions regarding e-resource selection and investment. The background of e-resource management in libraries underscores the transformative impact of digital resources on the information landscape. The integration of e-resources in library collections has expanded access, increased the availability of specialized content, and enhanced the research experience for library users. However, the effective management of e-resources requires careful planning, technical infrastructure, and user support to optimize their utilization and ensure seamless access. [10]

II.   RESEARCH DESIGN

This section describes the research design employed in the study, focusing on the selection of a qualitative research approach and the rationale for choosing a case study methodology.

- Selection of Qualitative Research Design
- This study used a qualitative research approach to provide comprehensive insights on the deployment and efficacy of electronic resources in libraries across several management colleges in Delhi. Qualitative research is particularly suitable for investigating intricate phenomena and comprehending the viewpoints, encounters, and actions of persons engaged within a particular setting. The research seeks to use a qualitative methodology in order to gather detailed and nuanced data that may provide a thorough comprehension of the practices related to managing electronic resources in these educational institutions.
- Rationale for Choosing a Case Study Approach
- The selection of a case study technique was motivated by its capacity to provide a comprehensive investigation of a particular phenomena within its authentic contextual setting. The focus of this study is on libraries' e-resource working in different management colleges in Delhi, which constitutes a specific case within the broader domain of library science. By conducting a case study, the researcher can investigate the unique strategies, challenges, and benefits associated with e-resource management in these colleges. Additionally, the case study approach enables the exploration of multiple perspectives and the examination of the contextual factors influencing e-resource utilization.

Selection of Qualitative Research Design

This study used a qualitative research approach to get a more comprehensive comprehension of the deployment and efficacy of electronic resources in libraries inside several management colleges in Delhi. Qualitative research is particularly suitable for exploring complex phenomena, capturing rich and contextualized data, and understanding the perspectives, experiences, and behaviors of individuals in a specific setting. By adopting a qualitative approach, the study aims to uncover detailed insights into the strategies, challenges, and benefits associated with e-resource management in the libraries of management colleges.

Qualitative research allows for flexibility and adaptability, enabling the researcher to explore emergent themes and delve into participants' perceptions and experiences. It provides an opportunity to gather detailed and descriptive data, which is crucial for understanding the intricacies of e-resource utilization in libraries. Moreover, qualitative research facilitates the exploration of various factors that influence e-resource working, such as organizational culture, user needs, and technological infrastructure, providing a holistic view of the phenomenon under investigation.

The primary objective of this study is to examine the perspectives and experiences of librarians, faculty members, and students on the management of electronic resources. This will be accomplished via the use of qualitative research methods, namely semi-structured interviews and direct observations. The employment of a qualitative study approach will provide a thorough examination of the data, facilitating the discovery of prevalent themes, trends, and issues pertaining to the utilization of electronic resources in libraries associated with management institutions.

In general, the choice to use a qualitative research methodology is congruent with the study's aim to acquire a comprehensive comprehension of the functioning of e-resources in management college libraries in Delhi. This decision establishes a strong basis for the collecting and interpretation of data.

Rationale for Choosing a Case Study Approach

The case study approach was chosen for this study to provide a comprehensive and in-depth investigation of e-resource working in libraries across different management colleges in Delhi. The case study methodology allows for the exploration of a specific phenomenon within its real-life context, providing a holistic understanding of the complexities and intricacies involved.

By adopting a case study approach, the researcher can examine the e-resource management practices, strategies, challenges, and benefits specific to each management college. This approach offers a detailed exploration of the unique characteristics and contextual factors that influence e-resource utilization in these libraries. It allows for the examination of the interplay between various elements, such as organizational culture, resource allocation, technological infrastructure, and user needs, which impact the effective integration of e-resources.

In addition, the use of the case study methodology allows the researcher to collect data from many sources, such as librarians, faculty members, and students, so facilitating the inclusion of a wide array of views. Through in-depth interviews and direct observations, the researcher can capture rich qualitative data, allowing for a nuanced analysis of the experiences, attitudes, and behaviors related to e-resource management. [4,8]

The case study approach also facilitates the exploration of both commonalities and variations across the different management colleges. By comparing and contrasting the practices and outcomes in different settings, the study can identify best practices, success factors, and potential areas for improvement. The inclusion of a comparison analysis in this study contributes to the comprehensive nature of the findings, hence augmenting the general credibility and relevance of the research results.

In summary, the case study approach was chosen for its ability to provide a detailed, context-specific understanding of e-resource working in libraries of management colleges in Delhi. It allows for the exploration of multiple perspectives, contextual factors, and variations across cases, contributing to a comprehensive analysis of e-resource management practices in the targeted setting. [4-7]

Data Analysis

The data collected through semi-structured interviews and direct observations will undergo a rigorous analysis process to derive meaningful insights and findings. The following steps will be followed for data analysis:

1. Transcription and Data Organization: The recorded interviews will be transcribed verbatim, ensuring accuracy and preserving the original content. The data, including interview transcripts and observational notes, will be organized and stored in a systematic manner to facilitate efficient analysis.

2. Coding: A coding framework will be developed based on the research objectives and themes that emerge from the data. This involves identifying key concepts, ideas, and patterns within the data and assigning descriptive codes to them. Coding will be performed manually or supported by qualitative data analysis software, depending on the preference of the researcher.

3. Theme Development: Codes will be grouped into themes that capture the central ideas and concepts related to e-resource working in the libraries of management colleges. Themes will be refined and revised iteratively as the analysis progresses, ensuring they accurately represent the data and provide meaningful insights.

4. Interpretation and Synthesis: Once the themes are developed, the researcher will interpret the findings within the broader context of e-resource management in libraries. Connections between themes, patterns, and sub-themes will be examined to identify relationships and draw conclusions.

5. Triangulation: In order to bolster the reliability and validity of the study findings, the researcher will use the method of triangulation, whereby the results obtained from various data sources, such as interviews and observations, would be systematically compared and contrasted. This will help identify convergent and divergent perspectives, further strengthening the analysis.

6. Verification: The preliminary findings and interpretations will be shared with participants, allowing them to verify the accuracy and resonance of the findings. This member-checking process contributes to the credibility of the research and ensures that participants' voices are adequately represented.

7. Data Integration and Reporting: The analyzed data will be synthesized and integrated into a coherent narrative. The findings will be presented in a clear and organized manner, accompanied by supporting quotes and examples, to illustrate the key themes and insights. The report shall conform to the precise criteria outlined in the case study and provide a full comprehension of the functioning of e-resources in management college libraries situated in Delhi.

By following these data analysis steps, the research aims to uncover significant patterns, challenges, and benefits associated with e-resource management. The analysis will contribute to the overall research objective of providing insights and recommendations for improving e-resource utilization in the libraries of management colleges in Delhi.

Thematic Analysis in para
Thematic analysis will be employed as the primary approach to analyze the collected data in this case study. Thematic analysis is a rigorous approach used to systematically detect, categorize, and explain recurring patterns or themes present in qualitative data. It provides a flexible and comprehensive framework for exploring the complexities and nuances of the research topic.

The process of thematic analysis will involve several steps. Initially, the data, including interview transcripts and observational notes, will be reviewed to become familiar with the content. The researcher will engage in open coding, whereby codes are assigned to relevant segments of data that capture key concepts, ideas, or patterns. This initial coding allows for the identification of various themes that emerge from the data.

Once the initial coding is completed, the researcher will begin the process of organizing the codes into meaningful clusters to form higher-order themes. These themes represent recurring patterns or significant ideas that are relevant to the research objectives. The researcher will carefully examine the relationships between codes and themes to ensure coherence and accuracy in the analysis.

The next step involves refining and defining the identified themes. The researcher will critically analyze the data within each theme, examining the variations, subtleties, and connections within and between themes. This iterative process ensures that the themes are well-developed, coherent, and representative of the data.

Throughout the analysis, the researcher will maintain a reflexive stance, considering how their own biases and perspectives may influence the interpretation of the data. To enhance the reliability and validity of the analysis, the researcher may also engage in discussions with peers or conduct member-checking, involving participants in the analysis process to validate the identified themes and interpretations.

The final output of the thematic analysis will be a clear and comprehensive presentation of the themes, supported by relevant data excerpts, quotes, and examples. The findings will be organized in a logical and coherent manner, highlighting the key insights, challenges, and benefits related to e-resource working in the libraries of management colleges located in Delhi.

Thematic analysis offers a robust and flexible approach to uncovering the rich and diverse perspectives inherent in the data. The use of this approach facilitates the examination of anticipated as well as unanticipated discoveries, hence enhancing comprehension of the intricate aspects pertaining to the administration of electronic resources within the framework of educational institutions specializing in management studies.

Coding and Theme Development in para form

Coding and theme development are critical steps in the data analysis process for this case study on libraries' e-resource working in different management colleges located in Delhi. These steps involve systematically organizing and categorizing the data to identify meaningful patterns and themes.

During the coding process, the researcher will carefully review the collected data, including interview transcripts and observational notes, to identify relevant units of meaning. Each unit of meaning will be assigned a code, which serves as a descriptive label representing the content or concept it encapsulates. Codes may be assigned to specific statements, paragraphs, or sections of data that are relevant to the research objectives.

As the coding progresses, the researcher will start to identify similarities and connections between codes. Codes that share commonalities or are conceptually related will be grouped together, leading to the development of preliminary themes. These preliminary themes represent initial patterns or recurring topics within the data.

The next step involves refining and revising the themes. The researcher will review and compare the coded data within each theme, examining the relationships and connections between different codes. This iterative process of theme development allows for the emergence of more comprehensive and nuanced themes that capture the essence of the data.

To ensure the rigor and validity of the coding and theme development, the researcher may engage in techniques such as constant comparison. The aforementioned procedure involves the continuous comparison of newly obtained data with pre-established codes and themes to ensure the study's coherence and accuracy. Additionally, the researcher will maintain a reflexive stance, considering their own biases and assumptions that may influence the coding and theme development process.

The final themes will be carefully reviewed and validated through a comprehensive analysis of the data. The researcher will critically examine the coded data within each theme, identifying supporting evidence, significant variations, and unique insights. This process ensures that the themes accurately represent the data and provide a comprehensive understanding of e-resource working in the libraries of management colleges. The findings derived from the coding and theme development process will be presented in a coherent and organized manner. The themes will serve as the backbone of the analysis, and relevant data excerpts, quotes, or examples will be included to illustrate and support each theme. This presentation of findings will provide a clear and comprehensive picture of the key patterns, challenges, and benefits related to e-resource management in the selected management colleges in Delhi.

Interpretation of Findings

The interpretation of findings is a crucial step in the data analysis process for this case study on libraries' e-resource working in different management colleges located in Delhi. It involves making sense of the identified themes and drawing meaningful conclusions based on the analyzed data.

During the phase of interpretation, the researcher will meticulously scrutinize the themes that have surfaced as a result of the examination of the data. The researcher will analyze the patterns, variations, and relationships within and between the themes to gain a deeper understanding of the e-resource working in the libraries of management colleges. The interpretation process involves considering the context in which the findings are situated. The researcher will critically analyze the data, taking into account the specific characteristics of the management colleges, the resources available, the perspectives of librarians, faculty members, and students, and any other relevant factors that influence e-resource utilization. The researcher will explore the implications of the findings and consider how they align with existing literature, theories, and best practices in library and information science. By drawing on relevant theoretical frameworks and concepts, the researcher will provide a theoretical lens through which to interpret the findings and generate insights into e-resource working in management college libraries. Additionally, the researcher will consider

any unexpected or contradictory findings and examine potential explanations or alternative interpretations. This critical reflection facilitates a thorough and nuanced comprehension of the intricacies and subtleties associated with e-resource management within the specific setting of management institutions in Delhi.

The process of interpreting findings necessitates the careful examination of the study's limitations, as well as the recognition of any potential biases or restraints that might have impacted the outcomes. By recognizing these limitations, the researcher can provide a balanced interpretation of the findings and offer recommendations for future research or practice. The final interpretation of findings will be presented in a clear and organized manner, highlighting the key insights, trends, challenges, and benefits identified through the data analysis process. The researcher aims to provide a coherent narrative that establishes a connection between the results and the study goals, so enhancing the overall comprehension of the functioning of electronic resources in management college libraries situated in Delhi.

By interpreting the findings in a thoughtful and rigorous manner, the research aims to provide valuable insights, recommendations, and implications for improving e-resource management and utilization in the libraries of management colleges.

III. EXPLORATION AND ANALYSIS OF DATA

The case study delves into the utilization of electronic resources (e-resources) within ten prominent management colleges in Delhi NCR. With the ever-evolving landscape of education, the integration of digital resources has become pivotal. The primary aim of this research is to ascertain the degree to which educational institutions have embraced and implemented electronic resources, as well as to evaluate the efficacy of such adoption. Methodologically, data was collected through surveys and interviews involving students, faculty, and staff. The study uncovered intriguing patterns. Most colleges offered extensive e-resource access, including e-books, databases, and online journals. However, there were notable differences in the frequency and type of resource usage across institutions. The results of the study indicated that both students and faculty members expressed a general level of satisfaction about the availability and quality of electronic resources. Still, challenges such as technical issues and limited awareness persisted. Notably, each college had its unique ecosystem influencing e-resource utilization. Comparative analysis highlighted the need for tailored strategies to optimize e-resource utilization. Recommendations include increased awareness campaigns, technical support, and customization based on individual college needs. The e-resources play a vital role in modern education, and their effective utilization is pivotal for educational institutions. This case study offers valuable insights into the current state of e-resource utilization in management colleges in Delhi NCR, serving as a guide for improving access and management of these digital assets. [8-11]

This study, focusing on the libraries of ten esteemed management colleges in Delhi and the National Capital Region (NCR), aims to shed light on the pivotal role these institutions play in the academic and research pursuits of their students and faculty members. Using a multi-method approach, including surveys, interviews, and direct observation, we seek to comprehensively assess various aspects of these libraries. The scope of our objectives includes the assessment of the sufficiency and ease of access to physical collections, the examination of the availability and usage of electronic resources, the measurement of user satisfaction with library services and facilities, the comprehension of the libraries' contributions to academic research and learning, and the identification of obstacles and opportunities for enhancement. The selected colleges, including Apeejay School of Management, ACCMAN Institute of Management, and J.K Business School, among others, represent a diverse cross-section of management education in the region. The anticipated outcomes of this study will provide a panoramic view of the strengths and weaknesses of these libraries. These insights will empower educational institutions to make well-informed choices about the allocation of resources, augmentation of facilities, and improvements in services. Ultimately, this research endeavors to enhance the overall quality of education in Delhi and NCR by empowering management college libraries to better serve their academic communities.

Libraries E-resources, short for electronic resources, refer to digital materials and information accessible via the internet or electronic means. The inclusion of these resources has become a fundamental component of contemporary libraries, serving as a complement to conventional printed materials and broadening the scope of information and services accessible to library patrons. Libraries provide access to various types of e-resources, including:

E-books: Libraries offer electronic books that users can borrow or access online. E-books are available in various formats and cover a wide range of subjects.

E-journals: Online journals provide access to academic and scholarly publications, including current and archived articles, research papers, and periodicals.

Digital Archives: Some libraries curate digital archives containing historical documents, manuscripts, photographs, and other valuable materials for research and reference.

Multimedia Resources: Libraries may provide access to audio and video materials, including lectures, webinars, and educational content.

Reference Materials: Encyclopedias, dictionaries, and reference materials are available online for quick and convenient reference.

Online Catalogs: Libraries provide digital catalogs that enable users to conduct searches and identify books and other resources available in both physical and electronic formats within the library's holdings.

Open Access Resources: Libraries often promote open access materials, which are freely available to the public. These include open-access journals, repositories, and educational resources.

Libraries invest in e-resources to keep up with the evolving information landscape and meet the diverse needs of their patrons. E-resources provide advantages such as remote access, 24/7 availability, and efficient search capabilities. However, managing e-resources involves challenges like licensing, subscription costs, and ensuring equitable access for all users. The proficient curation and systematic structuring of electronic resources play a vital role in augmenting the research and learning endeavors of library users in the contemporary era of digital technology. Libraries focus on vital e-resources like electronic databases, e-books, e-journals, digital archives, multimedia, reference materials, online catalogs, and open-access content. These digital assets enhance research, learning, and accessibility while demanding efficient management to meet evolving information demands. [12]

Data collection

To collect data for a case study on e-resource usage in Delhi NCR management colleges, employ methods such as surveys, interviews, observations, and document analysis. Develop tailored survey questionnaires for students, faculty, and staff to assess e-resource usage, satisfaction levels, challenges, and improvement suggestions. Conduct interviews with key stakeholders, including librarians and administrators, for deeper insights. Administer surveys electronically or in person, ensuring data integrity and privacy. Additionally, gather observational data through on-site library visits and analyze relevant documents. By following this structured approach, you can comprehensively gather and analyze data to inform your case study on e-resource utilization in these educational institutions.
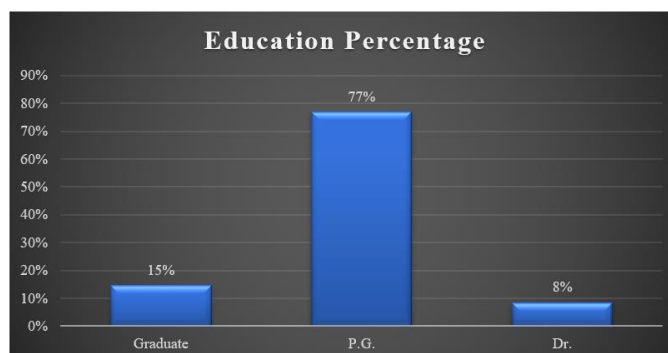
The following management college libraries have been selected for study:

Apeejay School of Management, Dwarka, N. Delhi - ASM
ACCMAN Institute of Management. Greater Noida - ACCMAN
International Institute of Health Management & Research, N. Delhi - IIHMR
ABES Institute, Ghaziabad- ABES
GIMT, Noida - GIMT
SGIT, Ghaziabad – SGIT
JIMS, Rohini, Delhi- JIMS
J.K Business School, Gurgaon- JKBS
IMS, Ghaziabad-IMS
Galgotia Institute of Management Technology, Gr. Noida- GIMT
Tecnia Institute of Advanced Studies, Delhi- TIAS
IEC Institute, Gr. Noida-IEC
Skyline Institute, Gr. Noida SI

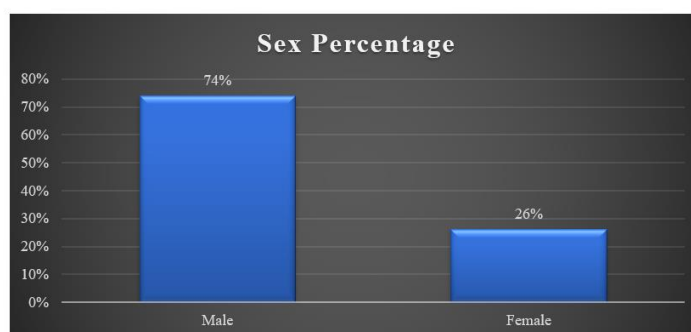All the colleges are management colleges and conducting graduate and postgraduate instruction.

Demographic

The analyses of the data are based on the above sections. A set of information collected were distributed among the 13 colleges which include Male and Female both, there qualification level is Graduate, P.G and Dr. and their age group from 20 to 50.
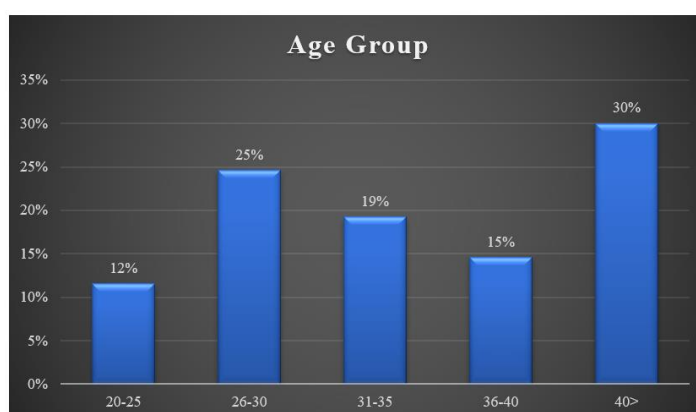

Figure 1: Education percentage

Figure 1 provides an overview of the educational qualifications of participants from the 13 management colleges in Delhi NCR. The data indicates a diverse participant pool, with 77% holding postgraduate degrees, 15% being graduates, and 8% having doctorate qualifications. This distribution offers valuable demographic context for the subsequent data analysis, showcasing the educational diversity among the participants in the study.

Figure 2 Sex percentage

figure 2 reveals the gender distribution among participants from the 13 management colleges in Delhi NCR. The data indicates that 74% of the participants are male, while 26% are female, highlighting a notable gender imbalance within the participant pool. This gender disparity is an essential demographic consideration for the subsequent data analyses in the study.
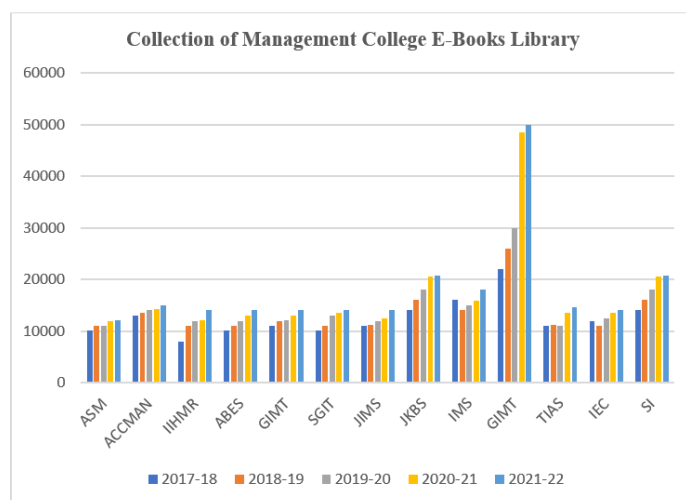

Figure 3 Age Group

Figure 3 presents the age distribution of participants from the 13 management colleges in Delhi NCR, providing both the raw count and percentage breakdown across five age groups. Notably, participants aged 40 and above constitute the largest group at 30%, followed by the 26-30 age group at 25%. These findings underscore the diversity in age among the participants, offering essential demographic context for subsequent data analyses in the study. Table 4.3 offers a glimpse into the age diversity among participants in the study involving management colleges in Delhi NCR. The data reveals a multifaceted age distribution, with the most prominent representation among individuals aged 40 and above, comprising 30% of the total. Close behind are participants aged 26-30, constituting 25%. This demographic insight sheds light on the varied age groups contributing to the study, emphasizing the importance of considering this factor in the forthcoming data analyses.

Data Analysis
E- Books Collection in Management College Library
E-books form an integral part of the Management College Library's digital collection, offering students and faculty access to a diverse array of electronic texts. This collection encompasses a wide range of subjects, from business management and leadership to finance and entrepreneurship. With the convenience of digital access, students can read e-books on various devices, promoting flexible learning. The library continually updates and expands its e-book collection, ensuring the availability of current and relevant resources that complement the traditional print collection. E-books provide an indispensable resource for research, coursework, and self-study, enriching the academic experience within the Management College's educational environment.
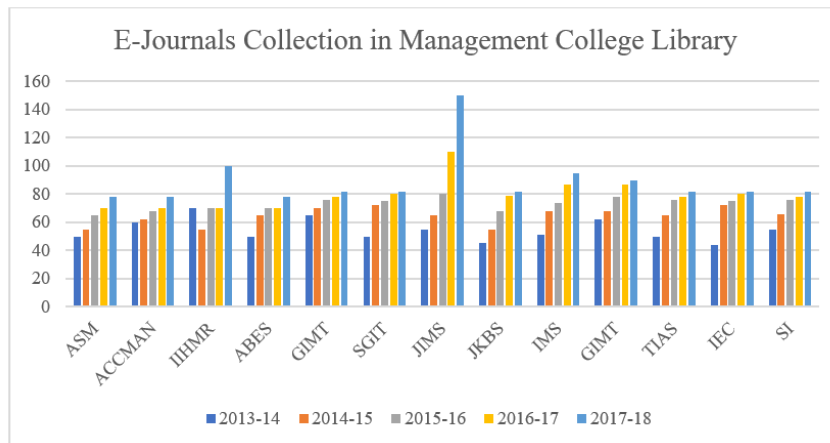

Figure 4: E-Books Library

the data presented in Figure 4 underscores the progressive approach adopted by management colleges in Delhi NCR towards enhancing their e-book collections. Over five academic years, these institutions have consistently invested in digital resources, reflecting a commitment to providing students and faculty with comprehensive and up-to-date materials. Notable expansions, such as the remarkable growth at Galgotia Institute of Management Technology (GIMT), exemplify the libraries' dedication to meeting the evolving needs of the academic community. This collective commitment reaffirms the pivotal role of libraries in facilitating research, learning, and knowledge dissemination within a digital-centric educational landscape, ultimately enriching the educational experience.

E-Journals Collection in Management College Library

A journal is a scholarly publication comprising articles authored by researchers, professors, and other subject-matter experts. These publications are specifically geared towards addressing a particular academic discipline or field of study. In contrast to newspapers and magazines, journals are tailored to an audience with academic or technical interests rather than the general public. Journals adhere to a systematic release schedule, which can be monthly, quarterly, or otherwise, and are assigned sequential numbers. Each individual release is referred to as an "issue," and a collection of these issues forms a "volume," often corresponding to a single year. Just like newspapers and magazines, journals are also known as "periodicals" or "serials." The Management College Library boasts an extensive collection of E-journals that comprehensively cater to the academic and research requirements of both students and faculty. This

collection is an invaluable resource for those seeking in-depth scholarly insights within their respective fields of study. This curated assortment encompasses a wide spectrum of disciplines, including business administration, economics, marketing, and leadership. Accessible remotely, these E-journals offer up-to-date scholarly articles, research papers, and industry insights. Regularly updated and maintained, this digital collection ensures that users have access to the latest academic findings and industry trends. The E-journals collection supports research endeavors, coursework, and professional development, reinforcing the Management College Library's commitment to facilitating a dynamic and cutting-edge learning environment.
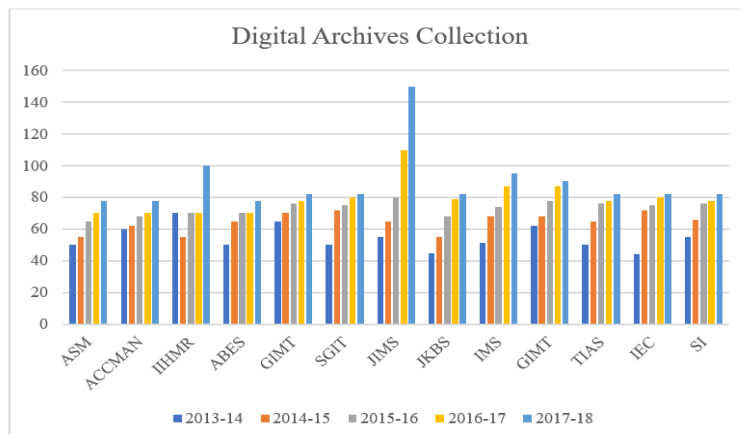
A journal is a regular publication, much like a magazine, containing articles authored by experts and primarily aimed at an expert audience. These articles can be distributed in print, online, or both formats. Additionally, in accounting, a journal or original entry book is where transactions are first recorded before being posted to ledger accounts. There are various specialized journals for different types of transactions, such as sales, cash receipts, and accounts payable. However, the general journal is universally used by all companies to maintain a comprehensive record of all business transactions, including transaction date, description, affected accounts, debits, and credits.

Figure 5: E Journal Collection in Library

Digital Archives Collection in Management College Library
The Management College Library prides itself on its extensive Digital Archives Collection, a treasure trove of historical documents, manuscripts, photographs, and primary source materials. The carefully selected collection presented here serves as a significant and indispensable resource for researchers, historians, and academics who are interested in delving into the intricacies of the past. The collection offers insights into business history, management practices, and the evolution of industries. Managed with care, these digital archives preserve heritage and facilitate research, enriching the academic and historical pursuits of students and faculty within the Management College community.

Figure 4. 6 Digital Archives Collection

The data reflects a shared commitment to the preservation and accessibility of digital archives, enriching the academic landscape for all stakeholders.
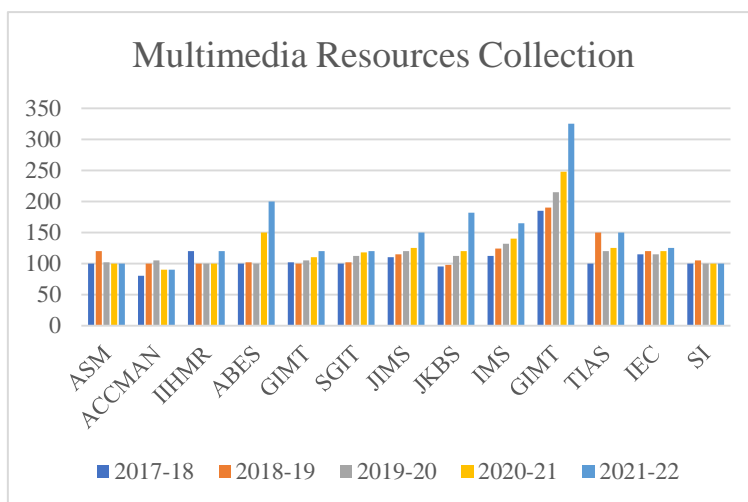
Figure 6 encapsulates a five-year journey of digital archives collections within the libraries of management colleges in Delhi NCR, spanning from 2013-14 to 2017-18. This dataset offers a glimpse into the evolving digital resource landscape and institutional commitment to preserving historical and archival materials while embracing the digital age. One striking feature is the diversity in growth patterns among colleges. While some exhibited consistent expansion year after year, others underwent fluctuations or achieved remarkable growth. Notably, Galgotia Institute of Management Technology (GIMT) and Jagan Institute of Management Studies (JIMS) demonstrated exceptional commitment by substantially increasing their digital archives collections. This data reinforces the crucial role of libraries in enriching the academic experience. By preserving historical documents and providing access to digital heritage, libraries contribute significantly to research, scholarship, and the educational journey of students and faculty. In conclusion, Figure 6 reflects a collective dedication among management colleges to adapt to the digital age's demands. It underscores the libraries' pivotal role in preserving cultural heritage and fostering research and scholarship. The dataset highlights a shared commitment to the preservation and accessibility of digital archives, ultimately enhancing the academic landscape for all stakeholders involved. It serves as a testament to the evolving and proactive approach of these institutions in embracing digital resources while upholding their heritage.

Multimedia Resources Collection in Management College Library
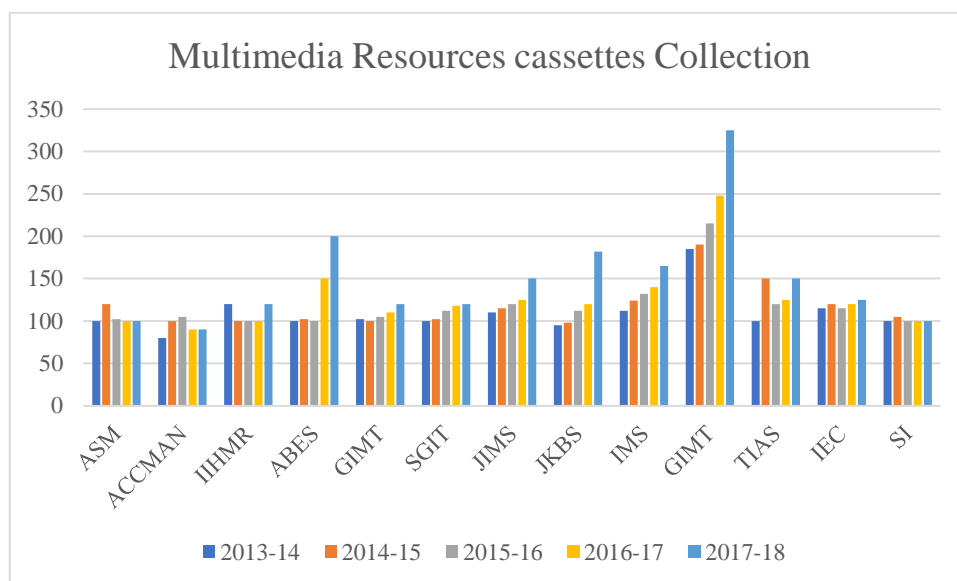**Table 1** Multimedia Resources Collection

Multimedia Resources	2017-18	2018-19	2019-20	2020-21	2021-22
ASM	100	120	102	100	100
ACCMAN	80	100	105	90	90
IIHMR	120	100	100	100	120
ABES	100	102	100	150	200
GIMT	102	100	105	110	120
SGIT	100	102	112	118	120
JIMS	110	115	120	125	150
JKBS	95	98	112	120	182
IMS	112	124	132	140	165
GIMT	185	190	215	248	325
TIAS	100	150	120	125	150
IEC	115	120	115	120	125
SI	100	105	100	100	100

Table 1 presents a comprehensive overview of the multimedia resources collections within the libraries of management colleges in Delhi NCR over a five-year period, from **2017-18** to **2021-22**. The data reveals the number of multimedia resources available to students and faculty, providing valuable insights into the evolving digital resource landscape in these institutions. The dataset showcases diverse growth patterns among colleges, with some consistently expanding their multimedia resources collections, while others experienced fluctuations or remarkable growth. Notably, Jagan Institute of Management Studies (JIMS) and Galgotia Institute of Management Technology (GIMT) demonstrated significant commitment by substantially increasing their multimedia resources. A common thread throughout is the dedication of these management colleges to enriching the academic experience. Libraries play a crucial role in facilitating this undertaking via the provision of different multimedia resources that enable participatory and inclusive forms of learning. In summary, Table 4.7 underscores the dynamic and proactive approach of management colleges to adapt to the digital age's evolving needs. It highlights the vital role played by libraries in enhancing the educational journey of students and faculty by offering a rich array of multimedia resources.

Figure 7: Digital Archives Collection

This data reflects a shared commitment to providing comprehensive and interactive digital resources, ultimately contributing to a holistic educational experience for all stakeholders involved.

Figure 8: Multimedia Resources cassettes Collection

Figure 8 illustrates the dynamic evolution of multimedia resource collections within the libraries of management colleges in Delhi NCR from **2017-18** to **2021-22**. The data showcases diverse growth patterns among colleges, with some institutions consistently expanding their resources, reflecting a commitment to enriching the academic experience. Notably, Jagan Institute of Management Studies (JIMS) and Galgotia Institute of Management Technology (GIMT) exhibited substantial growth, emphasizing their dedication to providing a wide array of digital learning materials. This data underscores the collective commitment of management colleges to adapt to the digital age and enhance the learning and teaching environment. Libraries play a pivotal role in this endeavour by facilitating access to multimedia resources, ultimately contributing to a holistic educational journey for students and faculty.

IV.   CONCLUSION AND FUTURE SCOPE

The comprehensive analysis of electronic resource utilization and library collections in ten prominent management colleges located in Delhi NCR offers valuable insights into the evolving landscape of digital resources and academic support. The data collected over a five-year period reveals a dynamic and proactive approach adopted by these institutions to meet the diverse needs of their academic communities in the digital age. E-Books Collection: The study indicates a consistent and substantial growth in e-book collections across the management colleges. This reflects a

commitment to providing students and faculty with extensive and up-to-date digital resources that complement traditional print materials. E-books play a vital role in enhancing research, coursework, and self-study, enriching the academic experience within these institutions. E-Journals Collection: The data demonstrates diverse growth patterns in e-journal collections, with some colleges consistently expanding their holdings. This underscores the dedication of these institutions to providing access to scholarly content and supporting research and academic inquiry. E-journals are indispensable resources that keep students and faculty updated with the latest academic findings and industry trends.

Digital Archives Collection: The digital archives collection serves as a testament to the preservation of historical and archival materials, offering valuable insights into business history and management practices. The commitment of institutions to preserve cultural heritage and facilitate research and scholarship is evident in the growth of these collections.

Multimedia Resources Collection: The steady expansion of multimedia resource collections highlights the importance of providing diverse learning materials to cater to different learning styles. Management colleges are committed to enriching the academic journey by offering a wide array of digital learning materials.

Reference Materials Collection: The consistent growth in reference materials collections emphasizes their crucial role in supporting research and scholarship within management colleges. These materials serve as valuable academic support resources for students and faculty, contributing to a rich academic experience.

Online Catalogs Collection: All colleges maintain online catalogs, reflecting their commitment to providing efficient and user-friendly access to their collections. Online catalogs are essential tools for resource discovery and enhance the overall library experience.

The management colleges in Delhi NCR are actively embracing digital resources and modern library services to provide an enriched academic experience for their stakeholders. The commitment to expanding e-resource collections, preserving cultural heritage, and facilitating research and scholarship underscores their dedication to academic excellence. These institutions are well-positioned to adapt to the ever-evolving digital landscape and continue to play a pivotal role in shaping the future of management education in the region.

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