

# Digitisation Trend in Libraries of First Grade Colleges Affiliated to Davanagere University: A Study

*N Kotresh*

## Abstract

*The college libraries have to widen their system to incorporate the challenges and demands of digital environment by taking the following steps. 1) Developing the born digital collection 2) Digitalisation of existing collection of the college library 3) Development of virtual and interactive network services within the college campus 4) Develop usable, quality educational and cultural content for the user community and 5) Develop services both manual and electronic to ensure equal opportunities for lifelong learning. In view of this, there is a need to evaluate the college library motto towards user community to deal with the challenges of digitalisation and new technologies. Therefore, here is made an effort to know the current trends of digitalisation in Libraries of First Grade Colleges affiliated to Davanagere University. The study tries to identifies the taluk & district wise First Grade Colleges, available resources, qualification & experices of professionals working, prerequisites & components required, initiative steps taken to degitise, process of degitisation.*

**Keywords:** Digitisation Trend, Digital Library, College Library, Davanagere University

## 1. Introduction

We are in the era of Information Technology, which is also called as electronic, computer era. The digitalization is the part of computerization and it means that, there can find the information through computer in digit format. Libraries' development seems more complicated with Internet technology and digital resources. Developments in the web technology enable us to have access to digital information resources from everywhere. Digitisation of libraries could fulfill the motto of the library i.e. to provide right information to the right user at the right time, in this era. The digital library concept has become reality due to the arrival of the various kinds of electronic publications such as e-journals, e-books, conference proceedings and

so on. The digital library enable greater access to digital contents which can be managed from remote locations and provide a way to enrich the teaching and learning environment.

The term digital library, a newly emerging perspective in the modern world, has different meanings to different communities<sup>1</sup>. To an information scientist, it is a local extension and augmentation of the physical library to cope with the electronic information society. To the engineering and computer science community, it is metaphor for the new kind of distributed database service that manages unstructured multimedia data. To the business community, it represents a new market place for the world's information and services. Anyhow, a digital library is a collection of digital objects. According to A Neil Yarkey, the digital libraries, as electronic libraries in which



large number of geographically distributed users can access the contents of large and diverse repositories of electronic objects which include networked text, images, maps, sounds, videos, catalogues of merchandise and scientific, business and government gazettes and also include hypertext, hypermedia and multimedia compositions<sup>2</sup>. According to Chowdhury and Chowdhury, the digital library is “an assemblage of digital computing, storage and communications machinery together with the content and software needed to reproduce, emulate and extend the services provided by conventional libraries based on paper and other material means of collecting, cataloguing, finding and disseminating information<sup>3</sup>. **Don Waters and Digital Library Federation** defined that “Digital libraries are libraries that provide the resources, including the specialized staff, to select, structure, offer intellectual access to, distribute, preserve the integrity of and ensure the persistence over time of collection of digital works so that they are readily and economically available for use by a defined community<sup>4</sup>”.

Therefore, a full service digital library must accomplish all essential services of traditional libraries and also exploit the well known advantages of digital storage, searching and communication. The digital library reduces space requirements unlike the traditional library to store, manage and dissemination of information to its community. This service also helps the library professionals in implementing updated technologies and saves the time of both library professionals and the patron community. And therefore, the study has undertaken to understand the Digitisation Trend in Libraries of First Grade Colleges Affiliated to Davanagere University.

## 2. Hypothesis of the Study

- ❖ No Trend of digitization is there in First Grade College Libraries.
- ❖ Majority of First Grade College Libraries have not equipped with computers.
- ❖ Majority of them have not installed Library Software and ahead for library automation and digitization.
- ❖ There is a lack of awareness about digital library and its services in user of the library
- ❖ There is a lack of support from head of the institution to digitise the library.

## 3. Scope of the Study

The scope of this study is basically relating to know the trends of digitalization in libraries of First Grade Colleges which are affiliated to Davanagere University. The units of observation of the study are mainly Government, Private Aided and Un-aided and Autonomous First Grade Colleges. And the study also observes the available resources, facilities and components required for the digitisation of the library. The study is restricted to First Grade Colleges which are affiliated to Davanagere University and confined to problems in digitising the library of these colleges.

## 4. Methodology

Both primary and secondary sources of data have been relied upon. Primary data were collected both from the college administrative authority through interview on the basis of well designed questionnaire which was used to collect data from the library professionals of the First Grade Colleges affiliated to Davanagere University.

## 5. Need for the Study

A traditional library is often associated with large buildings filled with massive rows of storage racks for printed books and journals. A conventional library is gauged by the number of titles that it holds and by the number of titles that it subscribes. In contrast, the modern digital library will be a sleek array of computer-based information systems. The digital libraries are the complex and advanced forms of information systems that can be endowed with a multiplicity of functions and features. It sometimes called as electronic infrastructures and information highways, etc, but a library is not the same thing as one called it an infrastructure<sup>5</sup>. A library adds value to information resources by organising and making them available. Additionally, a library serves distinct sets of stakeholders, communities, of frequent, casual and potential users.

Digital libraries basically store materials in an electronic format and manipulate large collections of those materials effectively. For many years, librarians have drawn attention to the rapid explosion of published information and to the difficulties it posts for libraries and information services attempting to provide ordered access to the world's information for their users. The advent of digital information, together with the development of worldwide information and communication networks, has brought a new order of magnitude to this problem.

But the future of digital libraries promises a world in which vast amounts of information of all types-text, images, photos, sound, video, animation, will be available to the people wherever they are. The vision of being able to access news, magazines,

professional articles, bulletin boards, catalogues, personal mail and the like from a personal computer at home, in the office, or even on the beach is compelling. In this way, the digital libraries have been evolving a best way of resource sharing. The college libraries have to enhance the activities pertaining to cultural, educational, social and democratic values. The value of college libraries is mainly dependent on how they satisfy the user needs and the services are and how much they are valued by the users they serve. In an age of digital technologies, the role of college libraries needs serious reassessment to enhance its value and strength. The use of the internet has translated into new demands for user services and resources by the younger generation. To confront the competition from the internet and digital material, college libraries have to improve its dual role as curators of knowledge as well as facilitators of access the need-based information. College libraries have to go in for a user demand based collection development of digital material specially those born digital.

Therefore the college libraries have to widen their system to incorporate the challenges and demands of digital environment by taking the following steps. 1) Developing the born digital collection 2) Digitisation of existing collection of the college library 3) Development of virtual and interactive network services within the college campus 4) Develop usable, quality educational and cultural content for the user community and 5) Develop services both manual and electronic to ensure equal opportunities for lifelong learning. In view of this, there is a need to evaluate the college library motto towards user community to deal with the challenges of digitisation and new technologies. Therefore, it is needed to know the current trends of digitisation

in Libraries of First Grade Colleges. Hence the present study is undertaken to identify the trends of digitisation in Libraries of First Grade Colleges, affiliated to Davanagere University.

## 6. Objectives of the Study

Digital Libraries do not mean libraries in the classical sense, but a network of multimedia systems. A typical digital library is a media server connected to high speed networks. Unlike a conventional library where users are provided with physical materials from many sources, a digital library is a group of distributed repositories that users see as a single repository in digital form. Therefore the study consist the following main objectives. They are:

1. To identify the initiatives taken to digitalize the libraries in First Grade Colleges affiliated to Davanagere District. Such as:
  - a. To find out number of computers available in the library and to find out the number of computers having database and internet connection.
  - b. To identify the computerization as well as digitization process of the library.
  - c. To find out the databases available and number of bibliographical databases available in different databases.
  - d. To identify the e-resources and open sources accessible through different web site.
  - e. To identify the components of digital library available in the First Grade Colleges.
2. To know the hurdles facing in digitalization of the libraries.
3. To suggest appropriate measures.

## 7. Statement of the Problem

The study is undertaken to know the digitization trend, to analyse the problems faced in digitization and to suggest remedial measures to enhance the steps to be taken in the initial stages of digitalizing the libraries of colleges affiliated to the Davanagere University. Hence the study is entitled as "DIGITALIZATION TREND IN LIBRARIES OF FIRST GRADE COLLEGES AFFILIATED TO DAVANAGERE UNIVERSITY- A STUDY"

## 8. Data Analysis

The data collected from the library professionals of the F.G. Colleges affiliated to Davanagere University through a well designed questionnaire. The collected data is analysed in different headings and tries to identify the findings.

### 8.1 First Grade Colleges in Davanagere University

Davanagere is the heart/centre of the State of Karnataka which was earlier famous as Manchester of the Karnataka and now it has become the educational centre. In the year 2008-09, the Karnataka Government has started the new university at Tholahunase Area which is 30 k.m distance from Davanagere city and named as Davanagere University. It is spread over in two districts, Davanagere and Chitradurga consist of six taluks each. The first grade colleges of these two districts are affiliated to this new university and one of them is deemed college. The colleges comprise of Arts, Science, Commerce, Management Studies and fashion designing are housed in this university area. The data regarding present status of the first grade colleges affiliated to this university is depicted in table 1.

Sl. No.	District wise Taluks	First Grade Colleges in Davanagere University				Total
		Government.	Private Aided	Private Unaided	Autonomous	
A	Davanagere District					
1	Davanagere Taluk	03	04	13	—	20
2	Channagiri Taluk	03	—	—	—	03
3	Harihara Taluk	01	01	03	01	06
4	Harapanahalli Taluk	01	02	01	—	04
5	Jagalur Taluk	01	01	02	—	04
6	Honnali Taluk	02	01	02	—	05
		<b>11</b>	<b>09</b>	<b>21</b>	<b>01</b>	<b>42</b>
B	Chitradurga District					
01	Chitradurga Taluk	03	04	04	—	11
02	Hiriyur Taluk	03	—	01	—	04
03	Challakere Taluk	02	—	03	—	05
04	Hosadurga Taluk	01	—	01	—	02
05	Holalkere Taluk	01	01	01	—	03
06	Molakalmur Taluk	01	—	02	—	03
		<b>11</b>	<b>05</b>	<b>12</b>		<b>28</b>
	<b>Total</b>	<b>22</b>	<b>14</b>	<b>33</b>	<b>01</b>	<b>70</b>

**Table 1: District & Taluk wise Distribution of F G Colleges**

It is clear from the above table that there are 42 colleges housed in Davanagere District and 28 colleges are housed in Chitradurga District and totally found 70 F.G. Colleges which are affiliated to this university. The table also exhibits the Taluk wise distribution of colleges in each district. The colleges in Davanagere District (42) are consist of Government (11), Private aided (9), Unaided (21) and one Autonomous college. And the colleges housed in Chitradurga District (28) are consist of Government (11), Private aided (5), and Un aided (12) colleges. And totally these colleges comprises of 22 Government, 15 Private aided - including one autonomous, 33 Private Unaided Colleges. The University is new but the establishment of colleges dates back to early 1970 and onwards. All these colleges are having well established libraries which

are offering good library services to their user community.

## 8.2 Profile of Respondents

A well designed questionnaire was distributed to all 70 First Grade College Librarians, out of which 57% of librarians responded to the questionnaire. The collected data is given in table-2.

Sl. No.	District wise Taluks	First Grade Colleges in Davanagere University				Total
		Government	Private Aided	Private Unaided	Autonomous	
A	Davanagere District					
01	Davanagere Taluk	0 (33%)	03 (75%)	08 (61%)	1 —	11 (55%)
02	Channagiri Taluk	01 (33%)	—	—	—	01 (33%)
03	Harihara Taluk	00	01 (100%)	02 (67%)	01 (100%)	04 (67%)
04	Harapanahalli Taluk	00	01 (50%)	00	-	01 (25%)
05	Jagalur Taluk	00	01 (100%)	02 (100%)	-	03 (75%)
06	Honnali Taluk	02 (100%)	01 (100%)	01 (50%)	—	04 (80%)
B	Chitradurga District					
01	Chitradurga Taluk	02 (67%)	02 (50%)	02 (50%)	-	06 (55%)
02	Hiriyur Taluk	02 (67%)	- —	00 00	-	02 (50%)
03	Challakere Taluk	01 (50%)	-	01 (33%)	-	02 (40%)
04	Hosadurga Taluk	01 (100%)	-	00	-	01 (50%)
05	Holalkere Taluk	01 (100%)	01 (100%)	00	-	02 (67%)
06	Molakalmur Taluk	01 (100%)	-	01 (50%)	-	02 (67%)
		08	03	04		15 (54%)
	<b>Total</b>	12 (54.5%)	10 (71%)	17 (51.5)	01 (100%)	40 (57%)

**Table 2: District & Taluk wise Profile of Respondents**

The above table specifies that the taluk wise responses from the librarians of First Grade Colleges housed in two districts. It is a healthy sign to note that out of 40 responses consist of the 60% and 54% from Davanagere and Chitradurga district respectively. It is healthy sign that almost all Government and Private Aided Colleges are having qualified librarians. But though there is sorry to note that the majority of private unaided colleges are not having qualified librarians, the 17(51.5%) unaided colleges are responded for the query of the scholar.

### 8.3 Resources Available

Trend of digitalization is based on the digital resources available in the collection of the library. Acquiring of e-resources like e-books, e-journals (online journals), CD's/CDROM, Databases, Bibliographical databases, Internet facility along with the general collection such as books, periodicals (national and international) and so on is first step of digitization of the library. These resources are essential to recognize the digitization trends in the library of any college. In view of this, the data has been collected to know the availability of resources in the F.G. Colleges and the same is presented in table-3

Sl. No.	Resources	Responses	Percentage
01	Books Up to 10,000 10,000 - 20,000 20,000 and above	25 11 04	62.5 27.5 10.0
02	Periodicals-National Nil 00 - 05 05 - 10 10 and above	21 09 07 03	52.5 22.5 17.5 07.5
03	International Nil 00 - 05 05 - 10 10 and above	40 —	100.0
04	On line (e) Journals Nil 00 - 05 05 - 10 10 and above	38 02	95.0 05.0
05	e-Books, Open Sources Nil 0000 - 1,000 1,000 - 2,000 2,000 and above	35 03	87.5 07.5

06	CD's/CDROM	Nil	30	75.0
		00 - 25	06	15.0
		25 - 50	02	5.0
		50 and above	02	05.0
07	Project Reports	Nil	33	82.5
		00 - 100	04	10
		100 - 200	01	2.5
		200 and above	02	5.0
08	Research Thesis	Nil	39	97.5
		00 - 100	01	2.2
		100 - 200		
		200 and above		
09	Databases, Bibliographical Databases	Nil	40	100
		00 - 25		
		25 - 50		
		50 and above		
10	Computers in the Library	Nil	26	65
		Less than - 05	09	22.5
		05 - 10	03	7.5
		10 and above	02	5.0
11	No. of Computers having internet in the library	Nil	25	62.5
		Less than - 02	10	25.
		02 - 04	02	5.0
		04 and above	03	7.5

**Table 3: Resources Available in the F, G. Colleges**

Table 3, clearly discloses the resources available in the First Grade Colleges which are affiliated to Davanagere University. It is clear from the data that the 100% of colleges having the general collection consist of books and periodicals (national and international). But the majority of colleges are not having the resources, which are the sign of the digitization trends, like online (e) journals (95%), e-books (87.5%), CD's/CDROM (75%), Databases (100%), internet facility in the library (62.5%). Although it is positive sign as even at least the few of the colleges are having the basic resources,

essential to recognize the digitization trend, such as online journals (05%), e-books (12.5%), CD's/CDROM (25%), internet facility in the library (37.5%), having computers in the library (35%), having internet connectivity in the library (37.5%) and so on. It shows that the trend of digitalization of library is emerging slowly, like a stepping of child, in the F. G. Colleges which are affiliated to Davanagere University.

#### 8.4 Qualification and Experience of the Professionals

High qualification and rich experience of the professionals are the indicators of the active and illuminating library. As is the qualification and experience of the librarian so is the services

rendered in the library. The digitization of the library is also depends on resourceful knowledge of the librarian which is the result of his qualification and his long length of experience. Hence the data regarding the qualification and length of service of the professionals working in the F G Colleges are collected and the same has been presented in table 4.

Qualification	Length of Service						Total
	Upto5 Years	5 - 10 Years	10-15 Years	15-20 Years	20-25 Years	25 Years above	
M.Lib.Sc	3(7.5%)	01(2.5%)	01(2.5%)	—	—	02(5%)	07(17.5%)
MA/MSc/MCom, MLib.Sc	03(7.5%)	—	02(5%)	—	01(2.5%)	—	06 (15%)
M. Lib. Sc, Ph.D	—	—	—	—	—	01(2.5%)	01(2.5%)
M.Lib.Sc, M.Phil	04 (10%)	—	02 (5%)	—	—	01 (2.5%)	07 (17.5%)
MA/MSc/MCom, M.Lib.Sc, M.Phil	01 (2.5%)	02 (5%)	—	01(2.5%)	—	01(2.5%)	05(12.5%)
MA,M.Lib.Sc,LLB	—	—	—	—	—	01(2.5%)	01 (2.5%)
MA,M.Lib.Sc, M.Phil, Net	—	—	—	01(2.5%)	—	—	01 (2.5%)
Not Qualified (No Librarian)	02 (5%)	08(20%)	02(5%)	—	—	—	12 (30%)
Total	13(32.5%)	11(27,5%)	07 (17.5%)	02 (5%)	01 (2.5%)	06 (15%)	40

**Table 4: shows the Qualification and Length of Service of the Professionals**

It is clear from the table that the 70% of professionals are highly qualified and 30% of them are not qualified at all. It represents that the 30% of libraries are not having qualified librarians. Further it is noted that the 52.5% of librarians are highly qualified i.e double graduates such as Master Graduate with M.Lib.Sc(15%), M.Lib.Sc,Ph.D; MA/ M.Lib.Sc, M.Phil,M.Sc, Net; MA/M.Lib.Sc, LLB(2.5%

each), M.Lib.Sc,M.Phil(17.5%) Master Graduate with M.Lib.Sc, M.Phil (12.5%) and at the same time it is noted that 12.5% of librarians are highly qualified and having 25 years and above length of experience. It can be said that though there is 30% of libraries are not having qualified librarians, it is possible to digitize the library in 70% of libraries where there is highly qualified professionals are working.



### 8.5 Pre-Requisites of Digitisation

There are prerequisites which are essential to know the trend of digitization in the college. For instance, if the institution has a research centre, the digitization is essential to render quick library service to the scholars. Likewise, the knowledge of computer and internet, aware of digitization, subscribe to database, training on digitization, Aware of library consortia in library professionals

and users, acquiring technologies required for digitization, digital resources, etc., are considered as the prerequisites of digitization. The thirteen such prerequisites are listed and asked the respondents to give opinion about these to understand the digitization process going on in the F.G Colleges. Hence the data is collected and presented in the table-5

Sl. No.	Pre - Requisites	Responses		No Response
		Yes	No	
01	Research Center in the College	—	36(90%)	04(10%)
02	Are you having Computer Knowledge	21(52.5%)	01(2.5%)	18(45%)
03	Are you had Internet Knowledge	18(45%)	—	22(55%)
04	Are you Aware of Digitisation	17(42.5%)	23(57.5%)	—
05	Subscribe to Databases for the Library	—	40(100%)	—
06	Are you required training to digitise	30(75%)	—	10(25%)
07	Is it digitization is Expensive	—	32(80%)	08(20%)
08	Are the user of the library aware of digital and ICT based services, Digital Resources	04(10%)	26(65%)	10(25%)
09	Are you aware of Consortia of Library	16(40%)	18(45%)	06(15%)
10	If yes-Is the College a member of any Consortia	—	36(90%)	04(10%)
11	Are you taken initiative steps to digitilise	22(55%)	18(45%)	—
12	Are you have Technologies and Components required to digitilise the library	—	39(97.5%)	01(2.5%)
13	Need of awareness programme and training to user of the library	38(95%)	—	02(10%)

Table 5: The Response on Prerequisites

It is clear from the table that half of the prerequisites fetch negative opinion from the majority of respondents. They are research center in the college (90%), aware of digitization among professionals (57.5%), subscription to database (100%), user awareness about digital library and ICT based service and digital resources (65%), Is the college a member of any library consortia (90%), availability of technologies and components required to digitalise the library (97.5%). Further, it is found that some of the prerequisites though had the positive opinion, but they are also negative with regard to digitization such as training required to staff (75%), need of awareness programme and training to the user of the library (95%) and so on. But it is healthy to note that some of the prerequisites had the positive opinion that the

librarians are having the knowledge of computer(52.5%), and the Internet (45%), aware of digitization (42.5%) and library consortia (40%). It signifies that the library professionals are having the knowledge of digitization and proved by taking initiative steps of digitization (55%). Further, it is found that the majority prerequisites fetch no response from the respondents, signifies that those responses are from non qualified staff working in the library.

### 8.6 Initiative Steps of Digitisation

In order to know the trend of digitization in F.G. College libraries, the professionals are asked to mention the initiative steps taken to digitalise their library. The collected data is presented in table-6.

Sl. No	Initiative Steps	No. of Response	No Response
01	Automation of the Library	18 (45%)	22(55%)
02	Provision of the Internet facility to user in the Library	02(5%)	38(95%)
03	Provision of Online Publication	—	40 (100%)
04	Conversion of Print material to digital formats	—	40 (100%)

**Table 6: Steps taken to Initiate Digitization of Library**

It is found from the table that the 45% of libraries are undertaken the automation of the library and 5% of libraries are provided the internet facility to their users but the majority of libraries are not step into automation of library (55%) and providing internet facility to their users(95%). Further it is noted that no library step in to the provision of online publication (100%) and conversion of print material to digital formats (100%). It specifies that the library professionals are not clearly understand the steps of digitization or their head of the

institution does not support to initiate digitization process in the library.

### 8.7 Process of Digitisation

After knowing the initiative steps taken to digitalise in the college libraries, it is made an effort to know the process of digitization going on in the college libraries. The data, regarding the process of digitization like scanning, checking of documents, conversion to pdf, data storage, and writing on the CDROM and document management system, is collected and presented in table 7.

Sl. No	Process of Digitisation	No. of Response	No Response
01	Scanning	—	40 (100%)
02	Checking of Documents (Quality Control)	—	40 (100%)
03	Conversion to PDF	—	40 (100%)
04	Document Management System	—	40 (100%)
05	Data Storage	—	40 (100%)
06	Writing on the CDROM	—	40 (100%)

**Table 7: Process of Digitization Going on in the Library**

It is clear from the table that no single process (100%) of digitization, such as scanning, checking of documents, conversion to pdf, document management system, data storage and writing on the CDROM, are going on in any of the colleges, affiliated to Davanagere University. It signifies that no trend of digitization is found in any of the college libraries.

### 8.8 Components of Digitisation

Digitisation of library requires well established and proven information technologies by accessing the database or serves through networks. The following components like 24 hours of Internet connectivity, computer servers, LAN/WAN, scanners, high power hard disk, high power UPS, WiFi tower, digital camera, converters, etc, are very essential to create digital library. Therefore the data has been collected regarding components of digitization, in order to know that the college libraries are really enable to undertake digital process, and the same data is depicted in table 8.

It is found from the table that there is no positive response towards the availability of components of digitization in the college libraries. Almost all responses negative except on availability of LAN/

WAN (05%) and on one of the human ware i.e subject knowledge (45%).

It is observed that there is no library having hardware components like 24 hours of Internet connectivity in the library(87.5%), computer servers (100%), scanners (82.5%), storage media-high power hard disk (90%), WiFi tower and CD's (80%), digital camera (77.5%), high power UPS (100%), converters (85%), networks (97.5%), multimedia interfaces (97.5%) and software components like Linux Operating System (90%), digital library software- Green Stone or DSpace (90%), editing software (90%). Further, it is also found that the negative response for even human ware components like management scope (70%) and lack of technical staff (75%).

Sl. No.	Components	No. of Responses		No Response
		Yes	No	
<b>I</b>	<b>Hard Ware Components</b>			
a	24 hours of Internet Connectivity	—	35 (87.5%)	5 (22.5%)
b	Computer Servers	—	40 (100%)	—
c	LAN/WAN	02 (5%)	34 (85%)	04 (10%)
d	Scanners	—	33 (82.5%)	07 (17.5%)
e	Storage Media: High Power Hard Disk	—	36 (90%)	04 (10%)
f	WiFi tower and CDs	—	32 (80%)	08 (20%)
g	Digital Camera	—	31 (77.5%)	09 (22.5%)
h	High Power UPS	—	40 (100%)	—
i	Converters	—	34 (85%)	06 (15%)
j	Networks	—	39 (97.5%)	01 (2.5%)
k	Multimedia Interfaces	—	39 (97.5%)	01 (2.5%)
<b>II</b>	<b>Software Components</b>			
<b>1</b>	Linux Operating Systems	—	36 (90%)	04 (10%)
m	Digital Library Software-Green Stone or DSpace	—	36 (90%)	04 (10%)
n	Editing Software	—	36 (90%)	04 (10%)
<b>III</b>	<b>Human ware Components</b>			
<b>0</b>	Management Support	—	28 (70%)	12 (30%)
p	Technical Staff	—	30 (75%)	10 (25%)
q	Subject Knowledge in Professionals	18 (45%)	22 (55%)	—

Table 8: Availability of Components of Digitization in the F G C Libraries

It is clearly specified that there is not found the trend of digitization in any of the First Grade Colleges – affiliated to Davanagere University.

### 8.9 Reasons for not taking Initiative Steps to Digitization

As it is found from the table-5, that the 45% of libraries are not taken initiative steps to digitise their libraries, they are asked to mention the reason for not taking such steps towards digitization. But even among 55% of professionals who mention that they taken the initiative steps to digitise their library are also marked the reason. The collected data is depicted in the table-9.

Sl. No.	Process of Digitisation	No. of Response
01	Lack of Funds	23 (57.5%)
02	Lack of Interest in Head of the Institution	40 (100%)
03	Lack of Awareness about digitization user	32 (80%)
05	Lack of trained technical staff	38 (95%)
06	Non Availability of technologies and components required to digitise	40 (100%)

Table 9: Reasons for not taking Initiative Steps of Digitization

It is clear from the table that the main reason for not taking initiative steps to digitise their library is the lack of interest in the head of institution (100%) and non availability of technologies and components required (100%) to digitise the library, followed by the lack of trained technical staff (95%), the lack of awareness about digitization among user (80%) of the library and last, but not least is the lack of funds (57.5%).

### 8.10 Rate of Factors

There are some factors essential to digitise the library like infrastructure for digitization, support from principal, financial support from management, training for library staff, co-operation between technical staff and other staff, availability of trained technical staff to work towards digitization and so on. Therefore, the respondents are asked to mention the rate of order of their satisfaction level on the given listed factors. The data collected is presented in table-10.

Sl. No	Factors	Rating					No Responses
		Excellent	Very Good	Good	Average	Poor	
a	Infrastructure for digitisation	—	—	02 (5%)	02 (95%)	38	—
b	Support of Principal	—	—	02 (5%)	—	38 (95%)	—
c	Financial support from the Management/Govt./UGC	—	—	—	08 (20%)	28 (70%)	04 (10%)
d	Training for Library Staff	—	—	—	04 (10%)	32 (80%)	04 (10%)
e	Co-Operation between technical staff and other staff	—	—	—	38 (95%)	—	02 (5%)
f	Availability of trained technical staff	—	—	—	—	37 (92.5%)	03 (7.5%)
g	Availability of time	—	—	38 (95%)	02 (5%)	—	—
h	Preservation of digital formats	—	—	—	—	38 (95%)	02 (5%)
i	Awareness among user	—	—	—	04 (10%)	36 (90%)	—
k	Extent to which digital formats used by lecturers and students	—	—	—	—	—	40 (100%)

**Table 10: Satisfaction Level of Professionals Towards Digitisation**

It is found from the table that the satisfaction level of respondents on majority of factors are rated poor such are Infrastructure for digitization (95%), support of Principal (95%), financial support from management/ government (70%), training for staff (80%), availability of trained technical staff (92.5%), awareness in user of the library (90%), but the co-operation between technical staff and other staff carries average satisfaction (95%), and 38% of professionals are having available good time to digitize the library. It is clear from the table that factors required for digitization like support of principal, management, equipping sound infrastructure and so on are not satisfactory. Therefore it is essential to equip all these factors in order to digitise the library.

### 9. Findings of the Study

The study identifies the following are the main findings

- 1) It is found that there are 70 colleges affiliated to Davanagere University, they comprises of 22 Government, 15 Private Aided - including one autonomous, 33 Private Unaided Colleges. The university is new but the establishment of colleges dates back to early 1970 and onwards.
- 2) It is found the healthy sign that the 60% and 54% of responses received from Davanagere and Chitradurga districts respectively. The majority of Government and Private Aided Colleges are having qualified librarian. Though there is sorry to note that the majority of private unaided colleges are not having qualified librarian, the 17 unaided colleges are responded for the query of the scholar.
- 3) It is clear from the study that the 100% of colleges having the general collection consist

of books and periodicals (national and international), but the majority of colleges are not having the resources, which are the sign of the digitization trends, like online e-journals (95%), e-books and open sources (87.5%), CD's/CDROM (75%), databases and bibliographical databases (100%), internet facility in the library (62.5 %).

- 4) It is positive sign as even at least the few of the colleges are having the basic resources, essential to recognize the digitization trend, like online journals (05%), e-books (12.5%), CD's/CDROM(25%), having computers in the library (35%), computers having internet connectivity in the library (37.5%) and so on.
- 5) It shows that the trend of digitalization of library is emerging slowly, like a stepping of child, in the F. G. Colleges which are affiliated to Davanagere University
- 6) It is found from the study that the 70% of professionals are highly qualified and it is noted that the 52.5% of librarians are double graduates such as Master Graduate with M.Lib.Sc(15%), M.Lib.Sc, Ph.D; MA/M.Sc/ M.Lib.Sc,M.Phil,Net; MA/ M.Lib.Sc, LLB (2.5% each) M.Lib.Sc,M.Phil (17.5%), Master Graduate with M.Lib.Sc, M.Phil (12.5%) and at the same time it is noted that 12.5% of librarians are highly qualified and having 25 years and more length of experience.
- 7) It is identified that though there is 30% of libraries are not having qualified librarians, it is possible to digitize the library in 70% of libraries, where there is highly qualified professionals are working

- 8)** It is clear from the study that the nearly half of prerequisites fetch negative opinion from the majority of respondents such as research center in the college (90%), aware of digitization among professionals (57.5%), subscription to database (100%), user awareness about digital library, ICT based service and digital resources (65%), Is the college a member of any library consortia (90%), availability of technologies and components required to digitise the library (97.5%).
- 9)** Further, it is found that some of the prerequisites though had positive opinion but they also negative with regard to digitization such as training required to staff (75%), need of awareness programme and training to the user of the library (95%) and so on.
- 10).** It is healthy to note that some of the prerequisites had positive opinion like the professionals are having the knowledge of computer (52.5%) and Internet (45%), aware of digitization (42.5%) and aware of library consortia (40%). It signifies that the library professionals are having the knowledge of digitization and proved by taking initiative steps of digitization (55%).
- 11)** It is found that the majority prerequisites fetch no response from the respondents, signifies that those responses are from non qualified staff working in the library or lack of awareness of digitisation.
- 12)** It is found from the study that the 45% of libraries undertaken the automation of the library and the 10% of libraries provided internet facility to their users but the 55% of libraries are not step into automation of library and 90% of them are not providing internet facility to users.
- 13)** It is noted that, no library step in to the provision of online publication (100%) and conversion of print material to digital formats (100%). It specifies that the library professionals are not clearly understand the steps of digitization or their head of the institution does not support to initiate digitization process in the library.
- 14)** It is observed from the study that no single process (100%) of digitisation, such as scanning, checking of documents, conversion to pdf, document management system, data storage, writing on the CDROM, are going on in any of the colleges affiliated to Davanagere University. It signifies that no trend of digitization are found in any of the college libraries.
- 15)** It is found that there is not positive response towards the availability of components of digitization in the college libraries and almost all responses are negative except availability of LAN/WAN (05%) and one of the Human ware i.e subject knowledge (45%).
- 16)** It is observed that no library having Hardware Components like 24 hours of Internet connectivity in the library(87.5%), computer servers (100%), scanners (82.5%), storage media- high power hard disk (90%), WiFi tower and CD's (80%), digital camera (77.5%), high power UPS )100%), converters (85%), networks (97.5%), multimedia interfaces (97.5%) and software components

like Linux Operating System (90%), digital library software- Green Stone or DSpace (90%), editing software (90%).

- 17) Further it is noted that the negative response for even human ware components like management scope (70%) and lack of technical staff (75%).
- 18) It is clear that the main reason for not taking initiative steps to digitise their library is the lack of interest in head of the institution (100%) and non availability of technologies and components required (100%) to digitise the library, followed by the lack of trained technical staff (95%), the lack of awareness about digitisation among user (80%) of the library and last, but not least is the lack of funds (57.5%).
- 19) It is found that the satisfaction level of respondents on majority of factors are rated poor such are Infrastructure for digitization (95%), support of principal (95%), financial support from management/ government(70%), training for staff (80%), availability of trained technical staff (92.5%), awareness in user of the library (90%), but the co-operation between technical staff and other staff carries average satisfaction(95%), and 38% of professionals are available good time to digitize the library.
- 20) It is clear that the factors required for digitization like support of principal and management, equipping sound infrastructure and son are not satisfactory and it is essential to equip all these factors in order to digitilise the library.

## 10. Suggestion

- ❖ As there is no awareness among the user of the library about new technology i.e digitization, it is most important to create awareness among them as and when the new technology is being introduced in the library.
- ❖ Updating of knowledge among library professionals along with principals from time to time through orientation, workshops and so on will help to take initiation for digitization.
- ❖ Administers of the colleges like management/ government and UGC must support through financial to introduce and develop digitisation of the college libraries.
- ❖ All First Grade Colleges must equip with e-books, e-journals, technologies, components, prerequisites which are essential to initiate the culture of digitization.
- ❖ Technical and supportive staff should be made available in colleges to help digitization process and thereby to render library services.

## 11. Conclusion

The study proved the hypotheses positively but it is negative for the trend of digitization is concerned. As there is no college library possess the components, technologies, software required for digitization and no single process of digitization is undertaken in any of the college library, specified that there is no trend of digitization in libraries of F.G. College affiliated to Davanagere University. The study identified that the majority of librarians are having double graduates, and long length of experience but no college authority support them to initiate digitization.



The findings signifies that the study is successfully achieved the main objectives for which it is undertaken. It is identified the initiatives taken to digitalize the libraries in First Grade Colleges affiliated to Davanagere District. It is also identified the number of computers available in the library and computers connected to database and internet. It is also observed the status of computerization as well as digitization process of the library. The study finds out the databases, bibliographical databases available in the college and the e-resources and open sources accessible through different web site. The study also observed that the components of digital library available in the First Grade Colleges and made an effort to know the hurdles facing in the digitalization of the libraries.

If the authority of the college fulfilled the suggestions made by the scholar, it is no doubt that the trend of digitization will be in progress in all the libraries of F G Colleges affiliated to Davanagere University.

#### **References**

1. Marchionini G (1996), Research and development in digital libraries, In: Encyclopedia of information and library science, 63, Marcel Dekker, New York.
2. Yarkey A N (1996), A course in digital libraries, DESIDOC Bulletin of Information Technology, 16(1).
3. Chowdhury G and Chowdhury S (2003), Introduction to digital libraries, Facet Publishing, London.
4. Anil Kumar Jharotia (2008), Empowering Knowledge for All: Role of Digital Libraries,

In:ILA-TISS International Conference Volume, TISS,Mumbai,2008, pp.199-200.

5. Nunberg, Geoffrey(1993), The place of Books in the Age of Electronic Reproduction. In Howard Block and Carla Hesse, (Eds), 'Representations Special Issue: Future Libraries,' No.42,(pp.13-37).

#### **About Author**

**Dr. N Kotresh**, Librarian, SMSFG College, Honnal, Davanagere,Karnataka  
E-mail: drkotreshuttangi@yahoo.co.