University of Nebraska - Lincoln DigitalCommons@University of Nebraska - Lincoln

Library Philosophy and Practice (e-journal)

Libraries at University of Nebraska-Lincoln

1-2019

FACULTIES APPROACH TOWARDS ASSORTMENT MEASURES ON DIGITAL ARCHIVES: A STUDY

Nanda Kumari E nanda@jncasr.ac.in

Follow this and additional works at: https://digitalcommons.unl.edu/libphilprac Part of the <u>Library and Information Science Commons</u>

E, Nanda Kumari, "FACULTIES APPROACH TOWARDS ASSORTMENT MEASURES ON DIGITAL ARCHIVES: A STUDY" (2019). *Library Philosophy and Practice (e-journal)*. 2224. https://digitalcommons.unl.edu/libphilprac/2224

FACULTIES APPROACH TOWARDS ASSORTMENT MEASURES ON DIGITAL ARCHIVES: A STUDY

E. NANDA KUMARI

Ph. D Research Scholar, Department of Library and Information Science, Periyar University, Salem and Sr. Library cum Information Asst. Gr. I, JNCASR, Bengaluru

DR. E S. KAVITHA

Assistant Professor, Department of Library and Information Science, Periyar University, Salem

Abstract

The digital archive and preservation is advantageous in comparison to traditional archive. For successful creation and maintenance of digital archive and preservation various basic principles should be followed. There are several technological, legal policies and related challenges which have to be solved for successful implementation of digital archive and preservation. The developing countries have started taking interest in digital archive and preservation but facing several challenges on the way. The study attempted to distinguish the level of consciousness on various copyright or legal issues associated with the digital collection and to get opinion from various categories of respondents about criteria guide on selection of materials for digitization. The present study analysis is to know various problems while using digital archives and ways to broadcast to use the IR/ digital archives and discuss about the special skills required for library staff to implement various methods to access the digital collection and defensive measures relating to issues on digitizing the documents in the digital archives

Keywords: Digital Archives, IR,

INTRODUCTION

Digital has become the order of the day due to the significant advances of computer and communications technology have brought in the post Internet information age we are living. Libraries are not lagging behind other social service institutions in exploring the new technology available at any point of time to improve information organization and services. This can be ample justified by the use of non-paper media like microforms for decades to archive less/ selectively used materials

Archives are different from libraries as they give more emphasis to prevention than use. However with digital documents, the distinction between archives and libraries blurs as digital materials being intangible never get decayed or suffer wear and tear like print materials by mere use. It is the archival function in the system of knowledge creation and use the services to identify and retain important source of information and to ensure continuing access to them. Beyond the ubiquitous Web server, there is little consensus about repositories for digital libraries and the field of digital archiving is new. Digital archives are distinct from digital libraries in the sense that digital libraries are repositories that collect and provide access to digital information, but may or may not provide for the long-term storage and access of that information.

There are essentially two motivations for creating and maintaining digital archives.

- First, to ensure that no valued digital information is lost to future generation, and
- Second, certified digital archives will have available to them a critical fail-safe mechanism.

In addition to raw data, digital archiving must preserve ways to interpret the data, to understand its type, its structure, and its formats. Perhaps the most important way that digital libraries can support archiving is through selection regarding what to collect, what to store, what to preserve for the future, and what to discard. The measure of integrity in the preservation process depends on informed and skillful judgments about the definition on the content – the extent to which content depends on its configuration of bits, on the structure and format of its representation, and on the ideas it contains – and for what purposes.

Purpose of the Digital Archives

- Unlike the printed world, digital information cannot be understood without the technical data stored in it, which is normally concealed from the user and needs to be preserved and migrated with the content.
- With the current rapid changes and evolution in hardware and software, digital information needs active management from its inception if it is to survive and be kept accessible across different technological regimes.
- The magnetic and optical media on which digital information is stored are impermanent and cannot be relied upon for preservation of their contents for more than a few years or decades.
- Digital data has allowed the development of new types of information: dynamic resources which are constantly changed and updated, highly contingent on their hardware and software environments for the nature of the experience they create.
- The provenance and context of digital information Is not transparent and easily understood by the user and this needs to be explicitly captured and documented.
- The authenticity of digital information is an issued due to the ease with which digital information can be copied and amended.

- The rights and terms attached (license) to a digital object when it is created or acquired may fundamentally control how or whether a repository can preserve it or make it accessible to future users.
- The substantial volume and rate of growth of digital information places an increased importance on creating resources which are fit for purpose and cost-effective over their full life cycle.

REVIEW OF LITERATURE

Bähr, Thomas (2011) described the necessary knowing about how identified, ranging from digital curation skills needed to evaluate digital data carriers to specialist digital preservation knowledge of file formats needed to describe information with the goal of sustaining accessibility over long-term. It shows how central tasks of digital preservation like process description and preservation planning require expert knowledge of traditional librarian and information technology skills as well as new knowledge which is described as digital preservation skills. Calanag, Maria Luisa (2001) stated about the Selection and metadata issues which surround the preservation of digital information are discussed, in particular, the assignment of "collection levels" to Web materials to ensure preservation,. PMES have been identified as informed by the OAIS as Reference Model. They expressed preservation decision and responsibility for the resource at the time of Chen, Tin-Kai (2014) aimed to digitize video collections hosted by the selection. Museum of Shadow Play of the Kaohsiung City Cultural Affairs Bureau in Taiwan. The study cooperated with the museum and digitizes films kept there, whilst also constructing a Web 2.0 interactive online platform to promote the culture of shadow puppet theatre. The study designed and validated three prototypes of social interfaces representing the cultural context by taking advantage of interactive technology. Hodge, Gail (2004) discussed about OAIS Reference Model which provided the framework for discussing the key areas that impact on digital preservation, the creation of the electronic information, and acquisition policies surrounding the archiving of resources, preservation formats, preservation planning. They are encouraged to monitor developments and projects in the field, to raise awareness of the need for preservation within their institutions, to consider preservation and long-term access issues when negotiating licenses for electronic resources.

Kim, Julia Y (2018) conducted the study about the archives and library communities that had benefited from major innovations in emulation and software preservation. Presently the digital archives were accessible to all users and supported all major operating and desktop systems, and much of the work in determining platform requirements can be made almost invisible to end-users. The study investigated solutions for emulation, also legal issues, metadata, and other impediments to the preservation of software necessary for rendering digital files. **Maxwell, Alexander (2010)** discussed the mission and implementation of digital libraries from an historian's perspective. This paper summarizes the abstract qualities that historians look for their sources, and then

compares various digital archives both qualitatively and quantitatively, highlighting design features that enhance or detract from the ease of use. It gives library scientists candid opinions about an intensive end user of digital information, also contains several practical suggestions, and explains the reasoning behind those suggestions. Muir, Adrienne (2014) discussed that there are various possible approaches in dealing with the issues, including extending legal deposit law, amending copyright and related law, development and use of preservation clauses in licenses or collective licensing and the provision of preservation rights metadata. There is a need for clarification of the legal situation and a raising of awareness. Roles and responsibilities in digital preservation and the impact of new trends in electronic publishing also need to be investigated. Ravenwood, Clare (2015) examined the social context of selection in institutions, in which the responsibilities of stakeholders and relationships between them can affect the material chosen for preservation by practitioners. A range of stakeholders is identified and addressed the relationships between practitioners, information technology staff, and sources of material are found to be crucial. The influence of senior managers is important in providing a mandate and encouraging shared working and networks of expertise.

OBJECTIVES

- 1. To study the consciousness levels on various copyright or legal issues associated with the digital collection
- 2. To get opinion from the respondents about criteria guide on selection of materials for digitization
- 3. To analyse various problems while using digital archives and ways to broadcast the use of IR/ digital archives
- 4. To discuss about the special skills required for library staff to implement and manage the digital collection and defensive measures to be taken to digitize the documents.

METHODOLOGY

The researcher used a design of empirical survey using questionnaire method. This study involves both primary, secondary data and wide interaction with a sample group. Simple random sampling method is adopted to collect data from the faculty members.

DATA ANALYSIS

TABLE 1DISTRIBUTION OF THE RESPONDENTS BY GENDER, AGE ANDFREQUENCY LEVEL OF ACCESSING THE DIGITAL ARCHIVES

	Sl. No	Gender	No of respondents	Percentage
	1	Male	91	75.8
Gender	2	Female	29	24.2
		Total	120	100

	Sl. No	Age	No of respondents	Percentage
	1	Below 35	29	24.2
	2	36-40	67	55.8
Age	3	41-45	10	8.3
	4	46 - 50	7	5.8
	5	Above 51	7	5.8
		Total	120	100
Frequency	Sl. No	Frequency level	No of respondents	Percentage
level of	1	Daily	66	55
accessing	2	Twice a Week	23	19.2
the digital	3	Occasionally	31	25.8
archives		Total	120	100

It is noticed from the table that 76% of the respondents were male and 24% of the respondents were female. It is clear from the table that 56% of the respondents belong to the age group of 36-40. Around 24% of the respondents were below 35 aged and 8% of the respondents belong to the age group of 41-45 age. 6% of the respondents were aged 46-50 and another 6% of the respondents were aged above 51. It is clear that 55% of the respondents were accessing the digital archives daily and 26% of the respondents were accessing the digital archives occasionally. 19% of the respondents were accessing the digital archives twice a week.

TABLE 2 CONSCIOUSNESS ON COPYRIGHT OR LEGAL ISSUES ASSOCIATED WITH DIGITAL COLLECTION

SI. No	Туре		Highly Aware	Aware	Moderately Aware	Somewhat Aware	Never	Total	Mean	Std. Div	Rank
1	Publishers Policy	Ν	27	41	27	13	12	120	2.52	1.237	5
1	T donshers T oney	%	22.5	34.2	22.5	10.8	10	100	2.52	1.237	5
2	2 Sherpa Romeo	Ν	45	29	10	18	18	120	2.46	1.489	4
2	Sherpa Konico	%	37.5	24.2	8.3	15	15	100	2.40	1.407	+
3	Creative Common	Ν	44	25	36	8	7	120	2.24	1.188	2
5	Licensing	%	36.7	20.8	30	6.7	5.8	100	2.24	1.100	2
1	Fair Dealing /Fair	Ν	49	7	31	15	18	120	2.55	1.494	6
4	4 use Rights	%	40.8	5.8	25.8	12.5	15	100	2.33	1.494	0
5	5 Site Licensing -	N	34	7	15	7	57	120	3.38	1.74	10
5		%	28.3	5.8	12.5	5.8	47.5	100	5.50	1./4	10

6	Indian Copyrights	Ν	50	37	8	15	10	120	2.15	1.313	1
0	Act	%	41.7	30.8	6.7	12.5	8.3	100	2.13	1.515	1
7	International	Ν	32	37	30	8	13	120	2.44	1.256	3
/	Copyrights	%	26.7	30.8	25	6.7	10.8	100	2.44	1.230	5
0	8 Confidentiality	N	42	14	8	7	49	120	3.06	1.798	9
0		%	35	11.7	6.7	5.8	40.8	100	5.00	1.790	9
9	Multiple Format	Ν	42	13	23	26	16	120	2.68	1.473	7
,	With the Pollina	%	35	10.8	19.2	21.7	13.3	100	2.00	1.475	/
10	Inter Library Loon	Ν	34	21	16	22	27	120	2.89	1.549	8
10	Inter Library Loan	%	28.3	17.5	13.3	18.3	22.5	100	2.89	1.349	0

The table 2 shows the respondents' opinion about Awareness on copyright or legal issues associated with digital collection which would result in restrictions on its use. It is noticed that 56.7% of the respondents were aware about the publishers policy related copyrights. Around 61.7% of the respondents were aware about Sherpa Romeo type of copy rights and another 57.5% of the respondents were aware about Fair Dealing /Fair use Rights and 34.1% of the respondents were aware about Site Licensing. It is noticed that 72.5% of the respondents were aware about the Indian Copyrights Act, 46.7% of the respondents were aware about the Indian 57.5% of the respondents were aware about the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the Indian 57.5% of the respondents were aware about the International Copyrights. It is noticed that 45.8% of the respondents were aware about multiple format of rights and 45.8% of the respondents were aware about the inter library loan rights.

Among the various factors of the awareness on copyright or legal issues associated with the digital archives, Low level of awareness was noticed on Inter Library Loan, Confidentiality and Site Licensing, Moderate level of awareness was found in Publishers Policy, fair Dealing /fair use Rights and Multiple Format. High level on awareness is noticed on Indian Copyrights Act, Creative Common Licensing, International Copyrights and Sherpa Romeo.

Sl. No	Criteria		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Total	Mean	Std. Div	Rank
1	Preservation	Ν	87	12	6	7	8	120	1.64	1.222	1
1	1 reservation	%	72.5	10	5	5.8	6.7	100	1.04	1.222	1
2	Enhanced Access	Ν	53	38	8	12	9	120	2.05	1.263	2
2	2 Enhanced Access		44.2	31.7	6.7	10	7.5	100	2.05	1.205	Z

 TABLE 3

 CRITERIA GUIDE SELECTION OF MATERIALS FOR DIGITIZATION

3	Archival value	Ν	40	22	38	7	13	120	2.42	1.301	8
3	Archival value	%	33.3	18.3	31.7	5.8	10.8	100	2.42	1.501	0
4	Academic	Ν	45	23	14	27	11	120	2.47	1.420	9
4	Importance	%	37.5	19.2	11.7	22.5	9.2	100	2.47	1.420	9
5	To Sava Space	Ν	60	26	10	10	14	120	2.10	1.405	3
5	To Save Space	%	50	21.7	8.3	8.3	11.7	100	2.10	1.403	3
6	Organizational	Ν	59	11	16	19	15	120	2.33	1.514	6
0	Commitment	%	49.2	9.2	13.3	15.8	12.5	100	2.33	1.314	0
7	Quantity to meet	Ν	38	21	15	23	23	120	2.77	1.538	12
/	user need	%	31.7	17.5	12.5	19.2	19.2	100	2.11	1.336	12
0	8 Subject relevance	Ν	27	20	28	38	7	120	2.82	1.263	13
0	Subject relevance	%	22.5	16.7	23.3	31.7	5.8	100	2.02	1.205	15
9	Cost effectiveness	Ν	64	15	14	14	13	120	2.14	1.455	4
9	Cost effectiveness	%	53.3	12.5	11.7	11.7	10.8	100	2.14	1.455	4
10	Authenticity of	Ν	27	32	36	11	14	120	2.61	1.259	10
10	information	%	22.5	26.7	30	9.2	11.7	100	2.01	1.239	10
11	Distributed access	Ν	55	22	22	11	10	120	2.16	1.322	5
11	Distributed access	%	45.8	18.3	18.3	9.2	8.3	100	2.10	1.322	5
12	Added Value	Ν	30	51	19	6	14	120	2.36	1.242	7
12	Audeu value	%	25	42.5	15.8	5	11.7	100	2.30	1.242	/
13	Ease of	Ν	21	31	18	29	21	120	2.98	1.384	14
15	accessibility	%	17.5	25.8	15	24.2	17.5	100	2.90	1.304	14
14	Logalissues	Ν	27	21	45	11	16	120	2.73	1.282	11
14	Legal issues –	%	22.5	17.5	37.5	9.2	13.3	100	2.13	1.202	11

The table 3 shows the respondents' opinion about various criteria guide selection of materials for digitization in the digital archives. It is clear that 82.5% of the respondents were considering for type of preservation and digitization of digital archives. 75.9% of the respondents thought about enhanced access for digital archives. 51.6% of the respondents considered for archival values. 56.7% of the respondents were thinking of academic importance before digitization of the documents and 71.7% of the respondents have agreed to save the space. It is noticed that 58.4% of the respondents have thought of organizational commitment factor for digitization of materials and 49.2% of the respondents have agreed for criteria of quality of information to meet the user need. It is clear that 39.2% of the respondents have thought about selection of materials based on subject relevance and 65.8% of the respondents about the cost effectiveness. It is noticed that 49.2% of the respondents have discussed about authenticity of information for digital archives and 64.1% of the respondents have agreed for distributed access of digital archives. . It is clear that 67.5% of the respondents have agreed to the point of added values of the digital collection and 43.3% of the respondents agreed about the ease of accessibility to be considered for digitization.

Among the various criteria guide for selection of materials for digitizing the digital archives, Low level of acceptance noticed on Legal issues, Quantity to meet user need, subject relevance, and ease of accessibility. Moderate level of acceptance was found on, Organizational Commitment, added Value, archival value, academic Importance and Authenticity of information. High level of acceptance was found as criteria for preservation, enhanced Access saving the space, cost effectiveness and distributed access.

Sl. No	Problems		Always	Often	Sometimes	Rarely	Never	Total	Mean	Std. Div	Rank
1	Inadequate Funding	N	37	33	26	16	8	120	2.38	1.237	1
		%	30.8	27.5	21.7	13.3	6.7	100			
2	Human resource	N	18	35	41	17	9	120	2.7	1.12	8
		%	15	29.2	34.2	14.2	7.5	100			
3	IT support	Ν	18	57	21	16	8	120	2.49	1.108	3
		%	15	47.5	17.5	13.3	6.7	100			
4	Data storage	Ν	14	26	47	25	8	120	2.89	1.075	12
		%	11.7	21.7	39.2	20.8	6.7	100			
5	Copyright issues	Ν	24	38	34	16	8	120	2.55	1.151	5
		%	20	31.7	28.3	13.3	6.7	100	2.00	11101	-
6	Expertise and	Ν	25	45	29	14	7	120	2.44	1.121	2
0	experience	%	20.8	37.5	24.2	11.7	5.8	100	2.77	1.121	2
7	Support from	Ν	18	29	45	21	7	120	2.75	1.094	9
/	Administration	%	15	24.2	37.5	17.5	5.8	100	2.15	1.074)
8	Rapid Growth	Ν	25	22	37	23	13	120	2.81	1.272	11
0	Kapid Olowin	%	20.8	18.3	30.8	19.2	10.8	100	2.01	1.272	11
9	Sustainability	Ν	31	22	32	23	12	120	2.69	1.314	7
,	Sustainaonity	%	25.8	18.3	26.7	19.2	10	100	2.09	1.314	/
10	Management of	Ν	20	22	23	27	28	120	3.18	1.412	13
10	resources	%	16.7	18.3	19.2	22.5	23.3	100	5.10	1.412	15
11	Partnership /	Ν	27	41	21	17	14	120	2.58	1.30	6
11	Collaboration	%	22.5	34.2	17.5	14.2	11.7	100	2.30	1.50	0
10	Look of Elevibility	Ν	28	25	30	22	15	120	2.76	1.335	10
12	12 Lack of Flexibility	%	23.3	20.8	25	18.3	12.5	100	2.70	1.333	10
12	Look of Exportion	Ν	35	24	34	19	8	120	2 5 1	1.05	4
13	Lack of Expertise	%	29.2	20	28.3	15.8	6.7	100	2.51	1.25	4

TABLE 4MAJOR PROBLEMS WHILE USING DIGITAL ARCHIVES

The table 4 shows the respondents' opinion about major problems faced by them while accessing and developing the digital archives. It is noticed that 58.3% of the respondents mentioned about inadequate funding, 44.2% of the respondents stated about the lack of human resources, 62.5% of the respondents said about the lack of IT support and 33.4% of the respondents faced the lack of sufficient space for data storage for developing the digital archives. It is clear that 51.7% of the respondents were worried about copyright issues and 58.3% of the respondents were about the lack of expertise and experience in accessing the digital archives. It is clear that 39.2% of the respondents faced the lack of support from the administration, 39.1% of the respondents faced the rapid growth of literature and another 44.1% of the respondents were worried about the sustainability problems. for developing the digital archives. It is noticed that 35% of the respondents thought about the management of resources in the digital archives and 56.7% of the respondents considered about the partnership and collaboration areas of digital archives. Around 44.1% of the respondents faced the lack of flexibility in maintaining the digital archives and 49.2% of the respondents were worried about lack of expertise in developing and accessing the digital archives.

Among the various problems faced by the respondents while accessing and developing the digital archives, Least preference of barrier to be mentioned by the respondents like lack of Flexibility, rapid Growth on literature, data storage and Management of resources. Moderate respondents were lack of Partnership /Collaboration, Sustainability, lack of Human resource support and lack of support from Administration. Mmajority of the respondents faced inadequate funding, Expertise and experience, IT support, lack of Expertise and Copyright issues

	WATS TO FUBLICIZE TO USE THE IK/ DIGITAL ARCHIVES													
SI. No	Factors		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Total	Mean	Std. Div	Rank			
1	User orientation	Ν	32	40	20	16	12	120	2.47	1.289	1			
1	User orientation	%	26.7	33.3	16.7	13.3	13.3 10 120	2.47	1.209	1				
2	2 Intimation	Ν	25	22	29	27	17	120	2.91	1.347	5			
	through email	%	20.8	18.3	24.2	22.5	14.2	100	2.91	1.347	5			
3	Notice board	Ν	29	22	33	23	13	120	2.74	1.312	4			
5	Notice board	%	24.2	18.3	27.5	19.2	10.8	100	2.74	1.312	4			
4	Pamphlets	Ν	26	24	42	17	11	120	2.69	1.222	3			
4	1 ampinets	%	21.7	20	35	14.2	9.2	100	2.09	1.222	5			
5	Sominor	Ν	27	24	41	24	4	120	2.62	1 1 2 0	2			
5	Seminar -	%	22.5	20	34.2	20	3.3	100	2.02	2 1.139	2			

TABLE 5WAYS TO PUBLICIZE TO USE THE IR/ DIGITAL ARCHIVES

The table 5 shows the respondents opinion about ways to publicize the use of digital archives. It is noticed that 60% of the respondents agreed about user orientation to

help to publicize the effective use of digital archives. Around 39.1% of the respondents agreed about intimation through emails which promote the effective use of digital archives and another 42.5% of the respondents agreed about display on notice boards will promote the digital archives. 41.7% of the respondents agreed about using the pamphlets to promote the digital archives and 42.5% of the respondents agreed about promoting the digital archives by conducting seminars.

Among the various ways to publicize the use of digital archives, some of the respondents suggested to promote through email and notice board. Majority of respondents suggested to publicize the digital archives through user orientation, Seminars, and pamphlets to publicize the digital archives.

SI. No	Factors		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Total	Mean	Std. Div	Rank
1	Technical skills	Ν	32	30	31	18	9	120	2.52	1.243	1
1	r cennicar skins	%	26.7	25	25.8	15	7.5	100	2.52	1.243	1
2	Assistance in	Ν	16	32	43	19	10	120	2.79	1.122	5
	² digitization	%	13.3	26.7	35.8	15.8	8.3	100	2.19	1.122	5
3	Convright advise	Ν	16	51	26	18	9	120	2.61	1 1 2 5	2
5	Copyright advice	%	13.3	42.5	21.7	15	7.5	100	2.01	1.125	2
	Ensuring material	Ν	33	23	29	20	15	120			
4	availability for long	%	27.5	19.2	24.2	16.7	12.5	100	2.68	1.367	4
	term	NT	21	22	26	22	0	120			
	Allowing other	N	31	22	36	22	9	120			
5	5 institutions to view the material	%	25.8	18.3	30	18.3	7.5	100	2.63	3 1.256	3

TABLE 6 ATTITUDE TOWARDS SPECIAL SKILLS REQUIRED FOR LIBRARY STAFF POSSESS IN THE FIELD OF DIGITAL PRESERVATION

The table 6 shows the respondents' attitude towards special skills required for library staff to possess in the field of digital preservation. It is noticed that 51.7% of the respondents agreed that the library staff must have adequate technical skill to manage the digital archives. Around 40% of the respondents agreed about the library staff need for assistance in digitization. 55.8% of the respondents agreed about the library staff to know about the copyright advices. 46.7% of the respondents accepted to ensure the material availability for long term through the library staff. 44.1% of the respondents agreed about allowing other institutions to view the material.

Among the various special skills required for library staff to possess in the field of digital preservation, some of the respondents had mentioned about ensuring material

availability for long term and assistance towards digitization. Most of respondents agreed for required skills on technical skills, Copyright advice, allowing other institutions to view the material.

TABLE 7

OPINION ABOUT THE PROTECTIVE MEASURES RELATING TO WHILE DIGITIZING THE DOCUMENTS IN THE DIGITAL ARCHIVES

Sl. No	Factors		Strongly Agree	Agree	Neutral	Disagree	Strongly Disagree	Total	Mean	Std. Div	Rank
1	Future changes in	Ν	20	36	37	18	9	120	2.67	1.147	3
1	hardware technology	%	16.7	30	30.8	15	7.5	100	2.07	1.14/	5
2	Future changes in	Ν	24	48	33	10	5	120	2.37	1.028	1
2	software technology	%	20	40	27.5	8.3	4.2	100	2.57	1.020	1
3	Security issues	Ν	14	31	50	20	5	120	2.76	1.004	4
5	Security issues	%	11.7	25.8	41.7	16.7	4.2	100	2.70	1.004	4
4	Copyright issues	Ν	13	24	47	27	9	120	2.96	10.8	5
4	Copyright issues	%	10.8	20	39.2	22.5	7.5	100	2.90	10.8	5
_	Copying and updating incase of	N	18	22	65	10	5	120	2 (0)	0.07	2
5	obsolescence of storage device	%	15	18.3	54.2	8.3	4.2	100	2.68	0.97	2

The table 7 shows the respondents' opinion about the protective measures related to digitizing the documents in the digital archives. It is noticed from the table that 46.7% of the respondents agreed to adopt the future changes in hardware technology while digitizing the documents in the digital archives. Around 60% of the respondents agreed about adopting the future changes in software technology while digitizing the documents in the digital archives agreed about security issues related to digital archives. 37.5% of the respondents agreed about security issues related to digital archives and 33.3% of the respondents agreed upon copying and updating incase of obsolescence of storage device for digital archives.

Among the protective measures relating to digitizing the documents in the digital archives, moderate levels of concern were identified on Security and copyright issues. Most of the respondents showed concern about the, future changes in software technology, copying and updating incase of obsolescence of storage device and future changes in hardware technology.

Findings and Discussions

- It is noticed that high level on consciousness is noticed on Indian Copyrights Act, Creative Common Licensing, International Copyrights and Sherpa Romeo.
- There is need to bestow more consciousness on Inter Library Loan, Confidentiality and Site Licensing
- Majority of the respondents agreed to follow preservation, enhanced Access saving the space, cost effectiveness and distributed access.
- It is identified that majority of the respondents faced the inadequate funding, Expertise and experience, IT support, lack of Expertise and Copyright issues while accessing and developing the digital archives.
- The study indicated that more number of respondents suggested to publicize the digital archives through user orientation, Seminars, and pamphlets to publicize the digital archives.
- Some of the respondents suggested to promote through email and notice board to publicize the digital archives.
- It is suggested that more number of respondents agreed to the requirement on technical skills, Copyright advice, allowing other institutions to view the material for assistance towards digitization.
- It is clear that more number of respondents have shown concern about the, future changes in software technology, copying and updating incase of obsolescence of storage device and future changes in hardware technology.

Conclusion:

Digital archive seeks to preserve the information in digital format regardless of media on which the information is stored Digital preservation is the management and maintenance of digital objects which can be accessed and used by future users. The main goal of digital archive ensures the long-term preservation of digital data so that it remains accessible for appropriate use in future. Selection of physical storage for digital material in an archive is also a serious issue. Any physical storage medium is completely dependent upon very specific combination of hardware and software for access. The study attempted to draw the attention of the users towards digital archives on their copyright awareness and their own criteria for the digital collection. The digital archives policies and the strategy is simple, and to know about the digital collection which could identify possible partners and projects. Digital archives helps in identifying the importance of the users with their associated specific needs. The digital archive and preservation is advantageous in comparison to traditional archive. For successful creation and maintenance of digital archive and preservation various basic principles should be followed. There are several technological, legal policies and related challenges which have to be solved for successful implementation of digital archive and preservation.

References

- 1. Asogwa, BE (2011) Digitization of Archival Collections in Africa for Scholarly Communication: Issues, Strategies, and Challenges'. Library Philosophy & Practice, 1–14.
- 2. Asogwa, EB and Ezema, JI (2012), The challenges of preservation of archives and records in the electronic age⁴, *PNLA Quarterly*, 76(3)
- Bähr, Thomas (2011) Puzzling over digital preservation Identifying traditional and new skills needed for digital preservation, 217 — Education for digital curation — Education and Training Section with Preservation and Conservation, Information Technology; co-sponsored by ICA Section for Archival Education and Training, 1-14, http://conference.ifla.org/ifla77
- 4. Calanag, Maria Luisa (2001) A Metadata Approach to Digital Preservation, Proc. Int'l. Conf. on Dublin Core and Metadata Applications 2001, 143-150
- 5. Chen, Tin-Kai (2014) A Case Study of a Digital Archives Programme: The Development of Digital Shadow Plays in Taiwan, International Journal of Humanities and Arts Computing, Feb 2014, vo. 8, No. supplement : pp. 38-48
- Hodge, Gail (2004) Preservation of and Permanent Access to Electronic Information Resources, RTO IMC Lecture Series on "Electronic Information Management", held in Sofia, Bulgaria, 8-10 September 2004, and published in RTO-EN-IMC-002.
- 7. Kim, Julia Y (2018) Researcher Access to Born-Digital Collections: an Exploratory Study, *Journal of Contemporary Archival Studies*, 5(7). Available at: https://elischolar.library.yale.edu/jcas/vol5/iss1/7
- Maxwell, Alexander (2010) Digital archives and history research: feedback from an end user, Library Review, 59(1), 24-39, <u>https://doi.org/10.1108/00242531011014664</u>
- 9. Muir, A. (2004). Digital preservation: awareness, responsibility and rights issues. *Journal of Information Science*, *30*(1), 73-92.
- 10. Ravenwood, C., Muir, A., & Matthews, G. (2015). Stakeholders in the selection of digital material for preservation: Relationships, responsibilities, and influence. *Collection Management*, 40(2), 83-110. <u>https://doi.org/10.1080/01462679.2015.1011816</u>