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DIGITAL LITERACY COMPETENCY AMONG LIBRARY USERS OF CENTRAL UNIVERSITY OF JHARKHAND: A STUDY

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ABSTRACT

The literacy in digital world requires acquiring, exploring, managing, accessing, presenting, and using digital contents in easy manner. It is the skill to utilize and operate digitally enabled tools and software's to perform effectively in digital world which requires cognitive skills, technology sound and web competency. The present study attempts to assess digital literacy skills and competencies among library users of central university of Jharkhand. An organized and structured questionnaire was framed having open and close end questions and was randomly distributed among users. It was observed that majority of users are aware of web tools and comfortable in online environment. The student needs training and digital literacy program for better work output. It further discusses understanding level of digital components, web technology application in learning and research, problem faced while using internet components. The paper also deals with awareness of various databases, e-learning tools and various types of literacy such as information literacy, web literacy, ICT literacy etc.

KEYWORDS: *Digital literacy, computer literacy, web literacy, ICT literacy, media literacy*

1. INTRODUCTION

With the advancement of information and communication technology, various aspect regarding performing things in different manner has been replaced .The demand of present scenario is to have skills and competencies at its best face so as to complete simultaneous work with an ease and comfortability that allows one to be self-confident and motivated. ICT allowed to advance various information available in online mode, gateways, and also helped to create digital library functioning globally where multiple users can avail benefits as per their requirement. Digitally sound is the need of hour which enables one to be a flawless performer dealing with electronic environment, where present era demands information and digital literacy competencies to supersede in research, academics and beyond. Literacy of digital environment is multiple related literacy and usability of web technology in smooth manner where one has the ability to know, acquire, access, evaluate and utilize data and information for enhancement of research outputs and succeed in lifelong learning. The thing needed in digital competent context includes accessing, utilizing digital contents to produce new, navigation techniques, quality evaluation and validation of information, comfortability zone with current tools, awareness and understanding of cyberspace like stuffs. The literacy of digital tools and technology is primary requirement in the world of web environment with awareness and updating of latest trends is the demand of present scenario either it may be in education, research, hospitality, banking and many other sectors. The capability to monitor, view, plan, search, retrieve wealth of information in easy manner and utilize it efficiently is one of the basic demand in digital world. The basic requirement to be called as digital competent is to possess self-regulated learning capabilities and availing it in efficient manner. The learning and digital environment correlates in the present era because each and every steps destination goes to online environment.

The emerging concept of digital literacy allows one to be self –efficient, provide users for creating and framing user centred environment for effective communication and also helps to maintain ones quality in internet era. The literacy of digital world allow students to make use of various tools which enhance their learning values and improve educational experience. The digital literacy element encompass competency to know need of information, how to locate, evaluate, gauge, analyse and apply the needed information. The digital environment impact various precinct which essentially imparts tutoring user community to rectify right information

and knowledge to right time. The learning gains of web tools is the present thing which is needed to be focused and discussed in digital literacy context.

The present study deals with digital competency of tools and technologies among library users where data collection methodology was adopted by framing questionnaire in open and close end format. The investigator attempts to collect data related to digital literacy of tools and technologies among users of central university of Jharkhand, where he also tries to get answers related to level of competency, comfortability with learning tools, web usability trends, awareness and application of web things.

2. DEFINITION OF DIGITAL LITERACY

The term digital literacy was coined by Paul glister with the commencement of the term in his book entitled **"Digital Literacy"** by defining it as ability to understand and use information in various formats from a distributed range of resources when presented with the help of computers Gilster (1997).The American Library association (2013) defined it as the capability to use ICT to find, evaluate, create and communicate information, requiring both cognitive and technical skills. Digital literacy demand knowledge of technology and being updated about how and where it can be used for access of needed information. The person can be called as digitally sound if he/she is capable of collaboration and communication and also self -efficient to learn and deal web stuffs easily. It deals with wider aspect of effectively search, create, utilize, evaluate, collaborate and synthesis information when in need of it. Digital literacy is crucial to any one in order to be stable at any environment or at any place either it be higher education, teaching, research, or any kind of job. Increasingly, it is becoming foremost for transfer of information and in communication process enabling to cope with intellectual, social and cultural barriers. The need is to integrate various programme, devices and web into academic sector to guarantee students technology literacy side. The digital literacy consists of various types such as media literacy, mobile literacy, computer literacy, visual literacy, web literacy etc. which enables one to be competent in creating, accessing, recognizing, maintaining ,operating the information as per their best capacity. The skills to define, access, evaluate, manage, integrate, create and communicate easily is needed in present scenario where one needs to develop all the skills so as to deal easily in online environment.

Figure 1: Digital Literacy Skills
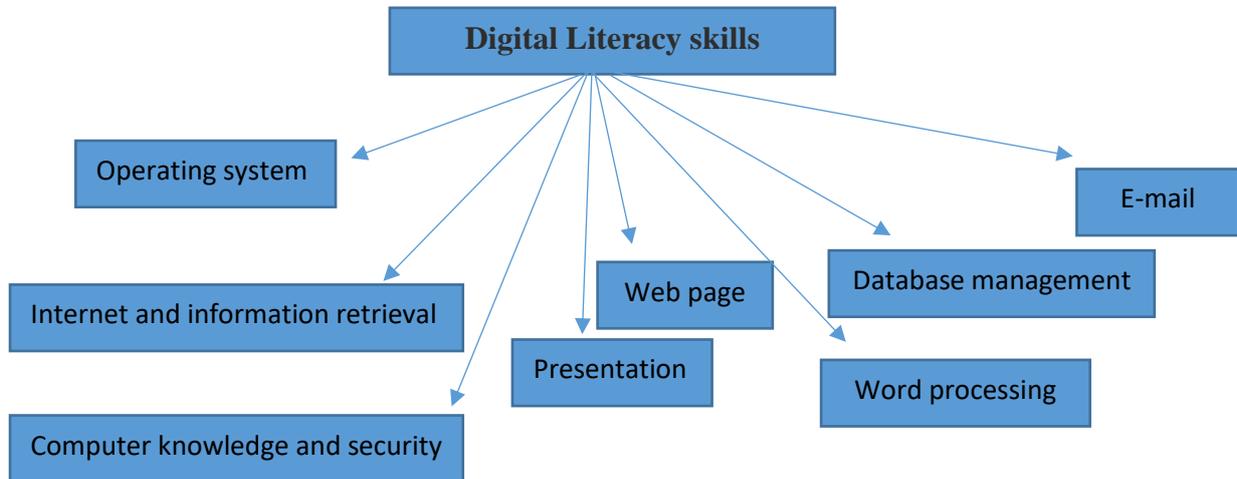
3. REVIEW OF RELATED LITERATURE

The literature survey is organized search of issued task in particular field of interest by investigator from secondary sources. Various databases has been reviewed for present study to take an idea about the particular topic.

Van Laar et al (2017) mentioned the present era aims on creation, collaboration, communication, innovation in online environment. The skills among professionals drive organization to another level of competition. The study examines the digital skills and 21st century skills and provide a framework for knowledge worker. The literature review shows 21st century skills are broader than digital skills. Several core skills were identified: communication, collaboration, creativity, technical, information management, critical thinking, cultural awareness, self-direction, flexibility, lifelong learning.

Gallardo-Echenique et al (2015) stated ICT in new form such as third generation web, concept like robotics, artificial intelligence, online learning worlds,3D printing require new literacies. In present knowledge society digital competence is a subject of skills, understanding, and creativity of learners and to fulfil the needs. This concept can be presented in various terms such as e-competency, computer literacy, e- skills, technology competency, Digital literacy, Digital competency, media literacy, virtual literacy in teaching and learning, academic literature practices. The paper reflects digital competency literature of 73 articles published between 1990 and 2014 with multi-faceted concepts from various backgrounds where one

defines digital competence ass technical use of ICT and others represent it as 21 st century skills. Shopova (2014) states the paper reflects digital literacy skills and competency of users to avail new trending tools and technologies and integration in European higher education area. To increase the effectiveness and expertise in learning process the knowledge of digital components play a vital role. It entails an empirical element to analyse the pattern followed by students to use ICT skills in learning activity .The literacy not only give confidence to improve their results but also gives an opportunity to be fortunate to deal in this ever changing era of life and tasks. Koltay (2011) stated media message focus on three concepts media literacy, information literacy, and digital literacy. The paper focus on nature of literacies, similarity and differences. In addition to the literature review many other studies were done on use of ICT and its application in library and information services and assessment of competency skills among library professionals in handling ICT in libraries. To access the status of modern technology no systematic work have been attempted by researcher.

Maranto and Barton (2010) study reveals how tools of web 2.0 such as Facebook, Myspace works and implemented in classroom and also compares how teachers, students and administrators use them to secure integrity.

4. OBJECTIVES

1. To analyse digital competency level among library users.
2. To analyse comfort level of library users with ICT.
3. To know the use of computer in learning process.
4. To know about frequently used databases by users.
5. To know the problems being faced by users.

5. SCOPE

The present study intends to be aware of digital literacy competency level among library users of central university of Jharkhand .It basically focuses on various skills and comfort level for learning and research outputs by student community. The scope is limited to library users of central university of Jharkhand**.**

6. RESEARCH METHODOLOGY

The study was conducted in central university of Jharkhand to be aware of digital skills and competency level of library users. The data was collected with the help of survey method where questionnaires were used as a survey tool. Both online and offline mode of questionnaires were distributed among sample of 97 library users, where 83 response were collected for further statistical process.

7. DATA ANALYSIS:-The date gathered from the students was analysed and represented with the help of table figures and charts by using percentage technique. The profile of respondents has been gathered and full information has been presented in this part.

Table 1: Distribution of Questionnaires

The questionnaire distributed and response obtained by library users is presented in form of tables.

Questionnaires /Google form link provided	Response received	Percentage
97	83	85.56%

A total 97 questionnaires were distributed in form of Google link and physical mode to users of library in central university of Jharkhand. Out of total 83 response was collected back and the total percent of received response was 85.56.

Table 2: Distribution of Questionnaires as per educational status (n=83)

Questionnaires /Google form link provided	Response received	Percentage
PG	38	45.78%
Research scholar	45	54.21%

Table 2 describes the student's educational background who contributed in providing response. It is noted that 38 (45.78%) PG users and 45 (54.21%) research scholars provided the response with more response rate.

Table 3: Library visit (n=83)

Library visit	Responses	Percentage
Daily	43	51.80%
Weekly	34	40.96%
Monthly	6	7.22%

Table 3 shows the data of library visits by the students. It is noted that 51.80 % users visit library on daily basis.40.96% visit on weekly and 7.22% visit to library in a month.

Table 4: Purpose of library visit (multiple option, n=83)

Purpose of library visit	Strongly agree	Agree	Uncertain	Disagree
To borrow/return book	47(56.62%)	33(39.75%)	3(3.61%)	0(0.00%)
To write articles for publication	44(53.01%)	28(33.73%)	8(9.63%)	3(3.61%)
To read journal articles	38(45.78%)	32(38.55%)	9(10.84%)	4(4.81%)
To refer thesis and dissertations	45(54.21%)	30(36.14%)	2(2.40%)	6(7.22%)
To update subject knowledge	39(46.98%)	38(45.78%)	4(4.81%)	2(2.40%)
To access & use Internet/ e-resources	53(63.85%)	28(33.73%)	2(2.40%)	0(0.00%)
Consulting reference materials	37(44.57%)	36(43.37%)	7(8.43%)	3(3.61%)

Table 4 shows the purpose of library visit. It has been recorded that in strongly agree category 53(63.85%) users visit library to access & use Internet/ e-resources. whereas in agree category highest response was gained by to update subject knowledge with 45.78%.

Table 5: ICT skills and level of Digital literacy competency (n=83)

Comfort level of using computer application	Response	Percentage
Comfortable	59	71.08%
Less comfortable	7	8.43%
Neutral	17	20.48%

Table 5 shows the ICT skills and level of Digital literacy competency where comfort level by using computer was tried to know. The response reflects that 71.08% users are comfortable in using computer.20.48% users provided neutral response and 8.43% users were less comfortable in using computer for their work.

Table 6: Use of computer application in academic learning purpose (multiple choice, n=83)

| Use of computer application in academic learning purpose	Strongly agree	Agree	Uncertain	Disagree
Word processing	53(63.85%)	22(26.50%)	5(6.02%)	3(3.61%)
Presentation	49(59.03%)	28(33.73%)	4(4.81%)	2(2.40%)
online classes	46(55.42%)	34(40.96%)	3(3.61%)	0(0.00%)
web design	23(27.71%)	21(25.30%)	22(26.50%)	17(20.48%)
communication and collaboration	42(50.60%)	38(45.78%)	2(2.40%)	1(1.20%)
web search	53(63.85%)	27(32.53%)	3(3.61%)	0(0.00%)

Table 6 reflects use of computer application in academic learning purpose where in strongly agree category maximum response was gained by word processing and web search with same percent i.e. 53(63.85%).In agree category maximum response was gained by communication and collaboration with 38(45.78%).In uncertain category web design gained maximum response with 22(26.50%).

Table 7: Use of virtual application in learning purpose

Use of virtual application in learning purpose	Response	Percentage
wizIQ	22	26.50%
Google meet	83	100.00%
Zoom	82	98.79%
Cisco WebEx meetings	28	33.73%
GoToMeeting	38	45.78%

Table 7 shows use of virtual application in learning purpose where maximum respondent use Google meet for learning purpose with 100% followed by zoom with 98.79%.The lowest response was observed by wizIQ with 26.50%.

Figure 2: Use of virtual application in learning purpose
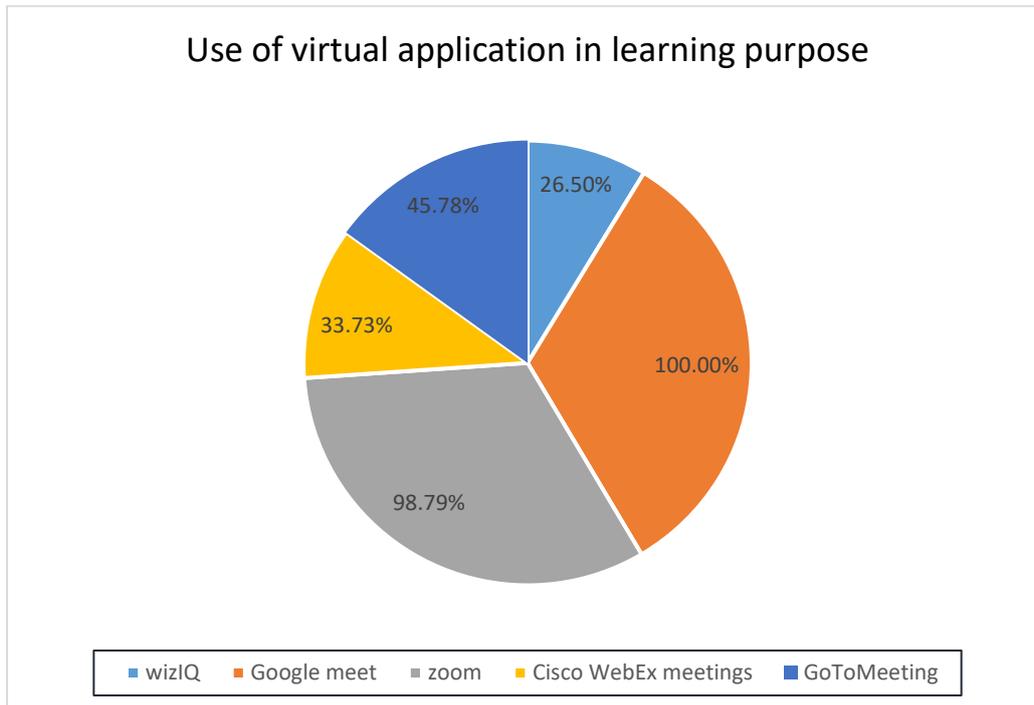
Table 8: Frequently used Database (multiple choice, n=83)

Frequently used Database	Response	Percentage
JSTOR	23	27.71%
Scopus	33	39.75%
DOAJ	61	73.49%
Emerald Insight	36	43.37%
Google scholar	72	86.74%
Other	49	59.03%

Table 8 shows frequently used Database where Google scholar was preferred by respondents with 86.74% followed by DOAJ with 73.49%.59.03% users responded in other category. The lowest response rate was gained by Scopus database category.

Table 9: Use of reference management software for referencing (multiple choice, n=83)

Use of reference management software	Response	Percentage
Citation Machine	57	68.67%
Zotero	64	77.10%
Easy Bib	41	49.39%
CiteThisForMe	46	55.42%
Bib Me	56	67.46%
Not used	13	15.66%
Any other	24	28.91%

Table 9 shows use of reference management software for referencing in which Zotero gained highest response with 77.10% followed by Citation Machine with 68.67%.In not used category 15.66% response was observed with the lowest response rate among all category.

Table 10: problems in accessing digital contents (multiple choice, n=83)

Problems	Strongly agree	Agree	Uncertain	Disagree
Lack of literacy	27(32.53%)	38(45.78%)	11(13.25%)	7(8.43%)
Difficulty in finding relevant information	29(34.93%)	37(44.57%)	12(14.45%)	5(6.02%)
Lack of web skills	26(31.32%)	40(48.19%)	13(15.66%)	4(4.81%)
Time constraint	22(26.50%)	42(50.60%)	16(19.27%)	3(3.61%)
slow Internet	31(37.34%)	39(46.98%)	11(13.25%)	2(2.40%)
Unprofessional content	32(38.55%)	40(48.19%)	5(6.02%)	6(7.22%)
Lack of training /orientation	19(22.89%)	46(55.42%)	13(15.66)	5(6.02%)

Table 10 show problems in accessing digital contents. It has been recorded that in strongly agree category 32(38.55%) users face problems with unprofessional contents availability. whereas in agree category highest response was gained with 46(55.42%) in lack of training /orientation. Maximum disagree response was gained in lack of literacy with 7(8.43%).

CONCLUSION

To survive in digital era literacy of information and digital culture is primary requirement. Digital literacy for an individual is to be competent in dealing with digital stuffs which is about operating in digital society by using technologies to engage in modern society. It encompasses system of techniques, skills, expertise to function smoothly in online environment. To strengthen one's own side there is need to be of digital friendly which enables to tackle various obstacles in fulfilling tasks. To access right information at right time technology skills allows one to do the same with confidently and assurity. All the sectors demands techno friendly mind and digital competency as in completion the need of required information.

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