AWARENESS AND PARTICIPATION ON INFLIBNET ACTIVITIES: A CASE STUDY ON FACULTIES, RESEARCH SCHOLAR AND LIBRARY STAFFS OF STATE AND DEEMED-TO-BE UNIVERSITIES IN INDIA

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Library is just a medium of information communication and Universities are the platform, serving information is the first and foremost duty of a library and here INFLIBNET works as a channel of this communication system. INFLIBNET provides e-Books, e-Journals, e-Synopsis, e-Theses, Plagiarism checking, expert database provider etc services through a bunch of activities for Institutions. Making awareness and maximum use of resources is the main motto of this study. A structured questionnaire was distributed among faculties, research scholars and library staff of Indian states and Deemed Universities (under section 12B and 2F of UGC). 76.25% respondents gave their feedback where 93.4% was aware and among aware persons only 88.6% were habituated to use but other 11.4% became non-user even after awareness. Most of the faculties and research scholars preferred e-journals, e-database and plagiarism checking services. Prepare study materials, article processing, reference/ citation and research study was the main purpose of beneficiaries. After testing hypotheses it has proven that most of the users satisfied by using INFLIBNET activities but lack of search knowledge, lack of relevant source of information, lack of supporting staff and access restriction on subscription based services was faced in most time by users. According to results it was suggested that INFLIBNET and Institutions had to take an initiative to develop well infrastructures and organized more seminars, workshops and training programs for students, faculties even library staff for awareness and ultimate use of the INFLIBNET activities.

Keywords: Library consortia, ICT awareness, INFLIBNET, Open-Access resource, Plagiarism, University library-India

INTRODUCTION

A statement made by S. Radhakrishnan that "Library is a heart of Institution" (Radhakrishnan, 1952). But in the modern age the only library without resources is like 'Boat without a boat-man'. In our higher education system all universities become busy for better rank from NAAC or NIRF but they are not aware how to get this success, without education, research

and development activities it is impossible (Hanchinal, 2019). Research and development is the backbone of national as well as Institute development and without information, ICT knowledge, Journal, Database, e-books, scholarly communication network and expert guidance it is far away. 'No library is an Island' told by Donald Urquahart, that means no library can stand without support, it cannot be self-sufficient (Urquhart, 1982). According to the University educational commission (1948-49) 6.25% of total budget of a university can be spent for library purposes but it is not enough in this information explosion era where serial crisis and access crisis bound all around (Bansode & Burungale, 2019). To avoid a serial crisis and access crisis consortium was created but that was also unaffordable for a library, then in 1996 INFLIBNET services were adequate. At the beginning there were no enough services in INFLIBNET but now a bundle of activities gifted to help the libraries as well as universities in all aspects.

WHY INFLIBNET?

In India there are a total 979 universities (54 Central, 425 State, 125 Deemed, 375 Private University)and nearly 800000 students enter every year (University Grants Commission, , 2021) but every university or college has no enough resource and infrastructure in the library to fulfill their requirements (Joshi, 2014). Due to information explosion students do not get their information. To provide facilities as maximum as possible in 1996 an autonomous Inter-University Centre was created named as Information and Library network (INFLIBNET) by UGC (Hanchinal, 2019). Now it became the backbone

of universities by its activities. It is a largest platform for seamless and optimum utilization of resources by not only for students, Research scholars and Faculties are also sucking its sweetness (Waghmode, 2014). Some important activities are briefly discussed below.

E-Shodhsindhu: It is a consortium merged with UGC-Infonet, N-LIST and INDEST-AICTE. Now it contains more than 10000 core documents, peer-reviewed journals, database which can be used by central funded technical institutes, Universities and colleges (under section 12 (B) and 2 (F) of UGC act).

Shodh Shuddhi: Plagiarism checking is now a necessary service for research scholars and faculties in an Institute. But the annual subscription or purchase rate of a plagiarism checker is unaffordable. To overcome this problem INFLIBNET started an activity 'Shodh Shuddhi', students, faculties can check plagiarism freely in 'URKUND' software through Institutional login. Daily 79000 documents submitted for plagiarism checking.

N-List: It is also a consortium that provides e-journal and e-books with minimum cost per annual. But it is only for the Govt. aided college under section 12B and 2F of UGC act and Non-aided college (except Agriculture, Engineering, Management, Medical, Nursing, Pharmacy).

InfiStats: This is a usage statistics monitoring protocol by INFLIBNET. InfiStats directly harvest COUNTER usage data from publisher websites through SUSHI protocol. Member institutes can also monitor the e-resource usage activity.

INFED: Indian Access Management Federation (INFED) service implemented to avoid IP base access limitation. It used Shibboleth software which authenticates the authenticate user to provide seamless access from anywhere at any time.
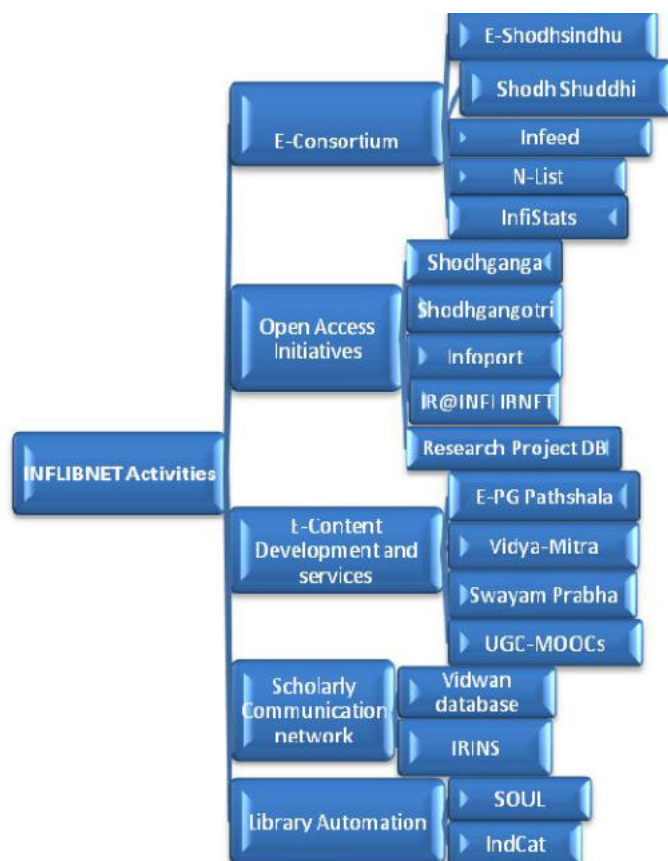

Figure-1: Flow chart of INFLIBNET activities

Shodhganga: It is a digital repository of electronic theses and dissertation by INFLIBNET. It is an open access platform; anyone can view, download, disseminate resources without permission or login. Total 476 universities contributed and 570 universities signed MoU.

Shodhgangotri: It is an open platform for approved synopsis of Ph.D. students. This platform helps to avoid duplication of research work. But only 94 universities contributed till now.

IR@INFLIBNET: It is an Institutional repository that contains various training, press clipping, news letter, publication, study material etc. DSpace software is used in this platform.

Infoport: Infoport is an open access subject gateway for Indian researchers. All subjects and subcategories are arranged by DDC classification scheme.

Research Project DB: It is an ongoing project database by INFLIBNET where ongoing projects, experts of projects assemble there. Till now, 13600 projects have been registered which are funded by UGC, ICAR, ICMR etc. But only metadata and abstract of projects are available.

Vidwan Expert Database: Vidwan is a database of experts, scientists scholars etc. who are involved in teaching, research or development organization. Through registration any student can contact or view their personal details. This is a hub of experts of different subject fields. Students, research scholars and even faculties can improve themselves, share their knowledge and explore with collaboration.

Vidwa-Mitra: It is an online learning portal for e-content projects, under NME-ICT. Through registration users can browse textual material, multimedia and get an e-tutorial, self-assessment facility.

IRINS: This is a research information management service portal through INFLIBNET.

Nowadays scholarly communication activities are essential for research purposes but there is not enough such a network for research purposes. This web based service can open this platform to create a scholarly communication network. IRINS provide visualization, research impact and discovery of experts with their unique ID (ORCID, Scopus ID, and Research ID).

E-PG-Pathshala: This is an open gateway for post graduate students in different categories of subjects' materials, e-book (e-Adhyayan), online courses (MOOCs), and software related courses (e-Pathya).

UGC MOOC, Swayam Prabha DTH channel provides a bunch of facilities and ICT skill development programmes. Learning management service provides information service and organized skill awareness service (workshop, seminar, etc.) on how to use those all activities of INFLIBNET all over India.

IndCat: IndCat is a union catalogue of India that contains only bibliographic books, theses, serials for major universities and Institute. In the age of information pollution finding original and reliable sources of information is the most difficult job for a scholar or a faculty but from IndCat they can easily find the source of information as well as inter-library loan service can provide them exact documents also.

SOUL: It is an Integrated Library Management Software. Over 3800 institutes use it. It is very handy and reliable software for libraries with technical support from INFLIBNET but it is commercial software RS.80000/- is for full

edition first copy. SOUL 3.0 is the latest version in 2021.

REVIEW OF LITERATURE

Evaluation of related literature is a scope of further study and development. Literature review can find the gape where new research grows up.

Solanki (2016) did a survey on Sourashtra University and colleges on faculties, PG and UG students on the use of N-List programme (Solanki, 2016)and the result was only 26% of students used that. Bansode and Burungale (2019) describe in their research paper 100% of Shivaji University faculties and students used INFLIBNET services very well but only 17% were satisfied with these services (Bansode & Burungale, 2019). Main problem was university infrastructure and lack of search knowledge. Joshi (2014) in her study stated that UGC-Infonet as a digital consortium for Gujarat University is not well (Joshi, 2014). Only 57.20% students used UGC-Infonet where it is situated in Gandhinagar. Waghmode (2014) elaborated his paper on the service of INFLIBNET in higher education in India. Every specific service was described in detail (Waghmode, 2014). But how to use those services, why Institutes need these services was absent. Nagesh (2015) in his Ph.D. theses analyzed the use of ICT and technology in DRDO, where most updated journals, databases and infrastructure was updated but lack of proper knowledge, lack of awareness those resources stay on unfolding mode (Nagesh, 2015). The budgeting system of a University where he analyzed lack of budget and insufficient

infrastructure damaged the whole educational process (Bansode & Burungale, 2019). Only the University campus building is not enough, necessary services, instruments and facilities should be there.

OBJECTIVES OF THE STUDY

The exact objective of this study is investigating the ultimate usage of INFLIBNET activities among Indian state and Deemed Universities. Some specific objectives are stated below:

1. To study the concepts and necessity of INFLIBNET activities among University' faculties, research scholars (RS) and library staff (LS).

2. To know how faculties, research scholars and library staffs can get maximum facilities through workshop, seminar from INFLIBNET

3. To examine usefulness and mostly usable services of INFLIBNET resources

4. To analyses the exact purpose and preferences of using INFLIBNET services

5. To digest their level of satisfaction and measure access frequency

6. To identify their problems and feedback against university and INFLIBNET

SCOPE AND LIMITATION OF THE STUDY

This research paper was conducted to fulfill objectives. Awareness and use of different activities of INFLIBNET by all States and Deemed university of India is the main scope of this study (Sinha & Bhattacharjee, 2013). Total 110000 questionnaires were distributed among 550 universities. After prepared a Google-form as questionnaire for distribution through e-mail but during survey time we faced 5% Universities have no library details, no faculty details. So we failed to collect 3% of questions from the library and Library staff. Another drawback is that in my study private University, central University, National Institute and their UG, PG students are absent.

CURRENT STATUS

According to E-shodhsindhu, N-List, Shodh Shuddhi and INFED guidelines only govt. aided Institutes or Universities which are under section 12B and 2F of UGC act, 1956 can register (Hanchinal, 2019) and use the e-resources (Non aided colleges excluding Agriculture, Engineering, medical, Nursing, Pharmacy can register in N-List programmed) (Pragasam, 2016). Institute has to register with all supporting information, then the mentioned above authority provides a login ID and password. But Shodhganga, Shodhsindhu, IR@INFLIBNET, Infoport and others activities are totally open for any individual users (Solanki, 2016). A brief table has been prepared on the basis of current status of INFLIBNET activities.

A choropleth map was prepared to show the state wise distribution of Universities which are using INFLIBNET services (Centre, 2019). In this map it is showing that most of the beneficiary universities belong to Maharashtra, Tamil Nadu, Karnataka and West Bengal.

Table 1: Current status of INFLIBNET activities

Sl. No.	Name of INFLIBNET Activities		Enrollment/Subscription	
			State University	**Deemed-to-be-University**
1	E-Consortium	E-Shodhsindhu (https://ess.inflibnet.ac.in/)	149	21
2		Shodh Shuddhi (https://shodhshuddhi.inflibnet.ac.in/)	384	121
3		Infeed (https://parichay.inflibnet.ac.in/)	34	3
			Colleges	Active users
4		N-List (https://nlist.inflibnet.ac.in/)	3274	378820
5		InfiStats (https://infistat.inflibnet.ac.in/)	NA	43978079
	Open Access Initiatives		University Contribution	Resources
6		Shodhganga (https://shodhganga.inflibnet.ac.in/)	476	301234-theses 7940-Synopsis
7		Shodhgangotri(https://shodhgangotri.inflibnet.ac.in/)	94	8179-Synopsis
8		Infoport (https://infoport.inflibnet.ac.in/)	NA	1742
9		IR@INFLIBNET (https://ir.inflibnet.ac.in/)	NA	1856+
10		Research Project DB (https://www.inflibnet.ac.in/researchproject/)	NA	13600
	E-Content Development and services		Experts	Resources
11		E-PG Pathshala (https://epgp.inflibnet.ac.in/)	3200+	69000+
12		Vidwan Expert Database & National Researcher's Network (https://vidwan.inflibnet.ac.in/)	86584	1224379+
13		Vidya-Mitra integrated e-content portal (https://vidyamitra.inflibnet.ac.in/)	NA	138000+
14		IRINS (https://irins.inflibnet.ac.in/irins/)	54000+	945058+
			Enrollment/Subscriber	Courses
15		Swayam Prabha (https://swayamprabha.gov.in/)	324500	641
16		UGC-MOOCs (https://ugcmoocs.inflibnet.ac.in/)	54311	375
	Library Automation		No. of active Universities	
17		IndCat (https://indcat.inflibnet.ac.in/)	872+	
18		SOUL (https://soul.inflibnet.ac.in/index.php#welcome)	3800+	

Choropleth Map showing State wise distribution of Universities using INFLIBNET services
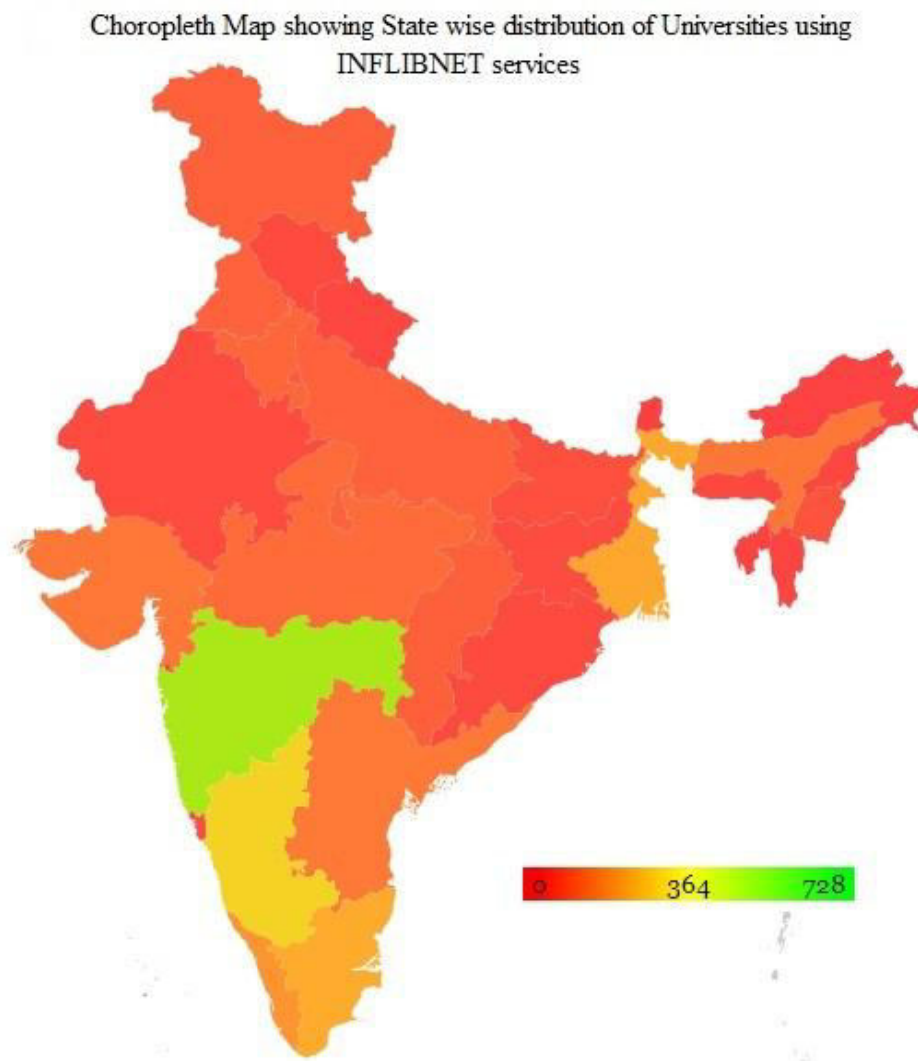
METHODOLOGY

A questionnaire survey was conducted through Google-form and e-mailed to all faculties, Research scholars and library staff of state and Deemed universities. According to the UGC report 2021 we prepared an excel sheet of universities and their staff, research scholars. Among 550 universities 35232 (RS), 90538 (Faculty) and 2512 (LS) were traced. On the dates of 2nd April, 2021 dropped the questionnaires in their email id and we accepted responses till 2nd May, 2021. (Hadagali, Kumbar, & Nelogal, 2012). RNT method was adequate for sample selection. Questionnaire is based on a qualitative and quantitative approach. Data analysis has been created through some statistical methods. For graphical presentation MS-Excel, VOS-View visualization software, Google-form, Visual paradigm application has applied.

DATA ANALYSIS AND INTERPRETATION

Distribution of Respondents

During the survey period total 110000 questionnaires were distributed where 67.2% was faculty, 30.9% research scholars and 1.9% library staff. During one month only 83880 responses were received. Research scholar (84.7%) and library staffs (76.4%) grabbed most places than faculties (72%) on the basis of individual group of respondents.

Table 2: Distribution of total respondents

	Faculty	%	Research Scholar	%	Library Staff	%
Total Sample	74000	67.2	34000	30.9	2000	1.9
Total Respondents	53538	63.8	28813	34.4	1529	1.8

Sources of knowledge about INFLIBNET service

Source of information is the key of this research work, scopes and objectives were laid in this particular word. Awareness and usage was depending on the source of knowledge (Hadagali, Kumbar, & Nelogal, 2012). In this study most of the users got information from library or library staff (684369), faculties, different websites and friend zones also provided information about INFLIBNET. But if we categories all services into two parts where subscription based service information came out from library staff or library (68%), information about free services were referred from the faculties and friends (56%). Approx 9% of total users had used newspaper, seminar or workshop as an information source of INFLIBNET.

Table 3: Sources of information about INFLIBNET

Activities	Library Staffs	Faulty	Website	Newspaper	Workshop / Seminar	Friends	Others
E-Shodhsindhu	45897	21547	37812	425	2548	28457	546
Shodh Shuddhi	54254	37845	2154	00	54	5214	54
Infeed	25402	25552	256	2	54	5215	78
N-List	73845	35845	66875	958	8759	31589	5455
InfiStats	2215	2543	1544	21	1254	2364	88
Shodhganga	79365	12578	22548	541	38457	45879	4582
Shodhgangotri	72547	11541	20178	501	38554	41254	3954
Infoport	38451	9564	545	52	784	521	224
IR@INFLIBNET	22351	5458	2548	854	1028	2026	458
Research Project DB	12578	25687	12845	00	548	5697	2241
E-PG Pathshala	38567	44589	42985	548	5234	49658	4585
Vidwan Expert Database	17568	32587	1458	00	5698	7759	41
Vidya-Mitra	47856	29654	27894	684	5684	9549	458
IRINS	19548	30212	12571	05	1245	5542	19
Swayam Prabha	75245	44257	49235	14570	22742	55214	19240
UGC-MOOCs	39254	29879	45852	19524	55456	54214	21547
IndCat	18547	5478	3546	548	255	478	587
SOUL	879	2	5	00	215	468	135
Total	684369	404818	350851	39233	188569	351098	64292

But workshop, seminar, newspaper advertisement, should aware and take a positive step to promote about INFLIBNET services among peoples. According to annual report of INFLIBNET 2018-19 only 36 workshops and seminars took place where total participants were 1129 all over India and that is not enough for awareness. (Centre, 2019).
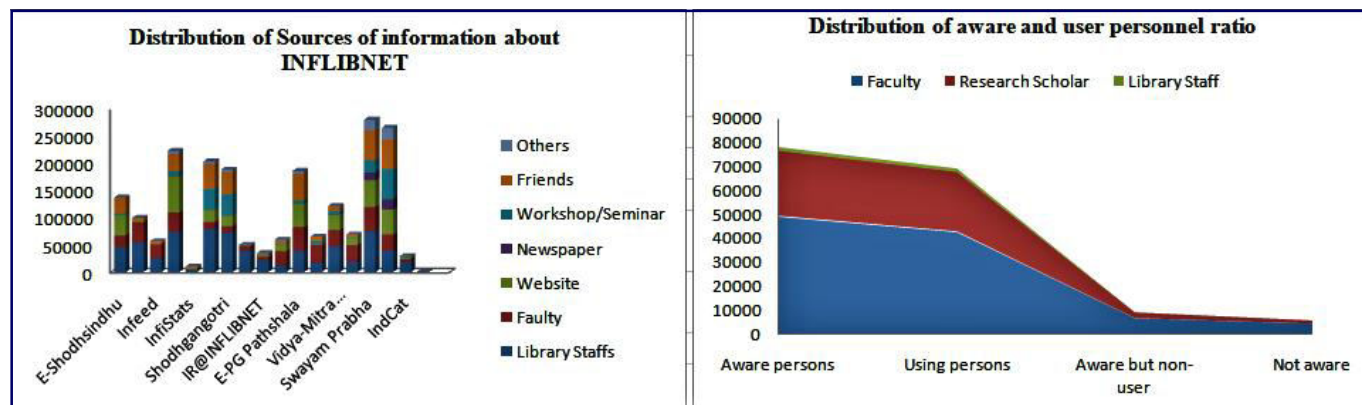

Figure 1: Distribution of source knowledge about INFLIBNET and ratio between aware and user personnel

Ratio between Aware and user personnel

A heartbreaking result has come out from this survey report (Pragasam, 2016). Among total respondents 78403 users were aware but only 69471 personnel used this service and it was also true that 8932 (9%) users had knowledge about it but did not use It. 5% of total were even not aware about that.

Table 4: Distribution of aware and user personnel ratio

Respondents	Faculty	%	Research Scholar	%	Library Staff	%	Total
Aware persons	49334	62.9	27540	35.1	1529	2.0	78403
Using persons	42848	61.7	25131	36.2	1492	2.1	69471
Aware but non-user	6489	72.5	2412	27.0	40	0.5	8932
Not aware	4203	76.7	1273	23.3	0	00	5476

In this questionnaire a section was reasons for not to use and the answer was 43% suffered from unavailability of services and 35% was satisfied with their printed materials. INFLIBNET and university libraries should take a positive step to convert above 15% non-aware to users of this service (Azeez, 2014).

Most preferred e-resource by facilitators

INFLIBNET provides e-journal, e-book, e-database, e-synopsis, etc. from different subjects. In this study faculty, research scholars and library staff were respondents that is why use of journal, e-book, e-database, plagiarism checker had maximum use (Bansode & Burungale, 2019).

Table 5: Most useful resources provide by INFLIBNET platform

	E-Journal	E-Book	E-Database	E-Synopsis	E-Theses	E-Study Materials	Online Courses	Plagiarism checking	E-Project	Expert Database	Library Software
Faculty	37524	28945	22145	5412	1045	38547	33577	28458	854	11487	54
Research Scholar	23547	14587	22547	21547	23668	1542	18623	897	1251	24510	29
Library Staff	1248	868	1397	542	224	94	1069	1293	244	93	687
Total	62319	44400	46089	27501	24937	40183	53269	30648	2349	36090	770

62319 users preferred e-journal where 82% of total research scholars, 56% of total faculties, used it. E-book and e-database usage statistics were equal. But most of the faculties followed e-study materials. 53269 users were also interested in online courses. Plagiarism checking was also a most important activity for faculty as well as research scholars. (Waghmode, 2014) Due to the same restriction they could not get INFLIBNET services at University level.
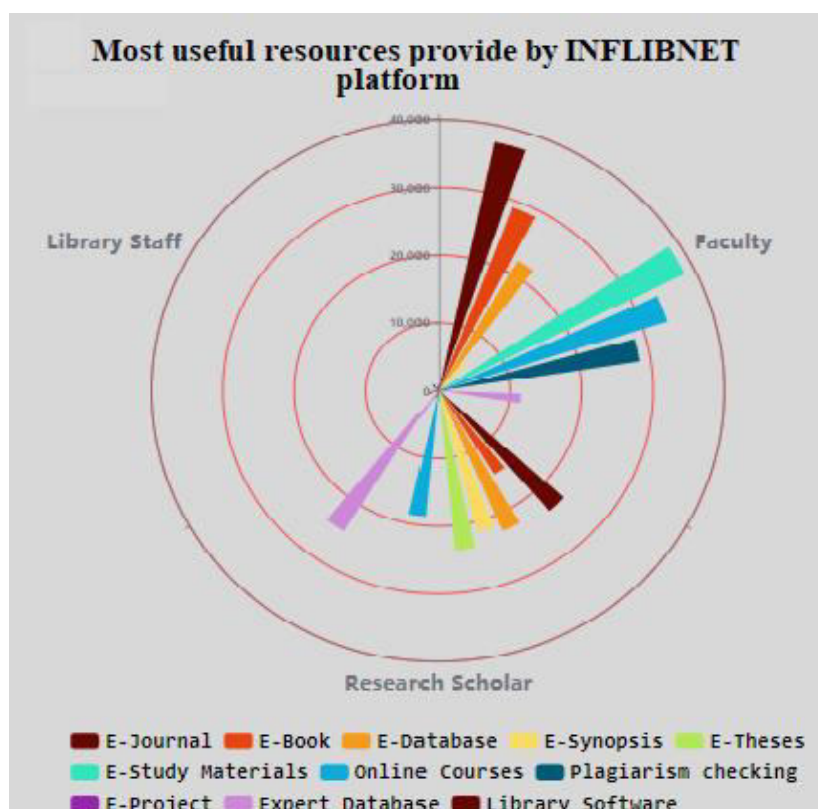
Figure 2: Most useful resources from INFLIBNET platform

Purpose of using INFLIBNET activities

E-resources and online services from INFLIBNET are inestimable in any Institution (Azeez, 2014). To digest the latest development, the recent trend of education e-resource is the shortcut path to reach. For research scholars without e-resources they cannot get enthuse, their knowledge, research progress, and hunger will be static. (Joshi, 2014).

Table 6: Level of Important on the purpose of INFLIBNET services

	Not Important	Some Important	Important	Very Important	Extreme Important
Preparing class note	269	331	13564	22861	3158
Research study	49	421	8879	14789	45334
Preparing Assignment	571	3126	7631	6754	3389
Expert consultancy	1047	4221	11465	11210	8147
Article/paper preparation	97	142	32895	23786	12551
Keep abreast with latest development	5	497	9624	30744	28547
Reference/Citation	113	847	22109	25994	20354
Plagiarism Checking	189	2113	7421	9687	11238
Online courses	897	1266	28924	13835	8347
Total					

According to Table 5 most of the faculties used to prepare class notes, assignments, online courses. But research scholars were habituated with article preparation, expert database, and reference or citation purpose from those above services (Nagesh, 2015). Plagiarism checker is extremely important for both research scholars and faculties but somewhere scholars were not getting enough chance to use it, through librarian or faculties they got facility.

Time Spent on INFLIBNET platform

"Give me six hours to chop down a tree and I will spend the first four sharpening the axe" this was quoted by Abraham Lincoln that mean if you spend a good time on a topic, you can observe or use it better than others (Lincoln, n.d.). Here in this study evaluation of spending time on the INFLIBNET platform can help to analyze the exact information about search knowledge, level of importance, and also level of satisfaction (Pragasam, 2016). According to total responses 32.9% users used single time in two days, 16% were habituated on a daily basis and other 52% users were usually spent twice or single time in a week. Almost 82% research scholars, 48 % faculties and 99% library staff of total individuals used INFLIBNET activities frequently. But it was true that awareness and usage statistics of faculties going downwards more than research scholars and library staffs (Bansode & Burungale, 2019).

Major problems faced by users on INFLIBNET and Institutional level

In the Table-6 all problems were categories on the basis of activities independently. For better analysis individual problems were also divided into three sub-categories in faculty, research scholars and library staff. 11% of users could not get access in Shodhsindhu, N-list and Shodh Suddhi.

Table 7: Distribution of problems faced by users from INFLIBNET and institutional level

Activity	User	Restricted access/ No Subscription	Internet problem	Poor Infrastructure	Lack of access knowledge	Lack of relevant source	Limited access	Cost	Lack of supporting staff	Lack of Technical personnel
E-Shodhsindhu	F	1069	54	3845	4681	109	1321	00	2157	173
	RS	3685	114	9504	10954	1733	6707	00	11730	00
	LS	40	4	72	19	05	07	261	314	579
Shodh Shuddhi	F	1167	24	00	1068	00	1564	00	1008	112
	RS	15077	15	03	17147	00	27775	00	9548	00
	LS	40	19	00	149	00	12	294	318	512
Infeed	F	1197	61	90	1154	1375	18	00	79	168
	RS	15047	02	09	30686	31693	97	00	910	32
	LS	40	28	04	17	19	09	00	19	854
N-List	F	10691	124	2981	3964	109	1297	00	2459	125
	RS	3685	689	3742	7221	422	7927	00	8705	02
	LS	40	143	129	19	00	07	425	357	582
InfiStats	F	1197	09	29	14876	14251	1257	00	3272	16
	RS	15047	28	76	14636	6931	3954	00	6254	00
	LS	40	4	04	29	19	00	00	21	39
Shodhganga	F	00	297	198	14	9587	02	00	19	00
	RS	00	502	13966	1003	18870	15	00	466	00
	LS	00	55	357	04	00	00	00	21	00
Shodhgangotri	F	00	312	251	358	10632	00	00	19	00
	RS	00	730	638	788	19135	09	00	159	00
	LS	00	55	358	05	17	00	00	02	00
Infoport	F	00	302	52	369	4869	00	00	00	00
	RS	00	608	579	678	27651	00	00	00	00
	LS	00	55	254	05	21	00	00	18	54
IR@INFLIBNET	F	00	457	514	148	16248	02	00	52	00
	RS	00	303	584	839	17040	51	00	14	00
	LS	00	25	59	00	957	00	00	24	12
Research Project DB	F	19	279	214	8147	2544	478	00	368	00
	RS	502	398	603	14301	26103	10924	00	1061	00
	LS	00	29	207	09	04	18	00	49	267
E-PG Pathshala	F	00	14	457	68	9541	62	00	18	00
	RS	00	689	945	72	11882	421	00	57	00
	LS	00	17	201	00	215	02	00	65	00
Vidwan Expert Database	F	98	202	247	587	221	105	00	24	58
	RS	2387	878	256	26875	824	957	00	38	222
	LS	08	24	525	95	03	00	00	09	458
Vidya-Mitra	F	09	254	512	47	10895	22	00	2547	08
	RS	12	524	587	139	12875	478	00	4587	00
	LS	00	25	255	04	587	07	00	417	79
IRINS	F	21	451	457	12487	1024	245	00	2879	55
	RS	501	687	698	19354	14879	587	00	5478	12
	LS	00	254	212	257	124	00	00	398	257
Swayam Prabha	F	00	12	125	289	204	18	00	00	00
	RS	00	578	2254	1157	545	27	00	09	00
	LS	00	00	547	29	24	00	00	12	06
UGC-MOOCs	F	00	254	259	457	54	14	00	258	14
	RS	00	1157	1248	2897	257	58	00	457	12
	LS	00	21	138	14	17	00	00	254	25
IndCat	F	00	12	05	2458	24547	00	00	02	02
	RS	00	10	21	8247	31575	00	00	00	00
	LS	00	24	28	00	524	00	00	12	14
SOUL	F	00	00	00	6245	13578	00	00	00	00
	RS	00	00	00	9524	16987	00	00	00	00
	LS	00	00	107	434	245	00	518	12	203

38% users could not access the same facilities due to login based services, lack of computer, or some internal restriction. Most of the users suffered more than one problem that was mentioned in Table-6. Lack of awareness, lack of search knowledge can be overcome if more seminars, more workshops, more training programs will be conducted.

Test the level of satisfaction using INFLIBNET activities

Measurement of user satisfaction or user feedback is almost the same and important for users as well as service providers. Without feedback service providers cannot overcome their problems or help them for further improvement (Bhowmick, 2018). Through this study level of satisfaction is measured. According to Table-7 subscription based facilities belong to low satisfies to full satisfied level but 32% user preferred ShodhShuddhi, Shodhsindhu and N-List programs but INFEED, Infistats, Research project DB, IRINS, SOUL services were totally unknown to users. Indcat and Research project DB service could not satisfy users as it contained only metadata. Shodhganga, Shodhgangotri had low satisfier, SOUL and Indcat used by only library staff for library purposes. UGC-MOOCs, Swayam Prabha, Vidya-Mitra, E-PG-Pathshala created a bulk of satisfied personnel. In this Table-7 ii is showing that 72% of total respondents belong in between low satisfaction to fully satisfied level, 19% was indifferent and 9% was dissatisfied by INFLIBNET activities.

Table 8: Level of satisfaction using INFLIBNET activities

	Indifferent	Dissatisfied	Low satisfied	Satisfied	Fully satisfied	Total
E-Shodhsindhu	5	168	14183	33568	21547	69471
Shodh Shuddhi	00	16	3276	6254	21102	30648
Infeed	61870	1471	5245	836	49	100119
N-List	19	141	324	32489	36498	69471
InfiStats	68098	789	451	102	31	69471
Shodhganga	56	502	28657	26709	13547	138942
Shodhgangotri	168	1257	37697	29102	1247	69471
Infoport	1031	14897	30941	21478	1124	69471
IR@INFLIBNET	859	19489	28120	19974	1029	138942
Research Project	36781	30135	1047	1421	87	69471
E-PG Pathshala	152	109	25238	29341	14631	69471
Vidwan Expert Database	11049	20550	1008	34251	1124	138942
Vidya-Mitra	1521	11741	8214	36845	9661	67982
IRINS	33327	1774	8039	23254	3023	69417
Swayam Prabha	869	1247	8347	44415	13104	137399
UGC-MOOCs	14713	1067	9664	28697	13841	67982
IndCat	1124	65869	1389	1089	00	69471
SOUL	68701	77	83	421	189	137453
Total	300343	171299	211923	370246	151834	1205645

To check the satisfaction level a hypothesis was conducted through Kolmogorov-Smirnov test (K-S test) at 0.05 level of significance. (Chakravart, Laha, & Roy., 1967)

Observe proportion: (observed number / total observed of particular)

= (21547/69471) (for column Fully satisfaction of E-shodhsindhu)

= 0.31 (Similarly others are calculated)

A Cumulative observed proportion value (O) table has created.

Expected proportion: (1 / total no. of activities)

= 0.05 (For all)

A Cumulative expected proportion value (E) table has created.

D-Max value: (%O-E%)

= 0.31-0.05

= 0.26 (Similarly others are calculated)

The table value at 95% confidence level is equal to 1.36"21547

= 358.45

From the above D-Max value it was concluded that D-Max value was 1.75 which is less than 358.45, so null-hypothesis was accepted and users were satisfied by using INFLIBNET.
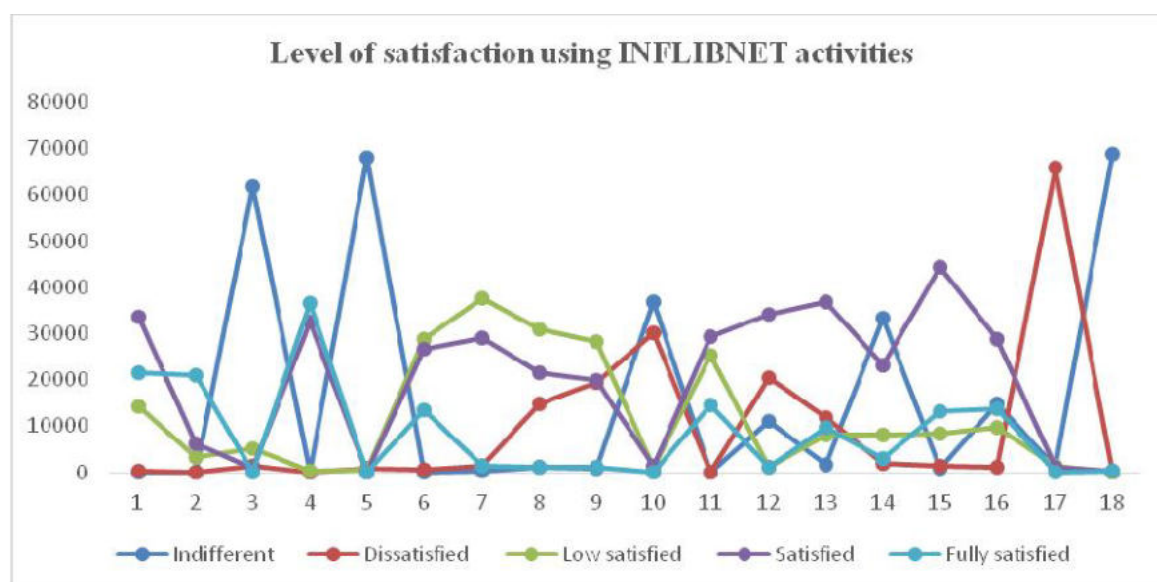

Figure 3: Satisfaction level of INFLIBNET users

SUGGESTIONS FOR INFLIBNET

"If you really look closely, most overnight successes took a long time" by Steve Jobs. INFLIBNET service is a successful step but some lacks should be there behind a great work, those will make them more perfect. Some suggestions are there for INFLIBNET (Joshi, 2014).

1. INFLIBNET has to notice on E-shodhsindhu, N-List, Shodh Shuddhi and INFED guidelines where only govt. aided Institutes or Universities which are under section 12B and 2F of UGC act can register. Many Institutes in Indian are suffering due to this regulation.

2. INFLIBNET should arrange more workshops, seminars or awareness programs in

Universities or Institutions for more usage.

3. In the stage of negotiation with the publisher, INFLIBNET should give attention to the price of e-resources and also for Integrated Library management software.

4. Each activity should have an advanced searching facility.

5. In Shodhsindhu, N-List, Shodhganga, should contain e-resources on Agriculture, Engineering, medical, Nursing, Pharmacy and Shodhgangotri, IR@INFLIBNET, Infoport needs updating regularly.

CONCLUSION

All states and Deemed Universities under section 12(B) and 2(F) are privileged to have service of INFLIBNET activities with a low and somewhere free of cost. UGC under the Ministry of Education took a divine initiative through INFLIBNET but in this study it was found that services and resources could not be reached to the beneficiaries (Joshi, 2014). Among 83880 respondents 93.4% was aware and among aware persons only 88.6% were habituated to use but other 11.4% became non-user even after awareness. Most of the faculties and research scholars preferred e-journals, e-database and plagiarism checking services. Prepare study materials, article processing, reference/ citation and research study was the main purpose of beneficiaries. After testing hypothesis it has proven that most of the users satisfied by using INFLIBNET activities but lack of search knowledge, lack of relevant source of information, lack of supporting staff and access restriction on subscription based services was faced in most time by users.

According to results it was suggested that INFLIBNET and Institutions had to take an initiative to develop well infrastructures (Centre, 2019) and organized more seminars, workshops and training programs for students, faculties even library staffs for awareness and ultimate use of the INFLIBNET activities.

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