A Bibliometric Study of the Journal "College Libraries" : 2015 -2020

Dr. Sourav Chatterjee
Librarian, Syamaprasad College, Kolkata

Dr. Animesh Bhattacharyya
Librarian, Vivekananda Mahavidyalaya

Abstract :

The purpose of this paper is to find and examine the publication pattern of the journal 'College Libraries' during the period 2015-2020. The study focused on different facets and analyzed those facets on 126 articles that were published from volume number 30-35. The different areas which were analyzed by the authors were yearly distribution of contribution, the pattern of authorship, degree of collaboration, average page length per articles, gender-wise, subject-wise, and area-wise distribution of contributions, contributors' designation, affiliation and citation pattern. The analysis revealed that a total 126 articles were published in those six years with 189 contributors and 1391 citations. Single authorship pattern and male authors were dominated in this journal. Majority of authors were from West Bengal and their designation was Librarian/Assistant Librarian. Overall degree of collaboration recorded was only around 0.43. This study will support the progress of research performance and output in library and information science and induce the professionals of India in that field to do more such studies.

Keywords :

Authorship Pattern, Bibliometric Analysis, Citation Analysis, College Libraries, Degree of Collaboration, Geographical Distribution, WBCLA

1. Introduction :

Bibliometric analysis helps to evaluate the scholarly publications. The first scientific journal was published in 1665. The publication of periodicals has been increased since then in exponential manner. Periodicals gives an indication of growth of

literature in any field of knowledge, it is a primary source for information and medium of communication of information. It gives an idea of trend of research and current development in a particular subject field (Thanuskodi, 2011). It gives an overview of degree of impact in a particular field of study. Particularly when a single journal is taken into account for study it shows the productivity, quality, utility in that field in a region or country. Bibliometric study gives the opportunities to analyze the modes, techniques and progress of research. It is also becoming and emerging as an important method for analyzing collection development in libraries. It also gives the opportunity for proper utilization of resources particularly in library and information centres.

2. Review of related literature :

Sternberg (1998) article described the bibliometric methods and its application. Author described how it could be more relevant especially in collection development in research libraries. A way of teaching bibliometrics as research methods and a course design technique were also proposed in this paper.

Diem and Wolter (2013) investigated different bibliometric parameters to identify performance in research on education science in Switzerland. Two databases namely Google Scholar and Web of Science were taken into account for analysis. The study revealed that distribution of research performance of any individual varies with different bibliometric databases.

Chattopadhyay (2015) made a bibliometric study of 'CUJIS or Calcutta University Journal of Information Studies' published by Department of Library and Information Science, University of Calcutta on three volumes i.e. from Volume 6 to volume 8. This study carried out on various aspects like extent of authorship, number of publications, number of citations etc. It revealed a thorough and pinpointed analysis of the journal CUJIS.

Barik, Rautaray and Swain (2020) explored the pattern of publications published in first five years of 'KIIT Journal of Library and Information Management'. This paper revealed various facets like ranking of authors, degree of collaboration etc. It was found that total 85 papers were published in that period with 1064 citations.

Rani (2020) examined the papers and made bibliometric analysis of those which were published in 'Journal of Librarianship and Information Science' from 2014

to 2018. Several topics like type of publications, geographical distribution, pattern of authorship, document formats etc. were analyzed in this article.

Similar bibliometric analyses were also done on different renowned journals. Roy and Dey (2012) studied the contributions of University News, Chakrabarti and Pramanik (2014) analyzed Annals of Library and Information studies, Bera and Das (2016) studied IASLIC Bulletin, Basu (2017) analyzed open access journal DOAJ etc. Few literature were reviewed by the researchers on related aspects to understand the perspective and different aspects of the study.

3. Significance of the study :

It is evident from the studies reviewed that although similar bibliometric analysis have been done on different journals but bibliometric studies on the "College Libraries" were not carried out previously. College Libraries is a renowned journal in library and information science discipline and is publishing for more than 36 years. The importance of bibliometric analysis is huge for technical processing, dissemination and utilization of resources. So this effort will definitely help to understand the significance of this particular journal of Library and Information Science especially in India.

4. About the Source journal :

For this bibliometric analysis 'College Libraries' is selected as the source journal. This journal is a quarterly journal and it is published by "West Bengal College Librarians' Association" or WBCLA since 1983. So this journal is being published continuously for more than 36 years. In volume number 1 and issue number I the name of this journal was 'College Librarian: an English quarterly'. The first joint editors of this journal were Dinendra Prasad Gupta and Amarendra Nath Bhattacharyya but from its next issue, i.e., from volume number I and issue number II-IV the name of the journal became 'College Librarian: a forum". This name was continued up to volume 6. From volume number 7 the name of the journal became 'College Libraries: an English Quarterly'. In volume 16 and volume 17 issues this journal was published as a half yearly journal so the name of that journal for these two issues was 'College Libraries: an English half yearly'. From volume number 31 to 32 it was published as'College Libraries: Peer Reviewed English Quarterly'. And from volume 33 to till date it is being published as "College Libraries: a Peer- Reviewed

Quarterly Journal'. The ISSN number of this journal is 0972-1975. This journal is currently in the prestigious UGC-CARE list. It contains articles on problems and issues relating to library science, research and development, new innovations, advancement in library and information science and more related issues.{West Bengal College Librarians' Association (WBCLA), n.d.}

5. Objectives of the study :

The important objectives of this study are to identify the following attributes by going through the contributions published in "College Libraries" during 2015-2020.

- To analyze the distribution of contribution in each volume as well as in each year.
- To identify authorship pattern for each contribution as well as to examine the degree of collaboration between authors.
- To analyze the distribution of contribution according to gender.
- To find the volume wise distribution of citation and to do citation analysis.
- To study institution wise, area wise, affiliation wise distribution of contribution.

6. Scope and coverage of the study :

Authors made an attempt to analyze the contributions in the journal 'College Libraries'. They analyzed all the contributions published in six different volumes i.e. from volume 30 to volume 35 and in total 24 issues published during the period from 2015 to 2020.

It is already mentioned that the study is limited to the volume number 30 to volume number 35 of the journal 'College Libraries'. The results of the study would have been different if many more volumes were incorporated in this analysis. Though this study does not show the actual result but still it depicts the trend of publication and its related aspects with this renowned journal in Library and Information Science.

7. Methodology :

First of all both the authors went through different documents especially they

consulted many national and international primary resources on bibliometric analysis to have an idea with that topic. The relevant data from 'College Libraries' were gathered from the period 2015 to 2020. Authors mainly collected the data from hard copies of the source journal. A total of 126 articles, 189 contributors, and 1391 citations were recorded and they were organized in different sheets systematically. After that analysis was made keeping in mind the objectives of the study with the help of simple arithmetic techniques and statistical methods like Average, Percentage, Degree of Collaboration, Growth of Citation etc. were used. MS-Word and MS-Excel were utilized for analysis and interpretation of the data. APA citation style was followed for references and citations.

8. Data analysis :

Before analyzing the tables first of all it is relevant to discuss the nature of the different issues in a particular volume. From volume number 30 to volume number 33 the nature was similar. Here in all volumes both issue numbers 1 and 2 were clubbed, similarly issue numbers 3 and 4 were also clubbed together and published accordingly. But in volume number 34 and 35 all the four issues were separately published.

Table 1: Distribution of contribution according to volume and year

Year	Vol. No.	Number of Issues	No. of Contributions	Percentage
2015	30	4	22	17%
2016	31	4	16	13%
2017	32	4	16	13%
2018	33	4	15	12%
2019	34	4	27	21%
2020	35	4	30	24%
Total	6 vols.	24	126	100%

Table 1 shows the year and volume wise distribution of papers in 'College Libraries' during 2015-2020. From table it is revealed that there were total 126 articles published in six volumes. Out of those maximum number of articles were published in volume 35 (24%), and minimum number of publications were found in volume 33 (12%).

Table 2 : Distribution of contributions according to authorship pattern

No. of Authors	No. of Contributions	Percentage
1	72	57%
2	47	37%
3 or more than 3	7	6%
Total	126	100

After analyzing Table 2 it is found that out of 126 papers, 72 (57%) contributions were by single authors. So the majority of the publications found in those volumes were contributed by single or one author. 47 (37%) articles were contributed by joint or double authors. Only in 7 (6%) articles three or more than three authors had been contributed.

Table 3: Distribution authorship pattern of contribution according to Volume

Volume No.	Single Author	%	Double Authors	%	Three or more than three Authors	%
30	10	14%	11	23%	1	14.5%
31	12	17%	4	9%	-	-
32	13	18%	3	6%	-	-
33	7	10%	6	13%	2	28.5%
34	17	23%	8	17%	2	28.5%
35	13	18%	15	32%	2	28.5%
Total	72	100%	47	100%	7	100%

Table 3 indicates that volume 34 contained the most number of single author contributions, i.e. 17. And least number of single author publications was found in volume no. 33, i.e. 7. On the other hand volume 35 had the most number of contributions (15) by joint authors but volume 32 contained only three articles which were contributed by double authors. No such articles were found in volume 31 and 32 which were written by three or more than three authors. Only in volume 30, 33, 34 and volume 35 only 7 such articles were found altogether.

Table 4: Year wise distribution of degree of collaboration among authors :

Year	Single Author	Multi Author	Degree of Collaboration
2015	10	12	0.54
2016	12	4	0.25
2017	13	3	0.19
2018	7	8	0.53
2019	17	10	0.37
2020	13	17	0.57
Total	72	54	~0.43

To find the extent of collaborations among authors we have used K.Subramanayam's formula for degree of collaboration (1982). Here the formula is
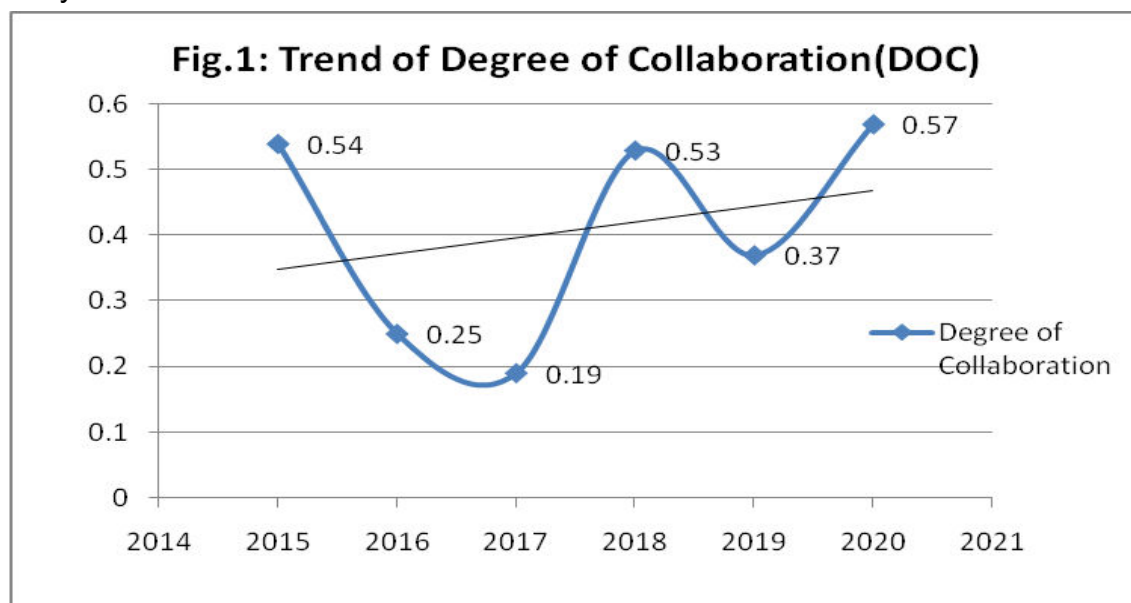
$$C = Nm/(Nm+Ns)$$

Where C= degree of collaboration

Nm= Number of multiple authors

Ns= Number of single authors (Zafrunnisha and Pullareddy, 2009).

From the calculated value of Degree of Collaboration (DOC) in Table 4 and from Fig.1, it is seen that there was a fluctuation. It was highest in the year 2020 (0.57) and lowest in the year 2017 (0.19). The trend of collaborative effort is somehow less and fluctuating. The overall intensity of degree of collaboration was found around only 0.43.

Fig.1: Trend of Degree of Collaboration(DOC)

Table 5: Distribution of journals according to page length and average number of pages for each contribution

Year	Vol. No.	No. of Pages	%	No. of Articles	Average No. of pages for each contribution
2015	30	192	14%	22	~ 8.72
2016	31	132	10%	16	8.25
2017	32	136	10%	16	8.5
2018	33	144	11%	15	9.6
2019	34	325	24%	27	~12.03
2020	35	417	31%	30	~14
	Total	**1346**	**100%**	**126**	**~10.68**

Table 5 depicts that in volume 35 there were maximum number of articles as well as maximum number of pages. There were 30 articles and 417 pages. Henceforth the average number of pages for any single contribution was around 14. Least number of articles was published in volume number 33, i.e. 15. But if we go through the average number of pages for each contribution here the least average was found for volume 31. Here the value was 8.25.

Table 6 : Distribution of contribution according to gender

Year	Volume No.	Male Contributor	%	Female Contributor	%	Total
2015	30	33	24%	3	6%	36
2016	31	14	10%	6	12%	20
2017	32	11	8%	8	16%	19
2018	33	19	13%	6	12%	25
2019	34	25	18%	15	31%	40
2020	35	38	27%	11	23%	49
	Total	**140**	**100%**	**49**	**100%**	**189**

From table 6 and figure 2 it is found that total 189 authors contributed in total 126 articles. Out of which 140 were male and 49 were female contributors. Volume 35 had the highest number of Male contributors, i.e. 38 whereas most number of female contributors was found in volume no. 34, i.e. 15. Only 11 male contributors

contributed in Volume 32, which was lowest among the six volumes. Lowest number of female contributors, 3 was found in volume 30.
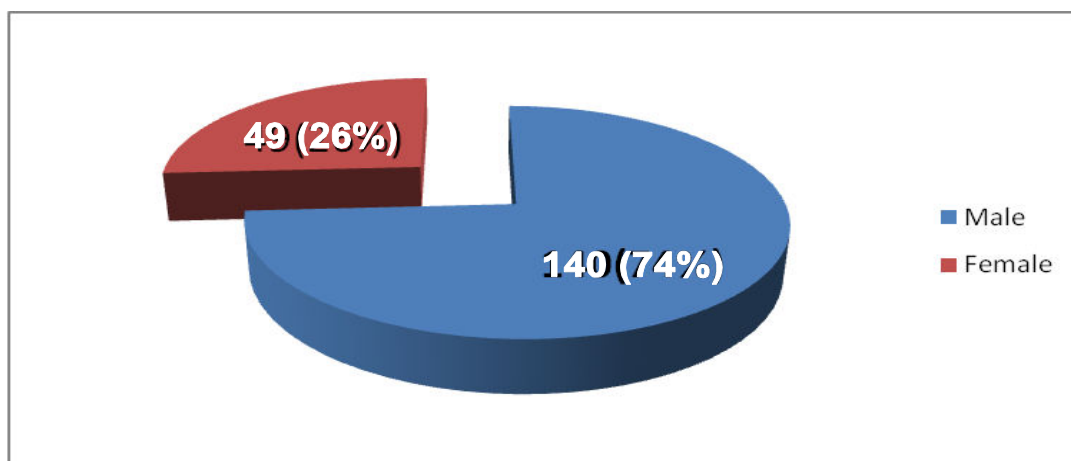

Fig.2: Overall gender wise distribution of contribution

Table 7: Distribution of contribution according to different institutions

Year	Volume No.	Colleges	Universities	Other Institutions	Total
2015	30	26	8	2	36
2016	31	17	2	1	20
2017	32	17	2	-	19
2018	33	14	6	5	25
2019	34	19	16	5	40
2020	35	19	24	6	49
	Total	112	58	19	189

Table 7 gives the idea of volume and year wise distribution of contributors' institution. After analyzing the table it was found that out of 189 contributors, 112 (59%) were from different colleges, 58 (31%) were from different Universities, and 19 (10%) were from different other institutions.

Table 8 : Distribution of contributors according to their institutional affiliations in different volumes

Institutional Affiliation	Vol. 30	%	Vol. 31	%	Vol. 32	%	Vol. 33	%	Vol. 34	%	Vol. 35	%	Total	%
Librarian/ Assistant Librarian	29	80	18	90	18	95	18	72	24	60	27	55	134	71
Deputy Librarian	1	3							1	2.5	1	2	3	2
Assistant Professor	1	3					1	4	2	5	5	10	9	5
Associate Professor			1	5					2	5	1	2	4	2
Professor	1	3					1	4	6	15	4	8	12	6
Research Scholar					1	5	1	4	2	5	6	13	10	5
Project /Scientific Assistant			1	5					2	5			3	1.5
Teaching Faculty							2	8			1	2	3	2
Library Trainee	2	5							1	2.5	1	2	4	2
Student	1	3											1	0.5
Library Assistant	1	3									1	2	2	1
Principal							1	4					1	0.5
LIS consultant							1	4					1	0.5
PRO											1	2	1	0.5
Director											1	2	1	0.5
Total	36	100	20	100	19	100	25	100	40	100	49	100	189	100

Table 8 depicts the volume wise distributors of contributors according to their institutional affiliation. The above table explained that there were variety types of designations of contributors. 15 different designations were found after analyzing different volumes. The maximum numbers of contributors were either Librarians or Assistant Librarians from different institutions. 134 (71%) out of 189 contributors were from that category. The second most number of contributors was Professors

(12, 6%) of different Universities/Institutions. The other designations were also there, as shown in the table.

Table 9: Distribution of contributions at national level from various states of India

Sl. No.	Name of the States	No. of Contributions	%
1	Assam	3	1.6%
2	Delhi	2	1.1%
3	Gujrat	2	1.1%
4	Haryana	1	0.5%
5	Jammu &Kashmir	1	0.5%
6	Jharkhand	1	0.5%
7	Karnataka	9	4.7%
8	Kerala	4	2.1%
9	Maharashtra	6	3.2%
10	Manipur	3	1.6%
11	Punjab	3	1.6%
12	Tamilnadu	2	1.1%
13	Telengana	3	1.6%
14	Uttarpradesh	2	1.1%
15	Uttarakhand	1	0.5%
16	West Bengal	146	77.2%
	Total	**189**	**100%**

Table 9 portrays the geographical distribution of contributions at national level. The study of 189 contributions revealed that contributions came from 16 different states of India. Most of the contributions came from West Bengal. 146 (77.2%) out of 189 contributors were from West Bengal, followed by Karnataka (9, 4.7%). The rest of the contributions from other states were of less percentage.

Table 10 : Subject wise distribution of article in different volumes

Sl. No.	Subject Fields	No. of Contributions	%
1.	Academic Library	8	6%
2.	Automation	14	11%
3.	Bibliometry/Informetrics/ Webometrics	15	12%
4.	Citation Analysis	2	2%
5.	Collection Development	5	4%

6.	Community Information Services	2	2%
7.	Copyright/Intellectual Property Right	1	1%
8.	Health Information System	3	2%
9.	IT/ICT	13	10%
10.	Information/Knowledge Management	6	5%
11.	Library and Society	3	2%
12.	Library Cataloguing	1	1%
13.	Library Classification	1	1%
14.	LIS Education	3	2%
15.	Marketing	1	1%
16.	Plagiarism	1	1%
17.	Preservation/ Conservation	3	2%
18.	Professional Development	3	2%
19.	Public Library	5	4%
20.	Reading Habit	6	5%
21.	Research/Statistics in LIS	4	3%
22	Special Library	2	2%
23.	User Study/User Survey	24	19%
	Total	**126**	**100**

Table 10 shows the different subject fields which were covered in 126 different articles and were published from volume no. 30 to volume no. 35 of 'College Libraries'. Authors found 23 different sub-areas on which different articles were based on. It was found that most number of articles was based on User Study/User Survey (24, 19%). Quite a few numbers of articles were found on Bibliometry/Informetrics/Webometrics (15, 12%), Automation (14, 11%), IT/ICT (13, 10%). But other subject fields were of less numbers as shown in the table.

Table 11: Volume wise distribution of various types of cited publications

Types of Publications	Vol. No. 30	Vol. No. 31	Vol. No. 32	Vol. No. 33	Vol. No. 34	Vol. No. 35	Total	%
Books	31	47	22	38	37	48	**223**	**16%**

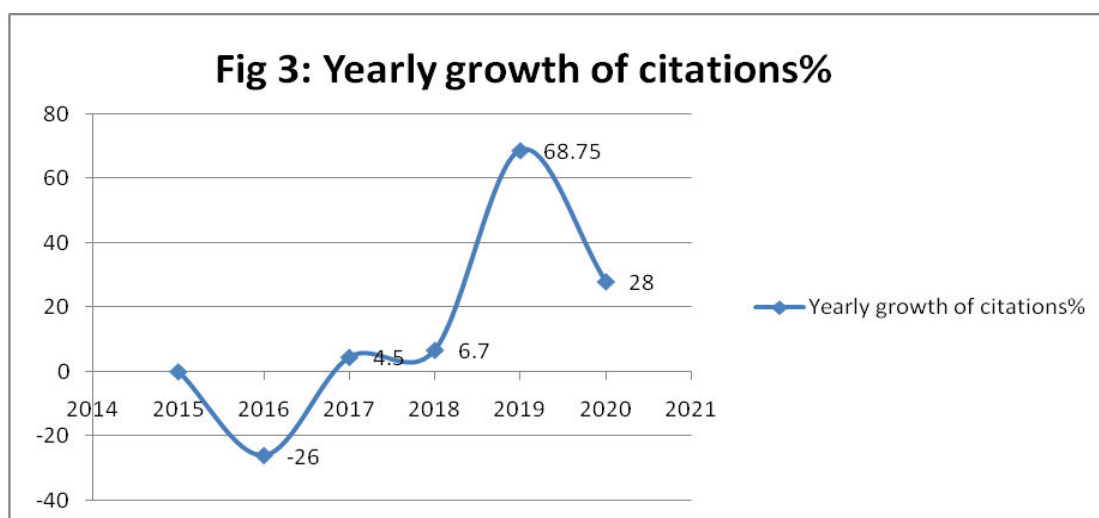|								
Handbooks/Guides	4	-	-	1	1	-	**6**	**0.4%**
Journals	87	56	70	87	187	217	**704**	**50.6%**
Seminar/Conference Proceedings	4	5	13	8	10	17	**57**	**4%**
Reports	6	5	1	11	2	13	**38**	**3%**
Theses/Dissertations	-	-	-	1	3	**7**	**11**	**0.7%**
Websites/Webpages	79	43	57	28	54	70	**331**	**23.8%**
Miscellaneous Documents (Manual, Record, Pamphlets, Gazette, Directory, Newspapers,Glossary etc.)	4	2	2	2	3	8	**21**	**1.5%**
Total	**215**	**158**	**165**	**176**	**297**	**380**	**1391**	**100%**

From Table 11 it was found that researchers/authors had cited different types of documents for their publications. Total 1391 citations were cited by the contributors' altogether. In volume 35 total 380 citations were cited. This was highest among the all volumes; it was almost 27.3% of the total citations. In volume No. 30, 215 citations were used which was 15.5% of all. In volume no. 31 least number of citations were found, i.e. 158 (11.4%), volume no. 32 contained (165, 11.8%) citations, volume no. 33 contained (176, 12.6%) citations and in volume no. 34, 297 (21.4%) citation were used. Authors found that Journals, Books, and Websites or Webpages were the three most important types of cited references used by the contributors in those articles.

Table 12 : Yearly distribution of citations :

Year	Total citations	% of citations	Cumulative citations	% of cumulative citations	Yearly growth of citations%
2015	**215**	15.5	215	15.5	-
2016	**158**	11.4	373	26.8	-26
2017	**165**	11.8	538	38.7	4.5
2018	**176**	12.6	714	51.3	6.7
2019	**297**	21.4	1011	72.7	68.75
2020	**380**	27.3	1391	100	28
Total	**1391**	**100**			**Overall = 77**

Table 12 and Fig. 3 explicate the yearly distribution of citations. During 2015-2020, total number of citation was 1391. After year 2015, in 2016 the growth rate showed a negative value but then in the next years it witnessed a positive trend. Overall growth rate was 77, which shows quite a high positive growth rate of citations for the publications from vol.no. 30 to 35.

Fig 3: Yearly growth of citations%

9. Findings :

The important findings of this study were:

- During the period 2015-2020 'College Libraries' had witnessed a total of 126 contributions. Among which most number of papers were published in the year 2020.

- Analysis of data revealed almost similar type of authorship pattern. Single authored papers (57%) were more in numbers than that of multi-authored papers (43%). The degree of collaboration between authors showed that nature of collaborative approach was not satisfactory.

- All the six volumes of journals had total 1346 pages for total 126 contributions. So on an average around 10.68 pages were allotted for each paper.

- Male authors (74%) contribution was significantly more than that of female authors (26%).

- Maximum number of contributions was found from different colleges. Majority of the contributors were Librarians/Assistant Librarians of different organizations.

- West Bengal ranked first among the all states from where the contributors participated.

- The study revealed that journals had been referred by the maximum authors as reference and an overall growth rate of citation was found in contributions.

10. Discussion :

After that study it can be said that 'College Libraries' is gaining popularity day by day among the librarians, research scholars, LIS professionals and teachers. We can see a steady growth in the number of contributions not only from colleges but also from Universities and other reputed institutions as well. The contributions were mostly from the West Bengal but many contributors were also contributed from 15 other states of India. Male contributors were significantly leading the table than that of female contributors. It is also found from that study that most of the contributions had good number of citations. On an average the number of citations per article was more than 11, which is quite high. Out of 1391 total citations cited, 704 were from journals, websites or web pages took the second position with 331 numbers and Book was in the third position with 223 numbers. So journals are considered as the prime source by the authors.

11. Conclusion :

Authorship trend and collaborative research both are considered as important facets of modern science. Authors tried to cover both these facets in this article. The findings of this study would definitely provide a great potential for future management of this prestigious journal. This bibliometric analysis would definitely serve as guide to improve the quality and publication standards of 'College Libraries' in future.

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Awareness and Use of Reference Management Software among the Research Scholars of School of Information Science and Technology in BBAU, Lucknow : a comparative study

Prof. K. L. Mahawar,
Professor, Department of Library and Information Science, Babasaheb Bhimrao Ambedkar University, Lucknow.

Preeti Tanwar
Research Scholar, Department of Library and Information Science, Babasaheb Bhimrao Ambedkar University, Lucknow.

Unzila Hurum
Research Scholar, Department of Library and Information Science, Babasaheb Bhimrao Ambedkar University, Lucknow.

Abstract :

This paper includes the study of awareness and use of Reference Management Software among the School of Information Science and Technology (SIST), one of Babasaheb Bhimrao Ambedkar University (BBAU), Lucknow. SIST comprises three departments, i.e. Department of Information Technology (DIT), the Department of Computer Science (DCS), and the Department of Library and Information Science (DLIS). In this study, the Google Form of the questionnaire was used and mailed for data collection. This study explains that 92.5% of respondents are from DLIS, 92.3% are from DIT, and 75% are from DCS using RMS tools. At the same time, all three departments are somehow and more aware of all the software covered in this study, but Mendeley is the most popular software among all. This study also highlights that 82.6% of respondents show interest in using Free/Open-source software. This study also covers that 100% of DCS and 88% of respondents of DLIS also have faced the barrier of insufficient training, and 91.7% of DIT have a lack of citation knowledge.