

Library Herald (2004-2015): A Bibliometric Study

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Abstract - The purpose of this paper to explore, by quantitative analysis, research trends, authorship patterns, collaborative works and geographical distribution of contributions of the Library Herald Journal from 2004 to 2015. The data of all the 264 contributions from 12 volumes and 44 issues of the Library Herald journal were extracting from the Indian Citation Index online database for the period 2004-2015. Author productivity has calculated using the formula given by Yoshikane et al... And Degree of Collaboration (DC) among the authors in the Library Herald journal, the formula given by Subramanyam (1983). The study is restricted to the Library Herald Journal form the year 2004-2015. Only Bibliometric details are analysed using Bibliometric indicators. Further studies could look at the content analysis and citation analysis. 264 publications are analysed. 74.24% publications are Research Articles. Single Author contributions are 115 (43.56%) and multiple-authored contributions are (56.44%). The average number of authors per article is 1.73. The average productivity per author for the period 2004-2015 is 0.58. Indian authors contributed more publications. The leading author is Rahania Nasrat, The University of Delhi contributed the highest number of publications. The author's major interested areas are Bibliometrics, User Studies, Library Sources and Services, Academic Library, Public Libraries, Information Technology, Library professionals/ skills and competencies, Information Literacy, Library Information Networks, and Library Automation. This paper is relevant and useful to those who are interested in Bibliometric studies and it provides a comprehensive study of scholarly communications of Library Herald from 2004-2015. It reveals the Growth of LIS literature and research trends, Author productivity.

Keywords: Bibliometric Analysis, Authorship Pattern, Author Productivity, Degree of Collaboration, Indian Citation Index, Institutional Contributions

1. Introduction:

In the present study, LIS literature published in the Library Herald journal is analysed to have an understanding of the Author productivity, Authorship Pattern, Author Collaboration and in to identify the Authors who have contributed more articles and the geographical distribution of Article. Besides, find out the Institutional contributions of Indian Authors in the Library Herald Journal.

2. Objectives of the Study:

- To identify the quantity and compile a list of contributions to the journal "Library Herald" during 2004-2015.

- To map the year-wise distribution of contributions in library Herald
- To identify the forms of the publications
- To find the authorship patterns of the contributions.
- To study Author productivity
- To know the collaborative authorship and degree of Collaboration among multiple authors
- To identify most productive authors
- To find the average length of the articles
- Geographical distribution of articles
- To identify and prepare the list of top 50 highly productive institutions
- To identify the subject-wise distribution

3. Source Journal:

The present study is carrying out on one of the reputed journals "Library Herald". Library Herald is the Quarterly peer-reviewed scholarly research journal of the Delhi Library Association. For the present study, a total of 264 contributions from the year 2005-2015 are considered.

4. Methodology:

The data of all the 264 contributions from 12 volumes and 44 issues of the journal were extracting from the Indian Citation Index online database for the period 2004-2015. Besides, the same data was entered on the excel sheet and the data is subject to analysis as per the objectives of the study. Average Author Per Paper and Productivity Per Author has been calculated using the formula given by Yoshikane et al...And the Authorship Pattern has been analysed by K Subramanyam's Degree of collaboration in quantitative terms.

5. Data Analysis and Interpretation:

5.1. Year-wise distributions:

Table 1 Volume-wise Distribution of Contributions					
Sl No.	Publication Year	Volume	Issues	Total Publications	% of 264
1	2004	44	4	27	10.23
2	2005	45	2	12	4.55
3	2006	46	4	29	10.98
4	2007	47	4	22	8.33
5	2008	48	4	18	6.82
6	2009	49	4	22	8.33
7	2010	50	4	26	9.85
8	2011	51	4	24	9.09
9	2012	52	2	13	4.92
10	2013	53	4	22	8.33
11	2014	54	4	22	8.33
12	2015	55	4	27	10.23
Total				264	100

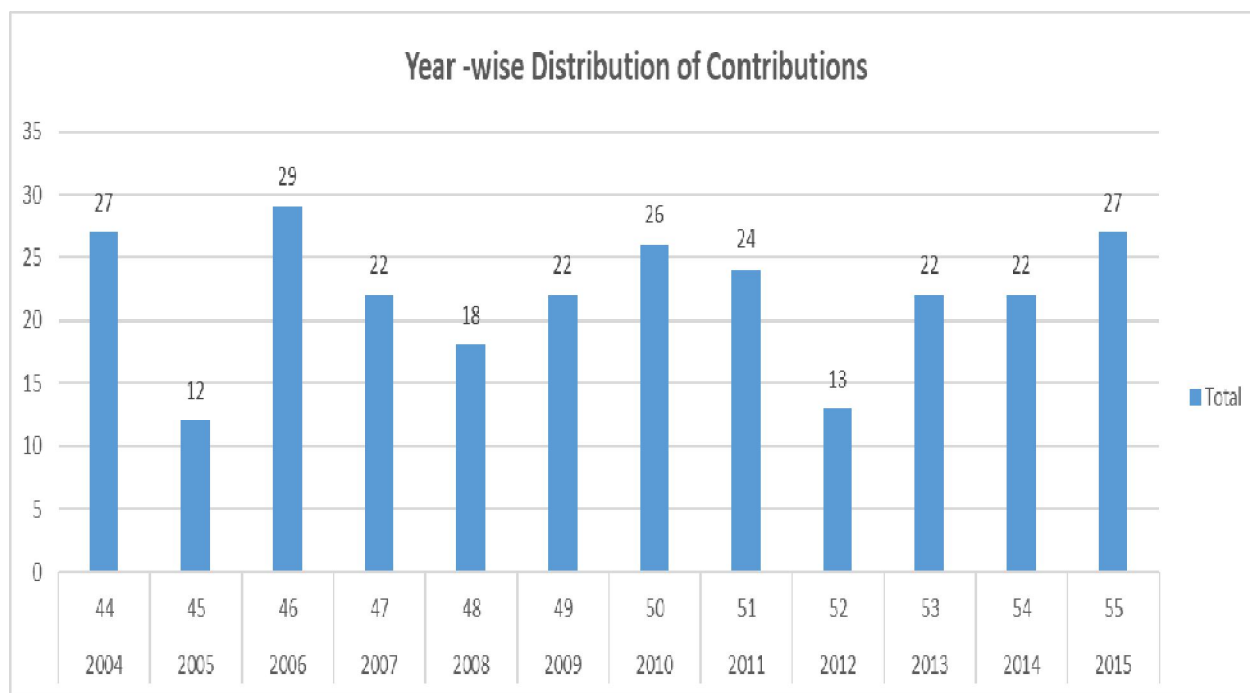


Table 1 reflects the number of contributions published from 2004 to 2015. The study shows that the highest numbers of 29 articles published in the years 2006 and 27 articles published in 2004 and 2015, followed by 22 articles in the years 2007, 2013 and 2014. The lowest numbers of 13 articles published in the years 2012. In all, 264 articles published during the period 2000-2015. The journal on an average published 5-6 papers per issue. The number of contributions each year is nearly consistent. However, in the year 2004 and 2015, the number of contributions is a little high.

5.2. Form of the Contributions:

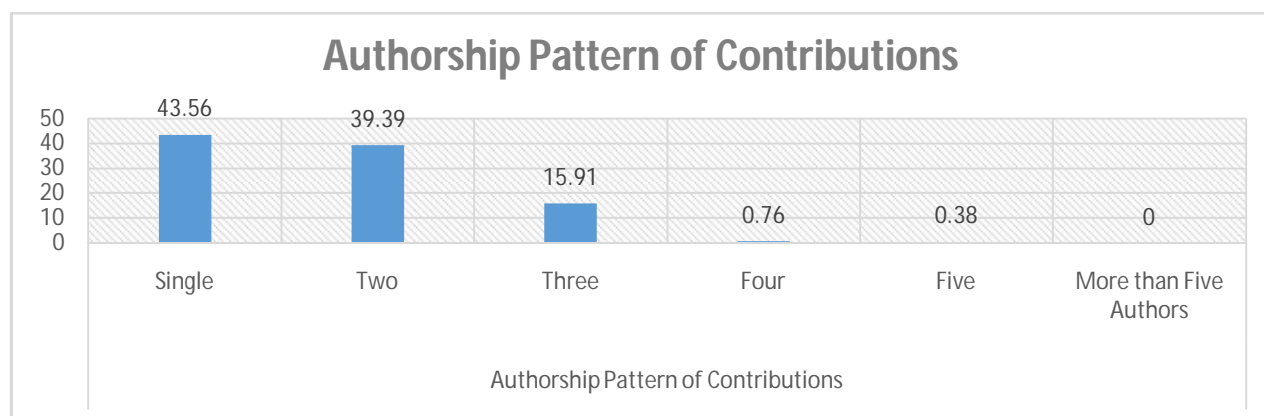
SI No.	Document Type	Number of Contributions	% of 264
1	Case Study	11	4.17
2	Editorial	8	3.03
3	Research Articles	196	74.24
4	Short Communications	48	18.18
5	Other	1	0.38
Total		264	100

Table 2 shows the document types of contributions during 2004-2015 in Library Herald Journal. The Total of 264 publications in the year 2004-2015, the highest number of publications were 196 (74.24%) Research Articles, Short Communications 48 (18.18%), and Case study 11 (4.7%), Editorial 8(3.03%).

5.3 Authorship Pattern:

Table 3: Authorship Pattern of Contributions

Years	Vol. No.	Single	Two	Three	Four	Five	> Five	Total
2004	44	12	8	6	1	0	0	27
2005	45	5	3	4	0	0	0	12
2006	46	12	12	4	1	0	0	29
2007	47	9	10	3	0	0	0	22
2008	48	5	10	3	0	0	0	18
2009	49	11	6	5	0	0	0	22
2010	50	14	10	2	0	0	0	26
2011	51	8	13	3	0	0	0	24
2012	52	6	6	1	0	0	0	13
2013	53	8	7	6	0	1	0	22
2014	54	11	10	1	0	0	0	22
2015	55	14	9	4	0	0	0	27
Total		115	104	42	2	1	0	264
% Of 264		43.56	39.39	15.91	0.76	0.38	0.00	100



The authorship pattern was analysed to determine the percentage of single and multiple authors. From the above table, it is understood that single authored contributions and double authors contributions are dominated this journal. Single authored contributions account for 115 contributions (43.56%), two authored contributions are 104 (39.39%), three authored papers are 42 (15.91%), four authored contributions are 2(0.76%) five authored contributions are 1(0.38%), and more than five authored contributions are nil. In all, Single Author contributions are 43.56% and multiple authored contributions are (53.44%) during the period 2004-2015.

5.4 Author Productivity:

Sl No.	Year	Volume	Number of Contributions	Number of Authors	Average Author Per Paper(AAPP)	Productivity Per Author(PPA)
1	2004	44	27	49	1.81	0.55
2	2005	45	12	15	1.25	0.8
3	2006	46	29	46	1.59	0.63
4	2007	47	22	38	1.73	0.58
5	2008	48	18	34	1.89	0.53
6	2009	49	22	35	1.59	0.63
7	2010	50	26	45	1.73	0.58
8	2011	51	24	42	1.75	0.57
9	2012	52	13	21	1.62	0.62
10	2013	53	22	45	2.05	0.49
11	2014	54	22	38	1.73	0.58
12	2015	55	27	48	1.78	0.56
Total			264	456	1.73	0.58

Yoshikane et al (2009) in their paper published in Scientometrics journal have given the formula to calculate Average Author Per Paper (AAPP) and Productivity Per Author.

The formula mathematically represented as below:

Average Author Per Paper (AAPP) = No. of Authors/No. of Papers

Productivity Per Author (PPA) = No. of Papers/No. of Authors

Table 4 depicts the data about author productivity and average author per paper. It is clear from Table 4 that the average number of authors per article is 1.73 for 264 contributions published in the period 2004-2015. It is also clear from above Table 4 that for the years 2007, 2010 and 2014 equal average number of authors per article is recorded i.e., 1.73.

The average productivity per author for the period 2004-2015 is 0.58. The years 2007, 2010 and 2014 have recorded equal productivity per author i.e., 0.58, and in the year 2009 highest productivity per author i.e., 0.63 is recorded.

5.5 Most Productive Authors in the journal:

Sl No.	Author'S Name	No. of Contributions	% of 264	Rank
1	Riahinia Nosrat	18	6.82	1
2	Singh K	11	4.17	2
3	Sen B	7	2.65	3
4	Vashishth C	7	2.65	4
5	Gautam J	6	2.27	5
6	Joshi Manoj	5	1.89	6
7	Satija M	5	1.89	6
8	Asemi Asefeh	4	1.52	7

9	Babu B	4	1.52	7
10	Biradar B	4	1.52	7
11	Kumar B	4	1.52	7
12	Sharma Arvind	4	1.52	7
13	Zandian Fatemeh	4	1.52	7
14	11 Authors Contributed	3	1.14	8
15	40 Authors Contributed	2	0.76	9
16	201 Authors Contributed	1	0.38	10

Table 06 represents the Ranking of most productive authors based on several contributions during the period of study. 456 authors are contributing 264 publications to Library Herald during the period 2004 -2015. The leading author is Rahiania Nasrat with 18 contributions in First Rank Position, Sing K contributions are 11 and in 2nd rank position. Also, Sen B & V Vashishth C who have contributed 7 articles each and in 3rd rank position. Followed by Gautam J contributed 5 publications and in 4th rank position. 2 authors are contributing 5 articles each followed by 6 authors contributing 4 articles each. As many as 11 authors have contributed 3 articles each and 40 authors have contributed 2 and 201 authors contributed 1 article each during the period 2004-2015.

5.6 Degree of Collaboration:

Sl No.	Year	Total No. Of contributions	Total No. Of Authors	No. Of single authored contributions (Ns)	% of contributions	No. of Multi-authored contributions (Nm)	%	Nm+N _s	%	Degree of Collaboration (Nm /Ns+Nm)
1	2004	27	49	12	4.55	15	5.68	27	10.23	0.56
2	2005	12	15	5	1.89	7	2.65	12	4.55	0.58
3	2006	29	46	12	4.55	17	6.44	29	10.98	0.59
4	2007	22	38	9	3.41	13	4.92	22	8.33	0.59
5	2008	18	34	5	1.89	13	4.92	18	6.82	0.72
6	2009	22	35	11	4.17	11	4.17	22	8.33	0.50
7	2010	26	45	14	5.30	12	4.55	26	9.85	0.46
8	2011	24	42	8	3.03	16	6.06	24	9.09	0.67
9	2012	13	21	6	2.27	7	2.65	13	4.92	0.54
10	2013	22	45	8	3.03	14	5.30	22	8.33	0.64
11	2014	22	38	11	4.17	11	4.17	22	8.33	0.50
12	2015	27	48	14	5.30	13	4.92	27	10.23	0.48
Total		264	456	115	43.56	149	56.44	264	100	0.56

Table 6 represents the Degree of Collaboration (DC) among authors in the Library Herald journal. To calculate the Degree of Collaboration (DC) among the authors in the Library Herald journal, the formula given by Subramanyam (1983) is used which is expressed mathematically as;

Degree of Collaboration, DC = Nm/Nm+N_s Where,
 Nm= No. of Multi-author publications during a specific period in a discipline
 N_s= No. of single-authored publications in the discipline during a given period.

Here $N_m = 149$

$N_s = 115$

$DC = 149/149+115 = 0.56$

Table 5 reveals that the value of the higher Degree of Collaboration (DC) was 0.72 in the year 2008 followed by 0.67 in the year 2011. In the year 2010, the Degree of Collaboration is low i.e., 0.46

5.7 Geographical Distributions of publications

Sl No.	Country	No. of Contributions	% of 264	Rank
1	India	215	81.44	1
2	Nigeria	21	7.95	2
3	Iran	19	7.20	3
4	Bangladesh	3	1.14	4
5	Nepal	3	1.14	5
6	Malaysia	2	0.76	6
7	France	1	0.38	7

An attempt was made to study the geographical distribution of contributions. It is revealed from Table 07 that the majority of contributors are from India with 215 (81.44%) contributors followed by Nigeria with 21 (7.95%) and Iran with 19 (7.20%). Authors from Bangladesh, Nepal, Malaysia, and France have also contributed to this journal. However, Indian authors contributions are more compare to other countries.

5.8. Institution-wise contributions (Ranking of Institutions):

Sl. No.	Institution Name	No. of Contributions	% of 264	Rank
1	University of Delhi (UD)	27	10.23	1
2	Guru Nanak Dev University (GNDU)	9	3.41	2
3	Indira Gandhi National Open University (IGNOU)	9	3.41	2
4	Kurukshetra University (KU)	9	3.41	2
5	North Eastern Hill University (NEHU)	8	3.03	3
6	Rashtrasant Tukadoji Maharaj Nagpur University (RTMNU)	8	3.03	3
7	Anonymous	7	2.65	4
8	Maharani Laxmi Bai Government College of Excellence (MLBGCE)	7	2.65	4
9	School of Studies in Library and Information Science (SSLIS)	6	2.27	5
10	Tarbiat Moallem University	6	2.27	5
11	Kharazmi University	5	1.89	6
12	Kuvempu University (KU)	5	1.89	6
13	Tarbiat Modares University	5	1.89	6
14	Delhi Library Association (DLA)	4	1.52	7
15	CSIR - National Institute of Science,	4	1.52	7

	Technology and Development Studies (CSIRNISTDS)			
16	Dyal Singh College (DSC)	4	1.52	7
17	Indian National Science Academy (INSA)	4	1.52	7
18	Olabisi Onabanjo University Library	4	1.52	7
19	University of Isfahan	4	1.52	7
20	University of Madras (UM)	4	1.52	7
21	University of Mysore (UM)	4	1.52	7
22	Ekiti State University	3	1.14	8
23	Andhra University (AU)	3	1.14	8
24	Maharshi Dayanand University (MDU)	3	1.14	8
25	Mizoram University (MU)	3	1.14	8
26	Punjab Agricultural University (PAU)	3	1.14	8
27	Sri Guru Gobind Singh College of Commerce (SGGSCC)	3	1.14	8
28	University of Agriculture	3	1.14	8
29	University of Calicut (UC)	3	1.14	8
30	University of Dhaka	3	1.14	8
31	CSIR - Central Building Research Institute (CSIRCBRI)	2	0.76	9
32	Aligarh Muslim University (AMU)	2	0.76	9
33	DRDO - Defence Research and Development Establishment (DRDODRDE)	2	0.76	9
34	Goa College of Engineering (GCE)	2	0.76	9
35	Indian Institute of Plantation Management (IIPM)	2	0.76	9
36	Indian Institute of Technology Delhi (IIT Delhi)	2	0.76	9
37	Jawaharlal Nehru University (JNU)	2	0.76	9
38	Jiwaji University (JU)	2	0.76	9
39	Kalasalingam University (KU)	2	0.76	9
40	Karnataka University (KU)	2	0.76	9
41	Mahatma Gandhi University (MGU)	2	0.76	9
42	Modern Public School (MPS)	2	0.76	9
43	Nabakrushna Choudhury Centre for Development Studies (NCCDS)	2	0.76	9
44	NALSAR University of Law (NALSARUL)	2	0.76	9
45	National Council of Educational Research and Training (NCERT)	2	0.76	9
46	Panjab University (PU)	2	0.76	9
47	Ramjas College (RC)	2	0.76	9
48	S N D T Women's University (SNDTWU)	2	0.76	9
49	Sambalpur University (SU)	2	0.76	9
50	Savitribai Phule Pune University (SPPU)	2	0.76	9

Table 8 shows the top 50 institutions which are contributed to the Library Herald-Journal from the year 2004-2015. The University of Delhi contributed the highest number of publications i.e., 27 and got the first position. Guru Nanak Dev University (GNDU), Indira Gandhi National Open University (IGNOU) and Kurukshetra University (KU) contributed 9

publications each and in the second position. North Eastern Hill University (NEHU), Rashtrasant Tukadoji Maharaj Nagpur University (RTMNU) contributed 8 publications and in the third position.

5.9 Subject-wise Distribution:

Table 9: Subject-wise Distribution of Contributions

Sl No.	Subject Category	Total number of Contributions	% of 264	Rank
1	Bibliometrics	21	7.95	1
2	User Studies	21	7.95	1
3	Library Sources and Services	18	6.82	2
4	Academic Library	16	6.06	3
5	Others	16	6.06	3
6	Public Libraries	13	4.92	4
7	Information Technology	12	4.55	5
8	Library professionals/ skills and competencies	12	4.55	5
9	Information Literacy, Programmes, and Standards	10	3.79	6
10	Library Information Networks/ Library Cooperation/Consortia	10	3.79	6
11	Library Automation	7	2.65	7
12	Digital Libraries	6	2.27	8
13	Information Seeking Behaviour	5	1.89	9
14	Library Legislation	4	1.52	10
15	Library Surveys	4	1.52	10
16	Library Use	4	1.52	10
17	Primary Sources	4	1.52	10
18	Web-Based Technologies	4	1.52	10
19	Human Resource Management	3	1.14	11
20	Information Needs	3	1.14	11
21	Information Sources and Services	3	1.14	11
22	Information Systems	3	1.14	11
23	Intellectual Property Rights	3	1.14	11
24	Library Classification	3	1.14	11
25	LIS Discipline, Education and Schools	3	1.14	11
26	Marketing of Information Products and Services	3	1.14	11
27	Preservation and Conservation	3	1.14	11
28	Reading Culture	3	1.14	11
29	Scholarly Communications	3	1.14	11
30	User Education	3	1.14	11
31	Collection Development	2	0.76	12
32	Documentation and Information Centers	2	0.76	12
33	E-Resources	2	0.76	12
34	Information Dissemination	2	0.76	12

35	Information Processing and Retrieval	2	0.76	12
36	Librarianship	2	0.76	12
37	Library Building Management	2	0.76	12
38	Library Development	2	0.76	12
39	Library Profession	2	0.76	12
40	Metadata	2	0.76	12
41	Open access movement	2	0.76	12
42	School Library	2	0.76	12
43	Special Libraries	2	0.76	12
44	Library Building Management	1	0.38	13
45	Continuing Education Programmes	1	0.38	13
46	Data Mining	1	0.38	13
47	Information Agencies	1	0.38	13
48	Information Ethics	1	0.38	13
49	Information Rights	1	0.38	13
50	Information Society	1	0.38	13
51	Library Circulation	1	0.38	13
52	Library Laws and Standards	1	0.38	13
53	Library Management	1	0.38	13
54	Library Promotion	1	0.38	13
55	Plagiarism	1	0.38	13
56	Research Methodology	1	0.38	13
57	Research Productivity	1	0.38	13
Total		264	100	

Table 9 shows subject wise contributions in the journal Library Herald from 2004 to 2015. The authors major interested areas are Bibliometrics (21), User Studies (21), Library Sources and Services (18), Academic Library (16), Public Libraries (13) Information Technology (12) Library professionals/ skills and competencies (12), Information Literacy, Programmes and Standards (10), Library Information Networks/ Library Cooperation/ Consortia (10), Library Automation (7).

6. Findings and Conclusion:

In this study, some of the Bibliometric indicators applied and results discussed and presented under different table headings. From the above discussions, it can be concluded that in Library Herald Journal, most of the publications from Indian authors and Indian Institutions. During the publication phase of 2004-2015, a total of 264 articles have been published. Also, the study shows that the highest numbers of 29 contributions published in the years 2004, 2006, 2015. Out of 264 publications in the year 2004-2015, the highest number of publications were 196 (74.24%) Research Articles. A pattern of authorship of publications analysed that the highest contributions are single and double-authored contributions have dominated this journal. In all, Single Author contributions are 115 (43.56%) and multiple-authored contributions are (53.44%) during the period 2004-2015. The average number of authors per article is recorded i.e., 1.73. The average productivity per author for the period 2004-2015 is 0.58. The higher Degree of Collaboration (DC) was 0.72 in the year 2008 followed by 0.67 in the year 2011. 456 authors are contributing 264 publications, and the

leading author is Rahiania Nasrat with 18 contributions in First Rank Position. The University of Delhi contributed the highest number of publications i.e., 27 and got the first position. The author's major interested areas are Bibliometrics, User Studies, Library Sources and Services, Academic Library, Public Libraries Information Technology, Library professionals/ skills and competencies, Information Literacy, Programmes and Standards, Library Information Networks/ Library Cooperation/ Consortia, Library Automation.

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