

User's Experience with E-Journal Features: A Research Survey of Aerospace Scientists and Engineers of Bangalore

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Abstract: Today, Government, R&D institutions and Universities are investing substantial amount of money for providing scholars with the digital literature they need for their research work with the intention that improved access to electronic information resources will lead to increasing scholarly productivity. The transformation of the physical library to the virtual library probably saves time, since one can access publications (electronic journals and electronic databases) from one's desktop. The extent of publications available online combined with easier access has tremendously improved scholars' ability to keep abreast in their field, and perhaps inspire new ideas and ultimately enhance the quality of their work. A research survey was undertaken to study the User's Experience (Aerospace Scientists and Engineers of Bangalore), with the various online features provided by 'Electronic Journals'. The geographic boundary of this research study consists of 16 prominent aerospace organizations of Bangalore. The age-group of this study is between 21-60 years. The broad areas of specialization of the Aerospace Scientists and Engineers have been classified into (a) Thermal and Fluid Sciences, (b) Avionics, Guidance and Control, (c) Aerospace Structures and Allied Mechanical Sciences, (d) Materials and Metallurgy, (e) Flight Operations and other Allied Disciplines, and (f) General Engineering and Support Sciences. The major conclusions of this study are: (1) The χ^2 test indicates that 'e-Mailed Table of Contents' and the different types of aerospace organizations have significant association (Chi-Square = 95.939, $P = 0.002$), (2) The χ^2 test indicates that 'e-Mailed Article Citation Alerts on Topics of Interest to You' and the different types of aerospace organizations have significant association (Chi-Square = 84.388, $P = 0.021$), (3) The χ^2 test indicates that 'Videos of animated graphics' and the different types of aerospace organizations have no significant association (Chi-Square = 73.211, $P = 0.118$). The percentage of preference for 'Videos of animated graphics' by the 16 aerospace organizations are approximately the same [Uniformly Distributed], (4) The χ^2 test indicates that 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' and the different types of aerospace organizations have no significant association (Chi-Square = 67.726, $P = 0.230$). The percentage of preference for 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' by the 16 aerospace organizations is approximately the same [Uniformly Distributed], (5) The χ^2 test indicates that 'Hyperlinks from an article to a scientific database' and the different types of aerospace organizations have significant association (Chi-Square = 88.222, $P = 0.010$), (6) The χ^2 test indicates that 'Hyperlinks from an article to an author's e-mail address' and the different types of aerospace organizations have no significant association (Chi-Square = 72.693, $P = 0.126$). The percentage of preference for 'Hyperlinks from an article to an author's e-mail address' by the 16 aerospace organizations are approximately the same [Uniformly Distributed], (7) The χ^2 test indicates that 'Hyperlinks from an article to an author's website' and the different types of aerospace organizations have significant association (Chi-Square = 97.434, $P = 0.002$), (8) The χ^2 test indicates that 'Pay-per-view' and the different types of aerospace organizations have significant association (Chi-Square = 81.812, $P = 0.032$), (9) The χ^2 test indicates that 'Electronic manuscript subscription' and the different types of aerospace organizations have significant association (Chi-Square = 92.842, $P = 0.004$).

Keywords: Aerospace Scientists and Engineers, City of Bangalore, User's Experience, E-Journal Features, Chi-Square.

1. Introduction

It is seen that pure electronic journals have the flexibility to develop new features and formats which take advantage of the online environment. Over the past decade, the usefulness and utility of the electronic medium has vastly expanded. Scholarly journals have increasingly become Internet-based. The Internet itself has facilitated "greater speed, scope and interactivity" in scholarly communication [1], [2]. Today, the electronic environment has become the fastest growing arena in scholarly publishing and a great incentive for journals to be accessed online.

It is also absolutely clear that the use of electronic media to support scientific communication has been one of the paradigm shifts in the practice of science in this era. For a research scientist today, with access to the Internet, working across continents and different time zones and keeping in

touch with his peers has indeed become a reality due to the exponential growth of the telecommunication infrastructure the world has witnessed. With the coming of e-resources, there has been a significant transformation by which scholarly information is disseminated throughout the world. In fact, the arrival of e-journals has greatly affected the way a scientist or an engineer seeks this information, acquires it and then uses it effectively.

Several studies have shown that scholars highly value 'electronic journals'. Most importantly, electronic journals save time, make work easier, result in better quality research and enables the scholars to find more materials. Another important factor of the electronic medium is the increased ability of scholars to engage in interactive forms of communication. [3]

Most importantly, scholarly journals along with monographic works and conference proceedings are the primary medium for the formal display and dissemination of knowledge in the academic community, and they have been for hundreds of years, [4].

Over the past decade, as the utility of the electronic medium expanded, scholarly journals have increasingly become Internet-based. Initially, the perceived benefits of the electronic medium seemed to some observers to inevitably lead to the obsolescence of printed journals. Another major incentive for the development of electronic journals was the perceived economic benefit of the new medium [1].

2. Five Important Features of Electronic Journals (and Not Restricted to...)

The author [1], brings to the attention of the readers five important features which are sine-qua-non to electronic journals: These are:

- a) **Non-Linearity** – the presence of internal links within articles. Internal links within an article effectively break the text from one continuous body into parts that may be easily read out of order. Internal links were categorized as either navigation links, which link and move within the article, or citation links, which are links from in-text citations to the bibliography.
 - b) **Multimedia** – the presence of non-textual forms of information, such as video or audio clips, simulations, and other downloadable materials.
 - c) **Multiple Use**– The presence of external links in the text or bibliography of an article that provide access to the full texts or full text locations of cited works, or links to referenced Web sites
 - d) **Interactivity** – the ability for a reader to directly communicate with the article author through the journal itself without delay, through comments, e-mail, or forums.
 - e) **Rapid Publication** – the publication of an article either immediately or within a very short time of acceptance".
- Other salient features associated with online journals are: (a) Hypertext links, (b) Graphics, (c) Audio and Video, (d) Post-Publication Comments, (e) Post Publication Discussions: Listserv lists, Chat Rooms etc., (f) Access to downloadable data files, (g) Electronic Review, (h) Correction of Errors, (i) Presentation in Multiple Formats, (DOC, DOCX, HTML, PDF etc.), (j) Full-Text Searching, (k) Electronic Notification of Publication, (l) Provision of Related Resources, (m) Constant Access [5]

3. Review of Literature

The value of electronic journals amongst researchers is seen in an interesting study conducted by the authors. They surveyed over 1,200 scholars around the world to obtain their views on electronic publishing and the *usefulness and added value of additional electronic features*. They found that linking from citations to cited articles was rated as the most valuable added feature (rated as "very important" or "important" by 88% of responders), followed by the inclusion of additional data (57%), additional or color images (45%), manipulatable content such as software, simulations, online experiments, etc. (23%), and video or

sound (14%). The ability to publish articles as soon as they are finalized was valued as "very important" or "important" by 64% of responders. Peer review also ranked high in terms of value, receiving a ranking of "very important" or "important" by 94% of responders. Of the other types of electronic feedback included in the survey, the ability to submit comments about an article, availability of post-publication public commentary, publication of referee comments, referee identification, and availability of public commentary on preprints, all were valued as "not important" by a majority of responders [6].

In another important study, the authors found similar results. The interviewees in this study reported a number of the features of online publishing as useful, including the ability to reach a larger audience, ease of access by readers, more rapid publication even when a paper is peer reviewed, the ability to search within and across texts, and the opportunity to make use of hyperlinks. Peer review was again reported as an essential factor in how scholars appraise publications, and a critical factor in the acceptance of electronic journals. Many scholars interviewed in this study reported utilizing new modes of scholarly communication and publication, but most relied on traditional publishing formats for the formal dissemination of their scholarly products, as they felt that publications in traditional venues would carry more weight when the time came for career evaluations [7].

Another unique capability of the electronic medium is the ability to insert items that might not be presented in the main body of a conventional journal article, such as large data sets, video and audio segments, mathematical analyses, and derivations. The primary advantage of an electronic environment over print, is the ability to integrate "all possible expressions of scientific knowledge" into one carrier, [8].

The other notable feature of electronic publishing is "multiple use," or linking to the full text of a cited article. In a traditional article, previous works are used as references through direct quotes or by citations at the relevant points in the paper, and a complete list of the references is given at the end in the bibliography. Multiple use differs from quotation in that "in multiple use the author can rely on the completeness and integrity of the quoted work". In an electronic environment, links to references can be built into the article, enabling a reader full access to a cited work, whereas in the printed article the author either quotes or paraphrases small selections [7].

An important aspect of the electronic medium is the increased ability of scholars to engage in interactive forms of communication, [9]. The authors in their study strongly vouch that it is important for a publication that implements a modular form to also include a printable form of the article. Multimedia features can be an asset in more fully expounding on an idea, but these were seen in low incidence. Multiple use, or external reference linking, is also a great help for researchers, but requires the referred articles to also be openly available and accessible, [9].

To these authors, E-journals possess many added features for the facilitation of libraries and its user community. These

offer concurrent access to the scholarly content for multiple users. So these are boon for a huge campus where there are hundreds of users with many departments. Other features of e-journals include full-text search, multimedia facilities and hypertext links. Text search is much easier and less cumbersome. E-journals also include multimedia and graphics to attract readers. Also the hypertext available in the e-journals will directly link to the areas of greatest interest and results in creative reading [10].

Some of the most significant advantages that electronic journals include are that no physical space is required. Also, accessibility from almost any workstation that can be connected remotely to the institution's network is possible. Thus e- journals can be accessed round the clock across geographical barriers, which make e-journals omnipresent. [11].

Electronic resources are extremely useful among the librarians and library users due to several factors and these could be summed up as: (a) Speed, (b) Flexibility, (c) Range and (d) Currency, [12].

4. AERADE's: Pioneering Initiatives in Facilitating the Use of Aerospace Electronic Information Resources

The Aerospace Information Management – UK (AIM-UK) project – found compelling evidence of ‘under-utilization’ of ‘Electronic Information Resources’ by the aerospace scientists and engineers. It recommended a number of initiatives to raise awareness and improve access to useful electronic information resources, and to reduce the threat of ‘information overload’. In particular, there was a call to establish an Internet Gateway and Portal to the aerospace and defence community that would act as a ‘jumping-off-point’ for effective exploration and retrieval of information on the WWW. Launched in November, 1999, AERADE is specifically designed to meet this need. It is an initiative developed by the Cranfield University to enable aerospace and defence experts to find relevant information on the Internet. Today, the reports archive is a historical collection of over 10,000 significant technical papers and reports produced by the Aeronautic Research Council (ARC) and the National Advisory Committee for Aeronautics (NACA), [13].

5. CSIR-National Aerospace Laboratories, Bangalore and Allied Aerospace Organizations in Bangalore: The Scope of the Present Study

The National Aerospace Laboratories is India's premier civil aviation R&D aerospace research organization in the country. Its main mandate is the ‘Development of aerospace technologies with a strong science content, design and build small and medium – sized civil aircraft, and support all national aerospace programmes. NAL is also required ‘to use its aerospace technology base for general industrial applications’. ‘Technology’ would be its core engine-driver for the future. NAL is also best known for its main sophisticated aerospace R&D testing facilities which are not

only unique for this country but also comparable to similar facilities elsewhere in the world.

Sixteen prominent aerospace organizations of Bangalore were selected for this research study (See Table 1), and many of these aerospace organizations come under the broad umbrella of (i) Council of Scientific and Industrial Research (CSIR), (ii) Defense Research and Development Organizations (DRDO), (iii) The Indian Air Force (IAF), (iv) Educational Institutions like IISc, and (v) Major public sector undertakings and (vi) The Department of Space. All of them in their own way have significantly contributed to a large number of Indian aerospace programmes.

6. Null Hypotheses

- There is no association between (1), ‘e-Mailed Table of Contents’ (2) ‘e-Mailed Article Citation Alerts on Topics of Interest to You’ (3) ‘Videos of animated graphics’, (4) ‘Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)’ (5) ‘Hyperlinks from an article to a scientific database’, (6) ‘Hyperlinks from an article to an author's e-mail address’ (7) ‘Hyperlinks from an article to an author's website’, (8) ‘Pay-per-view’ (9) ‘Electronic manuscript subscription’ and the ‘User's Experience with E-Journal Features’ by the Aerospace Scientists and Engineers.

7. Objectives of the Study

- To determine whether there is significant association of ‘User's Experience with E-Journal Features’ amongst the aerospace scientists and engineers of Bangalore.
- To see whether the ‘User's Experience with E-Journal Features’ are either uniformly or non-uniformly distributed in the present study.

8. Materials and Methods

The present study is restricted to the selected 16 prominent aerospace organizations in Bangalore. A total number of 650 survey questionnaires were distributed amongst the aerospace scientists and engineers belonging to these 16 aerospace organizations. A total number of 612 questionnaires were received back finally 583 (89.7%) were selected for the study which were found suitable for the study. A survey questionnaire has been used to conduct this research study. The total population size of this research study is restricted to the 1220 aerospace scientists and engineers in Bangalore. The distribution of Source Data is indicated in *Table 1*. The investigator also divided the whole population of the study into two major categories: namely, aerospace scientists and engineers. It may be seen from *table 2*, that out of 583 respondents, 295 (50.6%) are aerospace scientists and the remaining 288(49.4%) are aerospace engineers. ‘User's Experience with E-Journal Features’ is illustrated in *Table 3*, with the necessary statistical inferences. Random sampling technique has been used for selection of the sample size.

9. Results and Discussion

Summary of Total Scores for the Frequency of Usage of Web Sites

• E-Mailed Table of Contents

It is seen that out of the 583 respondents, 284 respondents representing 48.7% of the total sample size, have opted for 'I have not used it, and: 2- I would like to try it'. This is followed by 182 respondents scoring 31.2% who have chosen 'I have used and found it: 1 – Useful'. The third largest number of respondents amounting to 61 and representing 10.5% has opted for 'I have used it and found it: 0 – Not Useful'. This is followed by 39 respondents representing 6.7% have opted for 'I have not used it, and I: 1 – No plan to use it'. Finally, the lowest number of respondents amounting to 17 has opted for 'I have not used it, and I: 0 – Would not like to try it'. The organization wise percentage break-up is as follows:

Chi Square: The χ^2 test indicates that 'e-Mailed Table of Contents' and the different types of aerospace organizations have significant association (Chi-Square = 95.939, $P = 0.002$).

• E-Mailed Article Citation Alerts on Topics of Interest to You.

It is seen that out of the 583 respondents, the largest number of respondents amounting to 277 and representing 47.5% have chosen 'I have not used it, and I: 2 – Would like to try it'. This is followed by 177 respondents and representing 30.4% who have opted for 'I have used it and found it: 1 – Useful'. The third largest number of respondents amounting to 60 and aggregating 10.3% has chosen 'I have used it and found it: 0 – Not Useful'. This is followed by 43 respondents amounting to 7.4% who have chosen 'I have not used it, and I: 1 – No plan to use it'. Finally, 26 respondents representing 4.5% have opted for 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'e-Mailed Article Citation Alerts on Topics of Interest to You' and the different types of aerospace organizations have significant association (Chi-Square = 84.388, $P = 0.021$).

• Videos of Animated Graphics

It is seen that out of the 583 respondents, the largest number of respondents amounting to 285 and representing 48.9% of the total sample size, have chosen, 'I have not used it, and I: 2 – Would like to try it'. This is followed by the 155 respondents amounting to 26.6%, who have chosen the option, 'I have used and found it: 1 – Useful'. A total number of 67 respondents amounting to 11.5% have opted for 'I have used it and found it: 0 – Not useful'. A similar number of respondents amounting to 38 and representing 6.5% each have chosen the options, 'I have not used it, and I: 1 – No plan to use it' and 'I have not used it, and I: 0 – Would not like to try it' respectively.

Chi Square: The χ^2 test indicates that 'Videos of animated graphics' and the different types of aerospace organizations have **no significant association** (Chi-Square = 73.211, $P = 0.118$). The percentage of preference for 'Videos of animated graphics' by the 16 aerospace organizations are approximately the same.

• Hyperlinks from one Article to a Cited Article in a Different Journal at No Charge (Toll Free Linking)

It is seen that out of the 583 respondents, the largest number of respondents amounting to 248 and representing 42.5% of the total sample size have opted for 'I have not used it, and I: 2 – Would like to try it'. This is followed by 224 respondents scoring 38.4% who have chosen 'I have used it and found it: 1 – Useful'. A total of 55 respondents amounting to 9.4% have chosen 'I have used it and found it: 0 – Not useful'. This is followed by 34 respondents representing 5.8% who have opted for 'I have not used it, and I: 1 – No plan to use it'. Finally, a total number of 22 respondents representing 3.8% have chosen 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' and the different types of aerospace organizations **have no significant association** (Chi-Square = 67.726, $P = 0.230$). The percentage of preference for 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' by the 16 aerospace organizations is approximately the same.

• Hyperlinks an Article to a Scientific Database

It is seen that out of the 583 respondents, the largest number of respondents amounting to 249 and representing 42.7% has opted for 'I have not used it, and I: 2 – Would like to try it'. The second largest number of respondents amounting to 217 and scoring 37.2% has chosen 'I have used it and found it: 1 – Useful'. The third largest number of respondents amounting to 55 and representing 9.4% has opted for 'I have used it and found it: 0 – Not useful'. A total of 40 respondents representing 6.9% have opted for 'I have not used it, and I: 1 – No plan to use it'. Finally, a total number of 22 respondents amounting to 3.8% have chosen 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'Hyperlinks from an article to a scientific database' and the different types of aerospace organizations have significant association (Chi-Square = 88.222, $P = 0.010$).

• Hyperlinks from an Article to an Author's E-Mail Address

It is seen that out of the 583 respondents, the largest number of respondents amounting to 262 and representing 44.9% of the total sample size have opted for 'I have not used it, and I: 2 – Would like to try it'. This is followed by 173 respondents scoring 29.7% who have chosen 'I have used it and found it: 1 – Useful'. The third largest number of respondents have opted for 'I have used it and found it: 0 – Not useful' amounting to 74 and aggregating 12.7%. This is followed by 49 respondents and amounting to 8.4% who have chosen 'I have not used it, and I: 1 – No plan to use it'. Finally, 25 respondents representing 4.3% have opted for 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'Hyperlinks from an article to an author's e-mail address' and the different types of aerospace organizations **have no significant association** (Chi-Square = 72.693, $P = 0.126$). The

percentage of preference for 'Hyperlinks from an article to an author's e-mail address' by the 16 aerospace organizations are approximately the same.

• Hyperlinks from an Article to an Author's Website

It is seen that out of the 583 respondents, the largest number of respondents scoring 245 and scoring 42.0% of the total sample size have chosen 'I have not used it, and I: 2 – Would like to try it'. This is followed by 'I have used it and found it: 1 – Useful' representing 154 and scoring 26.4%. A total number of 92 respondents representing 15.8% have opted for 'I have used it and found it: 0 – Not useful'. This is followed by 57 respondents and amounting to 9.8% who have chosen, 'I have not used it, and I: 1 – No plan to use it'. Finally, 35 respondents representing 6.0% have opted for 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'Hyperlinks from an article to an author's website' and the different types of aerospace organizations have significant association (Chi-Square = 97.434, $P = 0.002$).

• Pay-Per-View

It is seen that out of the 583 respondents, the largest number of respondents amounting to 229 and representing 39.3% of the total sample size have chosen, 'I have not used it, and I: 2 – Would like to try it'. This is followed by 127 respondents representing 21.8% who have opted for 'I have used it and found it: 0 – Not useful'. The third largest number of respondents amounting to 79 and aggregating 13.6% has chosen, 'I have used it and found it: 1 – Useful'. This is followed by 75 respondents amounting to 12.9% who have opted for 'I have not used it, and I: 0 – Would not like to try it'. Finally, 73 respondents representing 12.5% have chosen, 'I have not used it, and I: 1 – No plan to use it'.

Chi Square: The χ^2 test indicates that 'Pay-per-view' and the different types of aerospace organizations have significant association (Chi-Square = 81.812, $P = 0.032$).

• Electronic Manuscript Subscription.

It is seen that out of the 583 respondents, the largest number of respondents amounting to 236 and representing 40.5% of the total sample size is for the option, 'I have not used it, and I: 2 – Would like to try it'. This is followed by 145 respondents amounting to 24.9% who have chosen, 'I have used it and found it: 1 – Useful'. A total of 96 respondents representing 16.5% have opted for 'I have used it and found it: 0 – Not useful'. This is followed by 61 respondents aggregating 10.5% who have chosen, 'I have not used it, and I: 1 – No plan to use it'. The remaining 45 respondents scoring 7.7% have opted for 'I have not used it, and I: 0 – Would not like to try it'.

Chi Square: The χ^2 test indicates that 'Electronic manuscript subscription' and the different types of aerospace organizations have significant association (Chi-Square = 92.842, $P = 0.004$).

10. Conclusions

It appears that the ability to publish rapidly seems to be a primary advantage of the electronic medium for the

aerospace scientists and engineers, where research and discovery moves at a rapid pace. In order to attract authors and readers, the Journal publishers get a great incentive to provide rapid and quick publication. Some of the easiest features that could be quickly implemented in electronic-only journals are: internal linking, inclusion of author e-mail addresses, and rapid publication. In the foreseeable future, the traditional linear article will continue to be the most prevalent format for the scholarly journals, both print and electronic. And while electronic features will acquire more and more use as technology constantly improves, they will continue to be used to supplement, and not supplant, the traditional article.

The main conclusions of this research study that the authors would like to present are:

The main conclusions that we would like highlight in this study are:

- The χ^2 test indicates that 'e-Mailed Table of Contents' and the different types of aerospace organizations have significant association (Chi-Square = 95.939, $P = 0.002$),
- The χ^2 test indicates that 'e-Mailed Article Citation Alerts on Topics of Interest to You' and the different types of aerospace organizations have significant association (Chi-Square = 84.388, $P = 0.021$). The χ^2 test indicates that 'Videos of animated graphics' and the different types of aerospace organizations **have no significant association (Chi-Square = 73.211, $P = 0.118$)**. The percentage of preference for 'Videos of animated graphics' by the 16 aerospace organizations are approximately the same [**Uniformly Distributed**].
- The χ^2 test indicates that 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' and the different types of aerospace organizations have **no significant association (Chi-Square = 67.726, $P = 0.230$)**. The percentage of preference for 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)' by the 16 aerospace organizations is approximately the same [**Uniformly Distributed**].
- The χ^2 test indicates that 'Hyperlinks from an article to a scientific database' and the different types of aerospace organizations have significant association (Chi-Square = 88.222, $P = 0.010$). The χ^2 test indicates that 'Hyperlinks from an article to an author's e-mail address' and the different types of aerospace organizations **have no significant association (Chi-Square = 72.693, $P = 0.126$)**. The percentage of preference for 'Hyperlinks from an article to an author's e-mail address' by the 16 aerospace organizations are approximately the same [**Uniformly Distributed**].
- The χ^2 test indicates that 'Hyperlinks from an article to an author's website' and the different types of aerospace organizations have significant association (Chi-Square = 97.434, $P = 0.002$). The χ^2 test indicates that 'Pay-per-view' and the different types of aerospace organizations have significant association (Chi-Square = 81.812, $P = 0.032$),
- The χ^2 test indicates that 'Electronic manuscript subscription' and the different types of aerospace

organizations have significant association (Chi-Square = 92.842, $P = 0.004$).

- It is seen that, 'Video of Animated Graphics', 'Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking), and 'Hyperlinks from an article to an author's e-mail address show a homogeneous pattern amongst the aerospace scientists and engineers as far as their 'Experience with E-Journal Features' are concerned.

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References

- [1] M. Mathew (2007). The Prevalence of Additional Electronic Features in Pure E-Journals, The Journal of Electronic Publishing, 10(3), DOI: <http://dx.doi.org/10.3998/3336451.0010.307>
- [2] Harnad, S. (1991). Post-Gutenberg galaxy: the fourth revolution in the means of production of knowledge. Public-Access Computer Systems Review, (1), 39-53. <http://www.ecs.soton.ac.uk/~harnad/Papers/Harnad/harnad91.postgutenberg.html>
- [3] King, D.W., P.B. Boyce, C.H. Montgomery, and C. Tenopir. (2003). Library economic metrics: examples of the comparison of electronic and print journal collections and collection services. Library Trends, (3), 376-400.
- [4] Swan, A. (2006). Overview of scholarly communication. In Open Access: Key Strategic, Technical and Economic Aspects, edited by Neil Jacobs. Chandos Publishing: Oxford. <http://eprints.ecs.soton.ac.uk/12427/>
- [5] Cesarone, B., (1999), Writing for Electronic Journals. Early Childhood Research and Practice (ECRP), 16(1), University of Illinois at Urbana-Champaign
- [6] Swan, A. and S. Brown. (2003). Authors and electronic publishing: what authors want from the new technology. Learned Publishing, (1), 28-33. [doi: 10.1087/095315103320995069]
- [7] Harley, D., S. et al., (2007). The influence of academic values on scholarly publication and communication practices. Journal of Electronic Publishing, (2).
- [8] Kircz, J.G. (2002). New practices for electronic publishing 2: new forms of the scientific paper. Learned Publishing, (1), 27-32. [doi: 10.1087/095315102753303652]
- [9] Harnad, S. (1992). Interactive publication: extending the American Physical Society's discipline-specific model for electronic publishing. Serials Review, Special Issue on Economics Models for Electronic Publishing, pp. 58-61. <http://cogsci.soton.ac.uk/harnad/Papers/Harnad/harnad92.interactivpub.html>
- [10] Tenopir, C., D.W. King, P. Boyce, M. Grayson, Y. Zhang, and M. Ebu. 2003. Patterns of journal use by scientists through three evolutionary phases. D-Lib Magazine, 9(5). [doi: 10.1045/may2003-king]
- [11] Vashishta, S. and Navijyoti, (2011), 'Trends in the Use of E-Journals': A Case Study of PEC University of

Technology Chandigarh, Library Philosophy and Practice, Paper 656.

<http://digitalcommons.unl.edu/libphilprac/656>.

- [12] Maxymuk, J. (2004). Electronic journals redux. The Bottom line: Managing library finances, 17(2), 72-74.
- [13] Hanley, K. Harrington, J. and Blagden, J. (1998), Aerospace Information Management (AIM-UK): Final Report, Cranfield University Press, Cranfield.

Tables and Figures

Table-1: Distribution of Source Data (Sample Size)

Sl. No.	Organizations	No. of Questionnaires distributed	No. of Questionnaires received	No. of usable questionnaire usable
1.	ADA	67	63	58
2.	AFTC	19	16	15
3.	ADE	14	12	12
4.	ASTE	33	30	29
5.	CABS	16	15	14
6.	CEMILAC	33	30	29
7.	C-MMACS	8	6	6
8.	DARE	11	9	9
9.	LRDE	5	3	2
10.	GTRE	24	22	21
11.	HAL	144	140	134
12.	IAM	40	36	33
13.	ISRO-ISTRAC	25	24	22
14.	IISc	38	37	34
15.	JNCASR	5	3	1
16.	NAL	168	166	164
Total		650	612	583 (89.7%)

Geographical Boundary of the Study (16 Prominent Aerospace Organizations of Bangalore, INDIA).

Key: ADA=Aeronautical Development Agency, AFTC=Air Force Technical College, ADE=Aeronautical Development Establishment, ASTE=Aircraft Systems Testing Establishment, CABS=Centre for Airborne Systems, CEMILAC=Centre for Military Airworthiness and Certification, C-MMACS=Centre for Mathematical Modeling and Computer Simulation, DARE=Defense Avionics Research Establishment, LRDE=Electronics and Radar Development Establishment, GTRE=Gas Turbine Research Establishment, HAL=Hindustan Aeronautics Limited, IAM=Institute of Aerospace Medicine, ISRO-ISTRAC=Indian Space Research Organization, IISc=Indian Institute of Science, JNCASR=Jawaharlal Nehru Centre for Advanced Scientific Research, NAL=National Aerospace Laboratories.

Table 2: Profile of the Respondents (Category-Wise Distribution)

Sl. No.	Organizations	Categories		Organization Wise, Total No. of Respondent	% of Total Sample
		Aerospace Scientist	Aerospace Engineer		
1	ADA	39	19	58	9.9
2	AFTC	0	15	15	2.6
3	ADE	12	0	12	2.1
4	ASTE	2	27	29	5.0
5	CABS	13	1	14	2.4
6	CEMILAC	26	3	29	5.0
7	C-MMACS	2	4	6	1.0
8	DARE	7	2	9	1.5
9	LRDE	2	0	2	0.3
10	GTRE	12	9	21	3.6
11	HAL	3	131	134	23.0
12	IAM	30	3	33	5.7
13	ISRO-ISTRAC	5	17	22	3.8
14	IISc	21	13	34	5.8
15	JNCASR	1	0	1	0.2
16	NAL	120	44	164	28.1
Total for all Organizations		295	288	583	100.0
Percent for all Organizations		(50.6)	(49.4)	(100.0)	
Chi-Square		278.811			
P Value		0.000			

(Numbers in brackets indicate percentages)

Table 3: Users' Experience With e-Journal Features [e-Mailed Table of Contents]

SN	Organizations	(1) e-Mailed Table of Contents					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	4	19	30	3	2	58	9.9
		(6.9)	(32.8)	(51.7)	(5.2)	(3.4)		
2	AFTC	5	5	4	1	0	15	2.6
		(33.3)	(33.3)	(26.7)	(6.7)	(0.0)		
3	ADE	1	6	3	2	0	12	2.1
		(8.3)	(50.0)	(25.0)	(16.7)	(0.0)		
4	ASTE	2	2	24	0	1	29	5.0
		(6.9)	(6.9)	(82.8)	(0.0)	(3.4)		
5	CABS	0	4	9	0	1	14	2.4
		(0.0)	(28.6)	(64.3)	(0.0)	(7.1)		
6	CEMILAC	4	8	16	0	1	29	5.0
		(13.8)	(27.6)	(55.2)	(0.0)	(3.4)		
7	C-MMACS	1	5	0	0	0	6	1.0
		(16.7)	(83.3)	(0.0)	(0.0)	(0.0)		
8	DARE	0	7	2	0	0	9	1.5
		(0.0)	(77.8)	(22.2)	(0.0)	(0.0)		
9	LRDE	0	1	1	0	0	2	0.3
		(0.0)	(50.0)	(50.0)	(0.0)	(0.0)		
10	GTRE	2	7	10	2	0	21	3.6
		(9.5)	(33.3)	(47.6)	(9.5)	(0.0)		
11	HAL	18	32	67	13	4	134	23.0
		(13.4)	(23.9)	(50.0)	(9.7)	(3.0)		
12	IAM	7	5	14	6	1	33	5.7

		(21.2)	(15.2)	(42.4)	(18.2)	(3.0)		
13	ISRO-ISTRAC	1	10	11	0	0	22	3.8
		(4.5)	(45.5)	(50.0)	(0.0)	(0.0)		
14	IISc	2	7	18	6	1	34	5.8
		(5.9)	(20.6)	(52.9)	(17.6)	(2.9)		
15	JNCASR	0	1	0	0	0	1	0.2
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
16	NAL	14	63	75	6	6	164	28.1
		(8.5)	(38.4)	(45.7)	(3.7)	(3.7)		
Total for all Organizations		61	182	284	39	17	583	100.0
Percent for all Organizations		(10.5)	(31.2)	(48.7)	(6.7)	(2.9)	(100.0)	
Chi-Square		95.939						
P Value		0.002						

(Numbers in Brackets indicate Percentages)

Key: ADA=Aeronautical Development Agency, AFTC=Air Force Technical College, ADE=Aeronautical Development Establishment, ASTE=Aircraft Systems Testing Establishment, CABS=Centre for Airborne Systems, CEMILAC=Centre for Military Airworthiness and Certification, C-MMACS=Centre for Mathematical Modelling and Computer Simulation, DARE=Defense Avionics Research Establishment, LRDE=Electronics and Radar Development Establishment, GTRE=Gas Turbine Research Establishment, HAL=Hindustan Aeronautics Limited, IAM=Institute of Aerospace Medicine, ISRO-ISTRAC=Indian Space Research Organization, IISc=Indian Institute of Science, JNCASR=Jawaharlal Nehru Centre for Advanced Scientific Research, NAL=National Aerospace Laboratories.

Table 3: Users' Experience With e-Journal Features [e-Mailed Article Citation Alerts on Topics of Interest to You]

SN	Organiza tions	(2) e-mailed article citation alerts on topics of interest to you					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	10	15	31	2	0	58	9.9
		(17.2)	(25.9)	(53.4)	(3.4)	(0.0)		
2	AFTC	5	3	6	1	0	15	2.6
		(33.3)	(20.0)	(40.0)	(6.7)	(0.0)		
3	ADE	0	6	4	2	0	12	2.1
		(0.0)	(50.0)	(33.3)	(16.7)	(0.0)		
4	ASTE	3	6	17	1	2	29	5.0
		(10.3)	(20.7)	(58.6)	(3.4)	(6.9)		
5	CABS	3	2	8	0	1	14	2.4
		(21.4)	(14.3)	(57.1)	(0.0)	(7.1)		
6	CEMILA C	3	7	11	4	4	29	5.0
		(10.3)	(24.1)	(37.9)	(13.8)	(13.8)		
7	C- MMACS	0	6	0	0	0	6	1.0
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
8	DARE	0	7	2	0	0	9	1.5
		(0.0)	(77.8)	(22.2)	(0.0)	(0.0)		
9	LRDE	0	0	2	0	0	2	0.3
		(0.0)	(0.0)	(100.0)	(0.0)	(0.0)		
10	GTRE	2	10	9	0	0	21	3.6
		(9.5)	(47.6)	(42.9)	(0.0)	(0.0)		
11	HAL	15	31	71	11	6	134	23.0
		(11.2)	(23.1)	(53.0)	(8.2)	(4.5)		
12	IAM	5	7	15	4	2	33	5.7
		(15.2)	(21.2)	(45.5)	(12.1)	(6.1)		
13	ISRO- ISTRAC	2	8	9	2	1	22	3.8
		(9.1)	(36.4)	(40.9)	(9.1)	(4.5)		
14	IISc	1	11	15	5	2	34	5.8
		(2.9)	(32.4)	(44.1)	(14.7)	(5.9)		

15	JNCASR	0	1	0	0	0	1	0.2
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
16	NAL	11	57	77	11	8	164	28.1
		(6.7)	(34.8)	(47.0)	(6.7)	(4.9)		
Total for all Organizations		60	177	277	43	26	583	100.0
Percent for all Organizations		(10.3)	(30.4)	(47.5)	(7.4)	(4.5)	(100.0)	
Chi-Square		84.388						
P Value		0.021						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience With e-Journal Features [Videos of Animated Graphics]

SN	Organiza tions	(3) Videos of animated graphics					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	9	12	30	5	2	58	9.9
		(15.5)	(20.7)	(51.7)	(8.6)	(3.4)		
2	AFTC	5	3	7	0	0	15	2.6
		(33.3)	(20.0)	(46.7)	(0.0)	(0.0)		
3	ADE	0	7	4	1	0	12	2.1
		(0.0)	(58.3)	(33.3)	(8.3)	(0.0)		
4	ASTE	1	5	18	3	2	29	5.0
		(3.4)	(17.2)	(62.1)	(10.3)	(6.9)		
5	CABS	0	5	8	0	1	14	2.4
		(0.0)	(35.7)	(57.1)	(0.0)	(7.1)		
6	CEMILA C	8	6	11	1	3	29	5.0
		(27.6)	(20.7)	(37.9)	(3.4)	(10.3)		
7	C- MMACS	2	1	1	0	2	6	1.0
		(33.3)	(16.7)	(16.7)	(0.0)	(33.3)		
8	DARE	2	4	3	0	0	9	1.5
		(22.2)	(44.4)	(33.3)	(0.0)	(0.0)		
9	LRDE	0	0	2	0	0	2	0.3
		(0.0)	(0.0)	(100.0)	(0.0)	(0.0)		
10	GTRE	3	9	6	2	1	21	3.6
		(14.3)	(42.9)	(28.6)	(9.5)	(4.8)		
11	HAL	14	35	68	8	9	134	23.0
		(10.4)	(26.1)	(50.7)	(6.0)	(6.7)		
12	IAM	6	6	16	4	1	33	5.7
		(18.2)	(18.2)	(48.5)	(12.1)	(3.0)		
13	ISRO- ISTRAC	1	9	8	1	3	22	3.8
		(4.5)	(40.9)	(36.4)	(4.5)	(13.6)		
14	IISc	2	11	17	3	1	34	5.8
		(5.9)	(32.4)	(50.0)	(8.8)	(2.9)		
15	JNCASR	0	1	0	0	0	1	0.2
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
16	NAL	14	41	86	10	13	164	28.1
		(8.5)	(25.0)	(52.4)	(6.1)	(7.9)		
Total for all Organizations		67	155	285	38	38	583	100.0
Percent for all Organizations		(11.5)	(26.6)	(48.9)	(6.5)	(6.5)	(100.0)	
Chi-Square		73.211						
P Value		0.118						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience with e-Journal Features [Hyperlinks from One Article to a Cited Article in a Different Journal at No Charge (Toll Free Linking)]

SN	Organizations	(4) Hyperlinks from one article to a cited article in a different journal at no charge (toll free linking)					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	6 (10.3)	25 (43.1)	24 (41.4)	1 (1.7)	2 (3.4)	58	9.9
2	AFTC	5 (33.3)	3 (20.0)	5 (33.3)	2 (13.3)	0 (0.0)	15	2.6
3	ADE	0 (0.0)	6 (50.0)	6 (50.0)	0 (0.0)	0 (0.0)	12	2.1
4	ASTE	2 (6.9)	8 (27.6)	17 (58.6)	0 (0.0)	2 (6.9)	29	5.0
5	CABS	0 (0.0)	4 (28.6)	8 (57.1)	1 (7.1)	1 (7.1)	14	2.4
6	CEMILAC	5 (17.2)	10 (34.5)	11 (37.9)	2 (6.9)	1 (3.4)	29	5.0
7	C-MMACS	0 (0.0)	5 (83.3)	1 (16.7)	0 (0.0)	0 (0.0)	6	1.0
8	DARE	1 (11.1)	5 (55.6)	2 (22.2)	1 (11.1)	0 (0.0)	9	1.5
9	LRDE	0 (0.0)	2 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	2	0.3
10	GTRE	2 (9.5)	12 (57.1)	7 (33.3)	0 (0.0)	0 (0.0)	21	3.6
11	HAL	15 (11.2)	37 (27.6)	62 (46.3)	15 (11.2)	5 (3.7)	134	23.0
12	IAM	5 (15.2)	10 (30.3)	15 (45.5)	2 (6.1)	1 (3.0)	33	5.7
13	ISRO-ISTRAC	1 (4.5)	8 (36.4)	10 (45.5)	1 (4.5)	2 (9.1)	22	3.8
14	IISc	2 (5.9)	19 (55.9)	10 (29.4)	2 (5.9)	1 (2.9)	34	5.8
15	JNCASR	0 (0.0)	1 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	1	0.2
16	NAL	11 (6.7)	69 (42.1)	70 (42.7)	7 (4.3)	7 (4.3)	164	28.1
Total for all Organizations		55	224	248	34	22	583	100.0
Percent for all Organizations		(9.4)	(38.4)	(42.5)	(5.8)	(3.8)	(100.0)	
Chi-Square		67.726						
P Value		0.230						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience With e-Journal Features [Hyperlinks from an Article to a Scientific Database]

SN	Organizations	(5) Hyperlinks from an article to a scientific database					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	1	30	24	2	1	58	9.9
		(1.7)	(51.7)	(41.4)	(3.4)	(1.7)		
2	AFTC	6	3	4	2	0	15	2.6
		(40.0)	(20.0)	(26.7)	(13.3)	(0.0)		
3	ADE	1	4	7	0	0	12	2.1
		(8.3)	(33.3)	(58.3)	(0.0)	(0.0)		

4	ASTE	1 (3.4)	7 (24.1)	19 (65.5)	1 (3.4)	1 (3.4)	29	5.0
5	CABS	0 (0.0)	3 (21.4)	8 (57.1)	2 (14.3)	1 (7.1)	14	2.4
6	CEMILAC	6 (20.7)	6 (20.7)	12 (41.4)	2 (6.9)	3 (10.3)	29	5.0
7	C-MMACS	0 (0.0)	5 (83.3)	0 (0.0)	0 (0.0)	1 (16.7)	6	1.0
8	DARE	1 (11.1)	4 (44.4)	3 (33.3)	1 (11.1)	0 (0.0)	9	1.5
9	LRDE	0 (0.0)	2 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	2	0.3
10	GTRE	2 (9.5)	11 (52.4)	7 (33.3)	1 (4.8)	0 (0.0)	21	3.6
11	HAL	15 (11.2)	42 (31.3)	56 (41.8)	14 (10.4)	7 (5.2)	134	23.0
12	IAM	7 (21.2)	9 (27.3)	15 (45.5)	1 (3.0)	1 (3.0)	33	5.7
13	ISRO-ISTRAC	0 (0.0)	11 (50.0)	9 (40.9)	2 (9.1)	0 (0.0)	22	3.8
14	IISc	3 (8.8)	18 (52.)	10 (29.4)	2 (5.9)	1 (2.9)	34	5.8
15	JNCASR	0 (0.0)	1 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	1	0.2
16	NAL	12 (7.3)	61 (37.2)	75 (45.7)	10 (6.1)	6 (3.7)	164	28.1
Total for all Organizations		55	217	249	40	22	583	100.0
Percent for all Organizations		(9.4)	(37.2)	(42.7)	(6.9)	(3.8)	(100.0)	
Chi-Square		88.222						
P Value		0.010						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience With e-Journal Features [Hyperlinks from an Article to an Author's E-Mail Address]

Table 3: Users' Experience with e-Journal Features [Hyperlinks from an Article to an Author's E-Mail Address]								
SN	Organizations	(6) Hyperlinks from an article to an author's e-mail address					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	6	18	30	2	2	58	9.9
		(10.3)	(31.0)	(51.7)	(3.4)	(3.4)		
2	AFTC	3	5	4	3	0	15	2.6
		(20.0)	(33.3)	(26.7)	(20.0)	(0.0)		
3	ADE	1	4	7	0	0	12	2.1
		(8.3)	(33.3)	(58.3)	(0.0)	(0.0)		
4	ASTE	3	5	17	2	2	29	5.0
		(10.3)	(17.2)	(58.6)	(6.9)	(6.9)		
5	CABS	0	2	8	2	2	14	2.4
		(0.0)	(14.3)	(57.1)	(14.3)	(14.3)		
6	CEMILAC	10	7	11	0	1	29	5.0
		(34.5)	(24.1)	(37.9)	(0.0)	(3.4)		
7	C-MMACS	2	3	1	0	0	6	1.0
		(33.3)	(50.0)	(16.7)	(0.0)	(0.0)		
8	DARE	1	6	2	0	0	9	1.5
		(11.1)	(66.7)	(22.2)	(0.0)	(0.0)		
9	LRDE	0	2	0	0	0	2	0.3
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
10	GTRE	3	10	7	1	0	21	3.6

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SN	Organizations	(6) Hyperlinks from an article to an author's e-mail address					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
		(14.3)	(47.6)	(33.3)	(4.8)	(0.0)		
11	HAL	18	33	60	17	6	134	23.0
		(13.4)	(24.6)	(44.8)	(12.7)	(4.5)		
12	IAM	7	6	15	4	1	33	5.7
		(21.2)	(18.2)	(45.5)	(12.1)	(3.0)		
13	ISRO-ISTRA C	1	10	9	2	0	22	3.8
		(4.5)	(45.5)	(40.9)	(9.1)	(0.0)		
14	IISc	4	9	15	3	3	34	5.8
		(11.8)	(26.5)	(44.1)	(8.8)	(8.8)		
15	JNCAS R	0	1	0	0	0	1	0.2
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
16	NAL	15	52	76	13	8	164	28.1
		(9.1)	(31.7)	(46.3)	(7.9)	(4.9)		
Total for all Organizations		74	173	262	49	25	583	100.0
Percent for all Organizations		(12.7)	(29.7)	(44.9)	(8.4)	(4.3)	(100.0)	
Chi-Square		72.693						
P Value		0.126						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience With e-Journal Features [Hyperlinks from an Article to an Author's Website]

SN	Organizations	(7) Hyperlinks from an article to an author's website					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	6	12	32	7	1	58	9.9
		(10.3)	(20.7)	(55.2)	(12.1)	(1.7)		
2	AFTC	6	2	4	3	0	15	2.6
		(40.0)	(13.3)	(26.7)	(20.0)	(0.0)		
3	ADE	1	5	6	0	0	12	2.1
		(8.3)	(41.7)	(50.0)	(0.0)	(0.0)		
4	ASTE	5	3	16	1	4	29	5.0
		(17.2)	(10.3)	(55.2)	(3.4)	(13.8)		
5	CABS	0	2	8	0	4	14	2.4
		(0.0)	(14.3)	(57.1)	(0.0)	(28.6)		
6	CEMILAC	7	6	12	3	1	29	5.0
		(24.1)	(20.7)	(41.4)	(10.3)	(3.4)		
7	C-MMACS	1	4	1	0	0	6	1.0
		(16.7)	(66.7)	(16.7)	(0.0)	(0.0)		
8	DARE	1	7	1	0	0	9	1.5
		(11.1)	(77.8)	(11.1)	(0.0)	(0.0)		
9	LRDE	0	2	0	0	0	2	0.3
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
10	GTRE	6	5	7	3	0	21	3.6
		(28.6)	(23.8)	(33.3)	(14.3)	(0.0)		
11	HAL	24	25	58	16	11	134	23.0
		(17.9)	(18.7)	(43.3)	(11.9)	(8.2)		
12	IAM	6	6	18	2	1	33	5.7
		(18.2)	(18.2)	(54.5)	(6.1)	(3.0)		
13	ISRO-ISTRAC	3	8	5	4	2	22	3.8
		(13.6)	(36.4)	(22.7)	(18.2)	(9.1)		

14	IISc	3 (8.8)	11 (32.4)	13 (38.2)	4 (11.8)	3 (8.8)	34	5.8
15	JNCASR	0 (0.0)	1 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	1	0.2
16	NAL	23 (14.0)	55 (33.5)	64 (39.0)	14 (8.5)	8 (4.9)	164	28.1
Total for all Organizations		92	154	245	57	35	583	100.0
Percent for all Organizations		15.8	(26.4)	(42.0)	(9.8)	(6.0)	(100.0)	
Chi-Square		97.434						
P Value		0.002						

(Numbers in Brackets indicate Percentages)

Table3: Users' Experience With e-Journal Features [Pay-Per View]

SN	Organizations	(8) Pay-per-view					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	11 (19.0)	5 (8.6)	27 (46.6)	11 (19.0)	4 (6.9)	58	9.9
2	AFTC	7 (46.7)	1 (6.7)	5 (33.3)	2 (13.3)	0 (0.0)	15	2.6
3	ADE	1 (8.3)	3 (25.0)	6 (50.0)	2 (16.7)	0 (0.0)	12	2.1
	ASTE	2 (6.9)	3 (10.3)	17 (58.6)	4 (13.8)	3 (10.3)	29	5.0
5	CABS	3 (21.4)	1 (7.1)	6 (42.9)	1 (7.1)	3 (21.4)	14	2.4
	CEMILAC	4 (13.8)	5 (17.2)	10 (34.5)	3 (10.3)	7 (24.1)	29	5.0
7	C-MMACS	3 (50.0)	0 (0.0)	1 (16.7)	0 (0.0)	2 (33.3)	6	1.0
8	DARE	4 (44.4)	3 (33.3)	2 (22.2)	0 (0.0)	0 (0.0)	9	1.5
9	LRDE	1 (50.0)	0 (0.0)	1 (50.0)	0 (0.0)	0 (0.0)	2	0.3
10	GTRE	6 (28.6)	2 (9.5)	11 (52.4)	1 (4.8)	1 (4.8)	21	3.6
11	HAL	27 (20.1)	16 (11.9)	56 (41.8)	20 (14.9)	15 (11.2)	134	23.0
12	IAM	9 (27.3)	5 (15.2)	13 (39.4)	1 (3.0)	5 (15.2)	33	5.7
13	ISRO-ISTRAC	6 (27.3)	4 (18.2)	5 (22.7)	5 (22.7)	2 (9.1)	22	3.8
14	IISc	6 (17.6)	10 (29.4)	3 (8.8)	6 (17.6)	9 (26.5)	34	5.8
15	JNCASR	1 (100.0)	0 (0.0)	0 (0.0)	0 (0.0)	0 (0.0)	1	0.2
16	NAL	36 (22.0)	21 (12.8)	66 (40.2)	17 (10.4)	24 (14.6)	164	28.1
Total		127	79	229	73	75	583	100.0
Percent		(21.8)	(13.6)	(39.3)	(12.5)	(12.9)	(100.0)	
Chi-Square		81.812						
P Value		0.032						

(Numbers in Brackets indicate Percentages)

Table 3: Users' Experience With e-Journal Features [Electronic Manuscript Subscription]

SN	Organizations	(9) Electronic manuscript subscription					Organization Wise, Total No. of Respondents	% of Total Sample
		(I) I have used it and found it.....		(II) I have not used it, and I.....				
		0 – Not useful	1 – Useful	2 – Would like to try it	1 – No plan to use it	0 – Would not like to try it		
1	ADA	10	8	32	6	2	58	9.9
		(17.2)	(13.8)	(55.2)	(10.3)	(3.4)		
2	AFTC	5	2	6	2	0	15	2.6
		(33.3)	(13.3)	(40.0)	(13.3)	(0.0)		
3	ADE	0	4	5	2	1	12	2.1
		(0.0)	(33.3)	(41.7)	(16.7)	(8.3)		
4	ASTE	2	2	19	3	3	29	5.0
		(6.9)	(6.9)	(65.5)	(10.3)	(10.3)		
5	CABS	3	2	7	0	2	14	2.4
		(21.4)	(14.3)	(50.0)	(0.0)	(14.3)		
6	CEMILAC	6	7	11	2	3	29	5.0
		(20.7)	(24.1)	(37.9)	(6.9)	(10.3)		
7	C-MMACS	1	5	0	0	0	6	1.0
		(16.7)	(83.3)	(0.0)	(0.0)	(0.0)		
8	DARE	2	5	2	0	0	9	1.5
		(22.2)	(55.6)	(22.2)	(0.0)	(0.0)		
9	LRDE	0	1	1	0	0	2	0.3
		(0.0)	(50.0)	(50.0)	(0.0)	(0.0)		
10	GTRE	3	6	11	1	0	21	3.6
		(14.3)	(28.6)	(52.4)	(4.8)	(0.0)		
11	HAL	26	17	55	21	15	134	23.0
		(19.4)	(12.7)	(41.0)	(15.7)	(11.2)		
12	IAM	6	8	15	2	2	33	5.7
		(18.2)	(24.2)	(45.5)	(6.1)	(6.1)		
13	SRO-ISTRAC	4	7	5	5	1	22	3.8
		(18.2)	(31.8)	(22.7)	(22.7)	(4.5)		
14	IISc	3	12	9	6	4	34	5.8
		(8.8)	(35.3)	(26.5)	(17.6)	(11.8)		
15	JNCASR	0	1	0	0	0	1	0.2
		(0.0)	(100.0)	(0.0)	(0.0)	(0.0)		
16	NAL	25	58	58	11	12	164	28.1
		(15.2)	(35.4)	(35.4)	(6.7)	(7.3)		
Total		96	145	236	61	45	583	100.0
Percent		(16.5)	(24.9)	(40.5)	(10.5)	(7.7)		
Chi-Square		92.842						
P Value		0.004						

(Numbers in Brackets indicate Percentages)