Academic Social Networking in India and Dissemination of Indigenous Knowledge: A Study

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Abstract:

This paper explains the advantages of academic networks and the issue of access to journal articles via e-journal consortium's in India. Proposal for an educational social network on the National Knowledge Network (NKN) platform is put forth. Digitization of indigenous academic resources and its dissemination through networks for better access is also emphasized.

Introduction

The adoption of educational networks is common now days. The advancement of technologies has enabled the easy installation and customization of networking modules which suit to the need and demand of the user groups. Since the global scenario has changed rapidly adopting collaborative research programmes ,the need and necessity of educational research networks are all the more important. Networks play an important role in association and interaction among members in on-line groups. Strong and weak ties are formed between members based on their tastes and interests. Networks can play important role in enhancing quality of academic sector. The issue of access to information sources could be minimized by way of interaction among peers and members in academic networks.

Academic networks

There is limited research on how academics develop and manage their research networks for the purpose of publication. The knowledge and understanding as to how academics develop and manage networks is explained (Lowrie & McKnight, 2004).Strong, local, durable networks are crucial to enabling scholars' participation in transnational networks (Curry & Lillis, 2010).Various countries started implementing educational networks foreseeing its utility. The implementation of a pan-European network to support co-operative research amongst European researchers is such an initiative (Sabatino & De Arce, 1999). It is concluded that the benefits obtained to date for the academic and research community in Greece are significant by the implementation of academic networks (Pentzaropoulos & Siakavellas, 2001). The two major tasks of a network dedicated to a Research and Academic community are to deliver an efficient, fast, reliable connectivity. Between its own and the other similar networks, but also to provide the top technologies contributing in development, experimentation and deployment of new services and protocols (Allocchio, Battista, Carboni, & dellAgnello, 2003). Multi-author, multi-university studies are the fastest-growing type of authorship structure when intensity of research

collaboration among academic institutions are fostered (Ye, Song, & Li, 2012).It is found that collaboration at the level of the research network acts upon research quality via peer review and that this peer review effect is inherent throughout the research process (Rigby & Edler, 2005). Men and women researchers differ in their collaborator choice strategies. Men are more likely to be oriented to "instrumental," and "experience" strategies, while both men and women are motivated by "mentoring" strategies. Regression analyses show that for both men and women, having a coherent collaborator choice strategy predicts the number of collaborators (Bozeman & Gaughan, 2011).

Access Issues

Access to e-journals in India
        Research scholars find e-journals as a major resource of information they needed. The number of journals continues to grow year on year by about 3% and the number of articles grows approximately 3.5% per year. These figures have been relatively consistent for the last 200 years (Mabe, 2006). Library consortia play a pivotal role in the access of e-journals in Higher education sector in India. Details of two major library consortiums' and the gap in the access via those consortium's are shortly listed below.

1. INDEST-AICTE CONSORTIUM
The "Frequently asked Questions" section of the consortium lists some of the access issues as follows:
        1. Access to Springer Link is restricted to 234 titles in case of NITs and to 520 titles in all other cases from subject collections that includes Computer Science, Engineering, Chemistry, Physics and Mathematics.
        2. The access to the Elsevier's Science Direct also varies as the case of earlier one. The options of access are "Option One" of Science Direct includes 220 journals in subject collection "Engineering" and "Computer Science". The Option one provides access to Science Direct journals from 1995 onwards. The "Option Two" of Science Direct includes 160 journals in subject collection in Engineering. The Option two provides access to Science Direct journals from 2000 onwards. Besides above two options, Science Direct is also available in Physics Collection and Life Sciences Collection.
        3. E-resources viz. Asian CERC's Insight, EBSCO Business Source Premier, Euro monitor, JCCC, SciFinder Scholar and Web of Sciences are not offered to new members. The publishers of these resources have made special offer for the existing consortium members only. The same offer is not extended to other members as on now.
        4. Bibliographic Databases: Bibliographic databases contain references to articles published in journals, conference proceedings or chapters in books, etc. Most bibliographic databases contain abstracts of the articles along with links to their full-text and are subscribed for IITs and IISc only.(http://paniit.iitd.ac.in/indest/faq.html)

2.The UGC-INFONET Digital Library Consortium
The INFLIBNET website lists some of the access limitations as follows:
1. At present access to Science Direct is limited to 10 subject collections.
        The subjects like 1. Biochemistry, Genetics & Mol. Biology,2. Agriculture & Biological Science,3. Chemistry4. Computer Science,5. Economics,6. Immunology & Microbiology,7.

Mathematics,8. Physics & Astronomy, 9. Social Sciences, and 10. Psychology has collection of (1000+journals titles) to 60 universities covered under UGCINFONET Digital Library Consortium from January 2011. Still there are many subject collections via science Direct other than the above mentioned subjects. About 2500 journal titles have been provided by Science Direct.(http://www.inflibnet.ac.in/econ/external.php)

2.Access to Online Wiley, Web of science etc are provided in a phased manner.

3.SciFinder is a research discovery tool that allows college students and faculties to access a wide diversity of research from many scientific disciplines, including biomedical sciences, chemistry, engineering, materials science, agricultural science etc. If we take the list of access to the sciFinder scholar with respect to universities in Kerala, The Mahatma Gandhi University alone has the access to it.

Social network for Indian Higher Education Sector: "ERIS"-A proposal

We propose the proto-type conceptual model of Social network for Indian Higher Education Sector that could emerge as a powerful tool in enhancing the quality of higher education sector in India. We have named it as **ERIS-"Educational resource Information System"**. Those who are members of Indian academic community can take membership in the ERIS social network. Many studies have proved that Collaboration and collective intelligence eventually increased the output quality. The dynamics of social networks are in such a way that each and every member of the academic intellectual ties inside the network is mutually benefitted.

The features of the proposed network may be:
- Flexible, interoperable resource –discovery system based on open source software.
- Easy-to-use by the one –stop shop
- Having essential social networking features
- Having secure encrypted communication system
- Moderated by technological gate keepers at each institutions
- Distributed system approach
- Model of current social networking sites like orkut, or facebook can be adopted. Members can create their profiles; add photos, share ideas and thoughts, papers and documents etc.
- The members are given username and passwords
- Moderated at institutional level so that only authentic persons can create account.
- Provision of secure e-mail communication should be entrusted other than popular email services like gmail, yahoomail, hotmail etc.
- The server may be Linux based one.

National Knowledge Network (NKN)

A Network called as National Knowledge Network (NKN) has set up by Government of India.The primary objective of the network is to enhance the quality of higher education. Promotion of e-learning across various higher education bodies is the main objective of NKN. Educational social networks could be configured inside the NKN.

Features NKN
- High Capacity, Highly Scalable Backbone
- Provide Quality of Service (QoS) and Security
- Wide Geographical Coverage
- Common Standard Platform
- High Bandwidth
- Highly Reliable & Available by Design
- Test beds (for various implementations)
- Dedicated and Owned.

Digitization of Indigenous Resources

A vast collection of research data are left unaccessed by users in various educational institutions and libraries across India. Such resources are of immense use for further research. For example: The research theses submitted to various research institutions are kept in print format and access to such items are very limited in number. The valuable data available in manuscripts are another item .If such resources are made into digital form and are made available in a secure file sharing platform, the output of indigenous research will get better exposure and new insights could be developed.

Conclusion

Implementation and adoption of academic networks will help to foster the interaction among various academic professionals in an easy way. In countries like India, such networks will surely help to enhance the quality of research output. The National Knowledge Network can play a vital role in this regard. Indigenous Knowledge Dissemination by way of digitization of locally significant academic information can provide a lot of pace to ongoing research iniatives particularly useful for Indian society.

References

Allocchio, C., Battista, C., Carboni, M., & dellAgnello, L. (2003). The Italian academic network GARR: evolution in the Gigabit era. *Computer Communications , 26* (5), 477-480.

Bozeman, B., & Gaughan, M. (2011). How do men and women differ in research collaborations? An analysis of the collaborative motives and strategies of academic researchers. *Research Policy , 40* (10), 1393-1402.

Curry, M. J., & Lillis, T. M. (2010). Academic research networks: Accessing resources for English-medium publishing. *English for Specific Purposes , 29* (4), 281-295.

Hwang, S.-Y., Wei, C.-P., & Liao, Y.-F. (2010). Coauthorship networks and academic literature recommendation. *Electronic Commerce Research and Applications , 9* (4), 323-334.

Lowrie, A., & McKnight, P. J. (2004). Academic Research Networks:: A Key to Enhancing Scholarly Standing. *European Management Journal , 22* (4), 345-360.

Mabe, M. (2006). Electronic journals publishing. In *e-resources management handbook.* UK serials group,www.uksg.metapress.com.

Pentzaropoulos, G. C., & Siakavellas, M. D. (2001). The implementation of advanced telecommunications and services in the Greek academic and research environment: main issues and results. *Telecommunications Policy , 25* (3), 185-196.

Rigby, J., & Edler, J. (2005). Peering inside research networks: Some observations on the effect of the intensity of collaboration on the variability of research quality. *Research Policy , 34* (6), 784-794.

Sabatino, R., & De Arce, J. M. (1999). Implementation of the pan-European academic research network: TEN-155. *Computer Networks , 31* (21), 2253-2261.

Ye, Q., Song, H., & Li, T. (2012). Cross-institutional collaboration networks in tourism and hospitality research. *Tourism Management Perspectives , 2-3*, 55-64.