Internet in the University Environment

P. SOMA RAJU
Department of Library and Information Science, Andhra University,
Visakhapatnam - 530 003.

Abstract

INTERNET is a network of several millions of computers all over the world and aims to deliver data / information from one place to another through communication networks. The services of the INTERNET can be availed through shell system or SLIP system depending on the communication facilities. The author mentions several navigational tools with which the user can locate, browse, retrieve, transfer, and download information from several databases in the Internet. The universities may take the advantges of the various web-based information sources available in the Internet for their academic community. The sources are E-mail, E-journals, content pages of journals, pre-print services, technical reports, library catalogues and campus wide Information services (CWIS). Universities in India can provide information related to their activities, programmes etc. by creating their own home pages in the INTERNET.

Introduction

Internet is a bunch of computers connected together and interact with each other. It is sort of connecting small road at house to a high way road. Thus it is a network of networks in the world. Several millions of computer all over the world are connected to this network with a facility to interchange the data/information from one another. In this system, if a computer has an access to the Internet or to a computer which is on the network, it can have the access to all of the computers that are in the Internet.

Further it is a Peer-to-Peer Network. It means any computer in the network from a tiny lap-top to a supercomputer, in principle are equal and can contact any other in the network. However, the Internet aims to deliver data/ information from one place to another through communication networks.

Navigation Tools

With required infrastructure Internet services can be obtained through shell system and SLIP system, depeding on the communication facilities

available at a given place. In the shell system, users PC is not really on the Internet, but it is connected to a service provider's computer. Whereas, in SLIP system, the user' PC became the part of the Internet and network application can run on his computer using Telnet and FTP. One can lend such a facility to others also if interested.

There are number of navigational tools with which the user can locate, browse retrieve, transfer, download information stored in various host databases in the Internet.

Gopher is used to have an access to information available on the Internet. WWW is the most popular service to share the information among the researchers. Archie is used for file transfer from one computer to another on the Internet. Varonica is a net-wide index to computer Archie. Wide Area Information System (WAIS) allows the searchers for multiple databases located in a remote site. It also gives the information through search terms. NSnet connects over 6000 remote networks, comprising thousands of computers which are considered as global information sources.

A user can run Internet applications using TCP/IP which controls information traffic and connects remote computers. Now Internet is drastically changing the generation, dissemination, transfer, and use of information from one place to another.

University Environment

The main objectives of a modern university are imparting advanced knowledge and skills to the postgraduate students in the field of their specialisation and providing the required infrastructure facilities to carry out research activity in different subject fields to generate new knowledge. It is also be the aim of higher education to inculcate the quest for acquiring new knowledge and skills, among the scholars and students. Thus it creates the sense of purposiveness, professional dedication, faith and confidence among them, which are needed for their successful future life. There are variety of Web-based information sources which the academic community can productively utilise through Internet.

Web-based Information Sources

The following are some of the major information sources available on the Web-site which are of immense value and use for the academic community in Universities :

E-Mail

E-Mail Service is the most popular among the Internet services used by the majority of the hosts in the world. Most of the Web-access sources can be obtained through E-Mail of Internet. It has significantly improved the personal communication among users across the globe. It is also suitable for collaborative research activity among the faculty of Universities.

E- Journals

Electronic journals are popularly known as e-journals. Almost all publishers are now-a-days producing e-journals and providing the web-access to their journals. e-journals are of two types.

a) Electronic version of print journal with no print counterpart; and

b) e-journals have only textual contents. However, both of them are in the Web-site and user can make use of such e-journals and beneficial in more than one way as follows :

1. Browsing (availability) of large number of journals ;

2. Quick access to e-journals;

3. Facility of search through key words;

4. Facility of down loading the desired articles;

5. Qucik access to references given in the articles;

6. Production of e-journal is quik, easy and economical;

7. Many of the problems associated with print journals - acquisition, delay in supply, missing numbers, binding, and preservation of journals as back numbers for a long time, - are not present in the case of e-journals;

8. Copies of articles can be obtained easily and quicklly, if needed for the serious reading of users; and

9. Papers accepted for publication, can be published within a short time without any delay.

Content pages of journals

It is like a 'current content' service which provide advance information about the articles coming in the ensuing journals. It is of immence value and useful for researchers and scientists to know what is coming on the wave front of knowledge in the field of their specialisation. Such content page service is available in the Internet.

Several publishers, document delivery agencies are providing such contents page information on the Web-Site. For instance, Elsevier is providing 'Content Direct' service for their 800 periodicals on the Web-Site. Similarly, CARL agency is providing the Web-access to the content pages of their 16,000 journals, which can be used through Internet. Institute for Scientific Information (ISI) USA is planning to initiate such service shortly.

Preprints service

Preprints usually enhance the awareness of the scholar community about the recent developments. Some of the institutions like American Mathematical Society are providing such web-access preprint services which can be used by the academic communiity in universities.

Technical reports

Technicial reports provide the information about the results of R & D. and on-going projects carried out in research laboratories and university departments. Such type of data/information is very useful to the faculty who are involved in consultancy research projects, SAP and other major projects. There is a possibility of getting an access to such reports in the Internet. Networked Computer Science and Technical Reports Library (NCSTRL) is providing Web-access to technical reports in computer science.

Library catalogue

The library catalogue of well-known libraries such as LC is available as Online Public Access Catalogue in the Web-site free of cost through their request login 'LOCIS'. Similarly University of California is providing such a service through their 'Melvyl' in the internet.

Campus Wide Information Service (CWIS)

In this system the universities provide a very useful information on their activities, course, etc., in their home-pages. Such information is of immense value for the students, scholars and administration also. There is every possiblility for universities to provide such a useful information in the Web site, through their Home pages.

Conclusion

Therefore, Internet is serving like Information Super Highway, connecting thousands of networks all over the World. Lot of data/

information can be obtained through Internet. The number of Internet users are increasing in a geometrical progression. India is not an exception to this phenomena. The users of Internet services in India are also increasing significantly. And there is every possibility to create home pages for universities following the Internet programme in the Web-site for disseminating the information. It is particularly so in the case of universities in India. They can provide their information in the Web-site for the sake of larger academic community within and outside the country.

References

1. Rajashekar, T.B. Science and Technology information resources on the Internet. *Information Today & Tomorrow*. 1997.
2. Levine, John R. *Advanced Internet for Dummies*. IDG Books; 1995.