**Paper: AA**

# SOURCES OF INFORMATION WITH EMPHASIS ON ELECTRONIC RESOURCES

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*Information, an invaluable resource is being disseminated, transformed and communicated in a variety of environments. They are now mostly available in e-media. Librarians connot afford to ignore this development and they must prepare themselves to handle e-sources. Move towards electronic handling of information will be cost-effective and users will be in a position to get pin-pointed information with the help of powerful search engines. Some of the important e-sources and problems associated with such sources are discussed in this paper*

## 1. INFORMATION SOCIETY

Information is a most predominant element in the present society and much of the labour force is working in information related sectors, in this society. Sometimes, this society is also referred to as information conscious society, particularly in less developed countries. In most advanced countries, this society is referred to as information society. In information conscious society (1):

i) people realize the importance of access to information
ii) people do not necessarily have the information they need
iii) information structure to access information hardly organized and exists.

Information, a predominant element, pervades and dominates in the day-to-day activities, in the information society. In such a society, quick delivery of needed information, most economically is the ordinary state of affairs. An information conscious society is however, a necessary prelude to an information society. Important features of an information society are (1):

i) Information, a self-regenerative resource, is a key economic element. It is a socio-economic product. Its organized generation and its use are helpful in promoting socio-economic activities. Planners, policy-makers, R & D personnel, academicians, etc. realize that it is an important resource for their day-to-day

activities and further they do realize  that decisions are based on reliable, valid and timely information.  It is

a)  an instrument of social change;
b)  a non-depleting  resource;
c)  a commodity subject to economic analysis.

ii)      Intensive use of information technologies

The amount of information in any discipline doubles once in every seven to ten years. In this sense, we can conjecture that 'information grows at an exponential rate'.  Further, it is very difficult to collect, process, store and retrieve information in interdisciplinary areas. It is in these two contexts, role of information technologies is considerable and their intensive use is a necessity.   The tremendous  potentialities  of  information  technologies  resulting  from  the integration of communication technologies and computer technologies and their impact on business & industry, on government, education & health services etc. are impressive and pervasive in all information handling activities.

iii)     Increased awareness of the importance of life-long learning;
iv)     Boundaries between work, leisure and education are getting blurred;
v)      Process of decision-making aims at the future requirements; as a result, environment protection is given equal importance.
vi)     Considerable rise in the number of white collar workers

In information society, countries are further grouped as information rich and information poor.  The information rich nations tend also to be materially-rich with high Gross National Product; they have the potential advantage for becoming richer.  The information poor nations tend also to be poor in most other material aspects with low Gross National Product.  In other words, we may hypothesize the fact that stronger the economy, greater is the capability t access information (or more the consumption of information), weaker the economy, lesser is the capability to access information (or less the consumption of information).

Information,  an  invaluable  resource,  is  being  disseminated,  transformed  and communicated  in  a  variety  of  environments. Generally,  information  is  being  transformed / communicated  directly  among  members  of  the  invisible  colleges,  peers,  and  scientists  in laboratories/fields, etc.  Person to person dialogues, counseling, demonstrations, exhibitions, seminars and conferences are increasingly being used for information exchange and technology transfer.  The three different communication models are one to one ( -- person to person),  one to many (-- person to a group), and many to many (-- group to another).  Further, each medium and method of communication have  their advantages.  Also, the societal characteristics, such as culturel, language, political ideology, legal sanctions, levels of development, etc. have their impact on information flow.

The  basic  steps  in  the  process  involved  in  information  handling  are  information generation,  collection,  storage,  processing  and  dissemination,  utilization  and  feedback.

Development of a system to handle information is the most complex one involving considerable investment. A social activity of such dimensions has to be planned and guided to give maximal benefit to all sections of the society.

In this paper, an attempt has been made to discuss those aspects of merits, demerits, and management of electronic sources of information.

## 2. INFORMATION SOURCES: Origin

The beginning of information sources may be traced to man's earliest attempts to record thoughts, concepts, ideas, and events. Sir Karl Popper in his book "Objective Knowledge", recognized a world of objective knowledge which is the totality of all human thought embodied in human artefacts, as in documents and also in music, the arts, the technologies. He called this a third world. According to Popper's ontological scheme (2).

- world 1 is the physical world -- earth
- world 2 is the world of subjective knowledge or "mental states"
- world 3 is the world of objective knowledge
  - -- the products of the human mind as recorded in languages, the arts, the sciences, the technologies; …

Brookes, in his work on 'Foundations of Information Science', discusses Popper's work in detail, particularly in the context of Information Science. In his article (1), Brookes points out that information scientists are directly concerned with the world 3, as explained by Popper. They are infact the key sources of information for generations to come.

It is believed that the "visual records" had originated when man first sketched the outline of animal that he wished to hunt. Such visual records helped him to refresh his memory of his original concept, when needed. This rudimentary forms of visual records were the basis of further developing the concept of information sources. Since then man has recorded several events in different forms at different period of time. Each of the forms later became a source by itself. For instance, Babylonians used to record the occurrences of floods in the Nile (with details such as time, place, etc.). These records later became almanac-type records.

Almanacs, maps, early similar other reference sources, etc. recorded a great deal of information. Eventually, man developed a single source that would give comprehensive information; these are nothing but a synthesis of information, which were available in different sources. Thus, principles underlying encyclopedias were born. Today, encyclopaedias are important sources of information.

## 3. INFORMATION SOURCES: Different Types

Different sources of information may broadly be grouped as documentary and non-documentary sources. Invention of printing machine by Johannes Gutenberg in 1452 has contributed immensely to "printing industry". Since then, information has been recorded in

printed form -- in documents.  Documents enable us to transfer information from one generation to another; also from  one place to another.  His invention has significantly changed the social, economic, political, educational, scientific, technological, and cultural activities of human beings.  Further, advances in printing technology have led to information explosion.

Printed documents are published in a variety of forms; documents are further grouped into primary, secondary and tertiary documents.  Primary documents  contain new or original idea or new interpretations of known facts.  Secondary documents are those derived from primary sources.  Tertiary documents are those that are based on the primary and secondary sources of information.  The information presented in the tertiary sources is highly condensed and the aim is to provide relevant information in minimum number of expressions.  They are primarly the aids to search primary and secondary sources.  Table 1 below gives the list of primary, secondary and tertiary sources of information (4).

**Table-1 :  Different Types of Documents**

| Primary Documents | Secondary Documents | Tertiary Documents |
|---|---|---|
| • Periodicals<br>• Research/Technical reports<br><br>• Conference Proceedings<br><br>• Patents<br><br>• Standards<br><br>• Theses & dissertations<br>• Research reports<br>• Trade Literature<br>• Laboratory Notebooks<br>• Official Publications<br>• Correspondence, Personal files etc. | • Bibliographies<br>• Indexing  & Abstracting Services<br><br>• Reviews;   State-of-the-art reports<br>• Monographs<br>• Reference Books<br>  -- Dictionaries<br>  -- Encyclopaedias<br>  -- Handbooks<br>  -- Tables<br>  -- Formulae | • Yearbooks<br>• Directories<br>• Bibliography  of bibliographies<br>• List of research in progress<br>• Guides   to   libraries, organizations literature, etc. |

## *Periodicals*

Periodicals include journals, bulletins, transactions, proceedings or similar works which appear at regular period in numbered sequence. However, newspapers, annuals, magazines are generally excluded under this category.  The most of the primary sources of literature appears in the form of periodicals.  The  articles in periodicals report the results of recent research works and they are the main means of research communication for the exchange of scientific information.   According to Webster's dictionary, a journal, often known as  periodical, is a publication, dealing with  matters of current interest; often used as official or semi official publications of special groups.  In AACR2, it is defined as a publication in any medium issued in successive parts bearing numerical or chronological designation and intended to be continued indefinitely.  Examples of periodicals are:

i)      Nature (weekly), 1899+, London, Macmillan Press
ii)     Physics of  fluids (monthly), 1958+, Newyork, American Institute of Physics

It has been observed that the growth of periodicals (including the serials) is exponential in nature; i.e. once in seven to ten years, the number of periodicals doubles.  There were about 69,000 serials in 1986; it has been increased to 15,6000 in 1998.  The actual figures are:

**Numbers of serials**

| Year | Number | Year | Number |
|------|--------|------|--------|
| 1986 | 69,000 | 1994 | 140,000 |
| 1987 | 68,000 | 1995 | 165,000 |
| 1988 | 70,000 | 1996 | 165,000  (5,517 online or in addition to hard copy; |
| 1989 | 108,000 | | 1963 on  CDROM) |
| 1990 | 112,000 | 1997 | 165,000  (6,661 online or in addition to hard copy; |
| 1991 | 116,000 | | 2,240 on    CDROM) |
| 1992 | 118,000 | 1998 | 156,000  (8,762 online or in addition to  hard |
| 1993 | 126,000 | | copy;   2903 titles on  CRROM; 9,58   title were |
| | | | ceased  or  suspended) |

*Source:*  Ulrich's Directory of Periodicals, New York, Bowker, Various years)
          Projection for 2000 is 218,000

## *Technical Reports*

A report is an account or a text describing in detail an event situation or the like, usually as a result of observation, inquiry, experiment, etc.  Technical reports generally give the results of R & D experiments/projects; they are primitive in the sense that they are published as and when research activities progress often, these are considered as primary sources of information, especially in the area of aeronautics, and applied atomic energy.   These are generally unpublished or semi-published literature.  Examples of reports are

    i)         Scientific & Technical Reports, National Aeronautics and Space Administration (NASA) (USA)

    ii)       National Technical Information Centre Reports (NTIS)

### *Patents*

It is an official document conferring an exclusive right, granted by a government to an inventor to manufacture, use or seek an invention for a certain numbers of years; the list of such patents usually appear in the Government gazette; also one can refer for its details in World Patent Index (weekly), 1975+, London, Derwent Publications.

### *Standards*

They are the publications issued by certain authorities such as International Standards Organization, Bureau of Indian Standards, British Standards Institutions, etc. It is something considered by an authority or by general consent as a basis of comparison. Standards ensure reliability; for manufacturing units and for design engineers, standards are an important source of information.

### *Pamphlets*

It is a short treatise or essay, generally a controversial tract on some subject of contemporary interest. It is infact a complete publication, of fewer "pages" stitched or stapled together and usually has a paper cover.

## 4.     ELECTRONIC SOURCES OF INFORMATION

Electronic publishing has become a major topic in the world literature in recent years, particularly because of the developments in information technologies. Electronic publications -- all those publications which are in electronic or digital media -- are usually known as electronic sources of information. In early 70s, most of the electronic sources were available on magnetic tapes and some were online. These were of course, mostly secondary sources (-- bibliographical databases). Since then many developments have taken place. Today, electronic sources are available on CD-ROMs or on the Net. In the present day context, sources which are available on the Net are often referred to as online sources. These sources consist of reference documents (-- dictionaries, encyclopedia, directories, handbook, atlas, etc), data, research publications, journals etc. These developments have a great impact on libraries, changing user expectations; They force librarians to re-think:

    i)       the collection they have to develop

    ii)     the services that they provide

    iii)    the electronic sources that they have to acquire/subscribe

These changes lead us to alter the way we work at present.

The electronic media offer unique advantage for information transfer; e.g. flexibility, rapid delivery, low cost, compact storage and interactivity. It may even displace print as a major media of dissemination in foreseeable future. In recent years, two other 'media' have emerged in this context -- multi-media and hypertext media.

The multi-media refers to the integration of data, text, image and sound within a single digital information environment. It is effectively being utilized in applications in education and training, business, health sciences, publishing, entertainme nt, etc.

The hypermedia, popularly known as hypertext, is generally used to refer to information containing higher proportion of graphics and images and is almost always includes video sequence or any form of animated information. In hypermedia, information is organised in non-sequential manner -- generally consists of nodes/chunks of information, may alter the way in which we read, write and organise information. Hypertext is an access mechanism. Links are used in hypertext to direct the readers to additional or related information (like the footnotes, glossaries, in printed media.)

The CD-ROMs, one type of electronic sources (media), are increasingly becoming popular; its growth is increasing at an exponential rate. Further many books, particularly in the field of computer science, contain one or two CD-ROMs. Its organisation is troublesome. If we remove the CD-ROMs from books and if we organise them separately on racks, librarians may face a problem while charging a book -- problem of selecting the right CD-ROM of the book which is being charged. On the other hand, if we keep the CD-ROM in the book itself, chances of that it is missing or damaging are very high. It is an issue, the librarians have to tackle in the near future. Apart from this, there are number of documents on CDs; for instance, encyclopaedia, databases, journals, etc are now being published on CDs.

Some argue that the future of CD-ROM technology for information provision is however uncertain. It may continue to have a future as a medium for games, data and software. The number of CD-ROMs were increased from 2900 in 1992 to 13, 000 in 1998. The actual figures are:

### Numbers of CD-ROMs (all types)

| Year | Number |
|------|--------|
| 1992 | 2,900 |
| 1993 | 3,500 |
| 1994 | 5,000 |
| 1995 | 8,000 |
| 1996 | 9,000 |
| 1997 | 11,500 |
| 1998 | 13,000 |

*Source:* CD-ROMs in print (Westpost, CT: Meckle, various years)

In addition to the CD-ROMs, there are  number of other electronic sources; they are on the Net; they may be online databases, library catalogues, websites -- personal bio-data, profiles of the institutions, research publications etc., listservers, E-journals, reference documents and other electronic publications.  Some of these are discussed briefly herein.

**4.1     E-journals**

A journal contains scholarly articles.  It disseminates  current information on research and development in a particular subject field.  It is being published periodically (-- with continuity). Until recently, journals were available only in printed media; for sometime, they were also popular in the form of microfiche /microfilm.  Now they are even available in electronic media. They are being  processed and published (-- receiving, refereeing, editorial work, etc) through electronic media.  Such journals in electronic media are often known as virtual sources, paperless journals, online journals, and most popularly known as e-journals.  An e-journal, like any other serial is produced, published and distributed all over globe via electronic network.  E-journals for all practical purposes may thus be defined as those journals which are available in electronic media; some may be available on CD-ROM; a few may be available only on online; some may be available both in electronic media and in print.  McMillan defines E-journals as "any serials, produced, published, and distributed nationally and internationally via electronic networks (5).

E-journals on CD-ROM is like having  printed journals in the library, it of course requires hardware and software to search and read.  It provides full text of individual or collected journals of various   subjects.  When a library subscribes an E-journals in CD-ROM some, they can preserve it for a long time like bound volumes, and we can use them whenever we want.

On the other hand, online journals or the E-journals on the Net can be accessed at any time, from anywhere.  Online journals can be searched using a  number of online hosts like Dialog, etc.  E-journals on the Net can be searched through the popular search engines; some times, we have to know the URL.

Vannevar Bush was perhaps the first one to describe the E-journal in 1967, as a part of Memex proposal.  Unesco in the same year initiated a project "to test networking computers as a means of improving scientific communications".  Its report was published in 1980 in electronic media.  It is considered as one of the earliest E-publications.  In 1976, New Jersey Institute of Technology published first prototype E-journal named CHIMO.  It was a weekly, read-only newsletter.  Since 1990, many e-journals appeared in the market.  The "Online Journal of Current Clinical Trial" was the first peer-reviewed scientific e-journal with graphics and completely searchable fulltext.

The numbers of electronic journals have increased steadily throughout the 1990s and this trend is predicted to continue.

**Growth of E-journals and Newsletter**

|  | July '91 | March '92 | April '93 | May '94 | May '95 | May '96 | Dec. '97 |
|---|---|---|---|---|---|---|---|
| Electronic Journal | 27 | 36 | 45 | 181 | 306 | 1093 | 2459 |
| Electronic Newsletters | 83 | 97 | 195 | 262 | 369 | 596 | 955 |
| Total | 110 | 113 | 240 | 443 | 675 | 1689 | 3414 |

By their very nature, electronic sources are volatile and they exist in a dynamic environment in which librarians are compelled to reassess assumptions and roles periodically. The broad realm of information technology mutates at an incredible pace with formats, programming languages, new companies, and new ideas emerging faster than the standards that shape to control and normalise the retrieval or display of the content for today's product. In otherwords, "by the time we procure, study and implement information technology, it becomes obsolete"!

Under the circumstances, the role of E-journals is crucial and it is very difficult to handle E-journals. All said and done, E-journals, have several merits and it even has certain disadvantages.

*4.1.1   Merits and Demerits of E-Journals:*

Chan (3) discusses the merits & demerits of E-journals. Some of them are:

i)      Subscription Cost

The subscription cost of the printed journals is almost increasing every year; if one opts for E-journals (if available, for a given title), there may be a potential saving to the order of at least 20 to 30%, over a period of time: The cost of the E-journals are likely to be cheaper since there are no distribution and production cost.

ii)     Multimedia and Hypermedia Capabilities

➢       Electronic journals can take advantage of the multimedia capabilities -- integrating text, video and sound.

➢       Hypermedia enable linkages among sections within an article as well as among articles in journals and other electronic resources.

iii)    Accessibility

➢       A large collection of journals can be shared in real time

iv)      Selective Dissemination of Information Service

> ➢     Users may be alerted as  and when a new articles of their interest is accepted and published in electronic media

v)      Speed of distribution and production

> ➢     Printing & mailing processes may totally be eliminated

> ➢     During the review process, and all other communications, articles may be transferred in digital media -- since much of the text is created in digital form by the users/authors themselves, publishers require  little time/cost to review, editing and perhaps the final electronic page.

> ➢     Can be distributed electronically

> ➢     Increases portability -- a simple CD-ROM can hold thousands of articles with complete indexing

> ➢     Establishes  network  communication  among  authors,  editors  and references.

There are certain disadvantages;  such as:

i)      Economic Barriers
   - It requires high-tech; it costs  --  purchasing, maintenance, upgrading of both h/w and s/w

ii)     Socio-cultural barriers
   - It may be difficult for users to adjust and develop habits to handle e-journals

iii)    Technological barriers

   - Lack of proper infrastructure to handle e-journals

## 4.1.2   Issues and Challenges

Many of the e-journals, publish articles without the refereeing process.  Thus authors may not get the recognition, particularly by the selection/promotion committees in academic institutions.  An objective of the e-journals is to provide quick access to articles, rather than ownership.  Due to the inadequacy of the current legislation and the cost of duplication, Copyright Act hardly protect the rights of the publishers as well as the rights of the authors. Further, the  volatility of e-journals makes their preservation a major concern.

However, in the near future e-journals will become very popular particularly because of the possibilities of having linkages among users, documents, publications, websites and others electronic resources. More and more structured text are to appear in e-journals, particularly because of the developments in standards Generalized Markup Languages (SGML), Office Document Architecture (ODA) and Portable Document Format (PDF)

*4.1.3    Examples of E-journals and their cost are given below:*

SPIE (the International Society for Optical Engineering) produces world-class scholarly journals in the field of optics. The important E-journals in this area are:

1.  Optical Engineering
2.  Journal of Biomedical Optics
3.  Journal of Electronic Imaging

SPIE Journals are available in print, online and CR-ROM formats. Tables of contents and abstracts for these three journals are available in two ways:

1.  In ASCII format via the home page for each journals are available in two ways:

    Optical Engineering (1992-present)
    Journal of Electronic Imaging (1992-present)
    Journal of Biomedical Optics (1996-present)

2.  In html format via AIP's Online Journals Publishing Services (1998-presents)

SPIE Journals Online are accessible in PDF format via AIP's Online Journals Publishing Services. Full Text access to SPIE Journals is available by subscription or institutional site license. SPIE Journals on CD-ROM are available for 1996-97 and 98. Each CD-ROM contains PDF pages of the complete years for all three journals and is Macintosh, PC Windows (486 or higher), and Unix compatible.

Choice of SPIE Journals with Membership: SPIE Members are entitled to one SPIE Journal with membership, in either print or online format.

### Journal subscription  rate for the year 2000

| | Optical Engineering (monthly) | Electronic Imaging (quarterly) | Biomedical Optics (quarterly) | All three journals |
|---|---|---|---|---|
| **a)  SPIE Members**[1] | | | | |
| Print Journals | $50 | $50 | $50 | $100 |
| Online Journals | $25 | $25 | $25 | $125[2] |
| Print + Online Journals | $75 | $75 | $75 | $225[2] |
| **b)  Institutional  &  Non-members** | | | | |
| Print + Online[3] | | | | |
| North America | $475 | $215 | $215 | $860[4] |
| Outside North America | $535 | $235 | $235 | $960 |

### SPIE journals on CD-ROM: its cost (Includes all the SPIE journals)

| | 1998 | 1999 | 2000 | 1998-2000 (3 CD-ROM) |
|---|---|---|---|---|
| **C1  SPIE MEMBERS** | $65 | $65 | $65 | $140 |
| **C2 Individual  Non-members - non-North America** | $125 | $125 | $125 | $295 |

Note:  For details, are may contact:   SPIE,   Subscription Services, P.O. Box 10, Bellighan, WA 98227-0010 USA, Ph. 360-676-3290,    Fax:360-647-1445          e-mail: subscriphons@spie.org

*4.1.4    Secondary sources available in Internet*

i)        http://www.oed.com/

The Oxford English Dictionary went to print in 1928, the electronic version was created in 1992. It is also available in CD-ROM formats. Published by Oxford University Press. email: worldinfo@oed.com

Oxford English Dictionary (Second Edition) on CD-ROM Version 2.0 (0-19-268788-3 ) Oxford English Dictionary (online edition) will be available from March 2000

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[1] one print or e -journal included with membership
[2] including journals CD-ROM
3  requires single subscriber agreement
[4]  includes journals in CD-ROM

ISSN 1467-3894
Available by annual subscription.
Prices to be confirmed.

ii)       http://www.graylab.ac.uk/omd/index.html

Online Medical Dictionary

OMD is a searchable dictionary created by Dr Graham Dark and contains terms relating to biochemistry, cell biology, chemistry, medicine, molecular biology, physics, plant biology, radiobiology, science and technology.

The dictionary was first published in  1997 and has grown, to contain over 46,000 definitions totalling 17.5 megabytes.  This edition is distributed by CancerWEB under licence from Academic Medical Publishing

iii).      http://cns-web.bu.edu/pub/laliden/WWW/Visionary/Visionary.html

Visionary

A dictionary for terminology used in the study of human and animal vision.
Written and maintained by:
Lars Liden o (laliden@cns.bu.edu)
Dept. of Cognitive and Neural Systems
Boston University

iv.      Encarta online

Encarta Online Deluxe - Price  $49.95.

Encarta Reference Suite 2000 —  (CD-ROM and DVD-ROM) Rebate Offer $35.00 U.S./$50 CDN  rebate valid with qualifying proofs of purchase in the 50 United States, District of Columbia and Canada only.

Published by Microsoft Corporation

http://www.microsoft.com/encarta/atlas/atlas.htm

Encarta Interactive World Atlas 2000   by MICROSOFT

OUR PRICE: $44.99
OUR PRICE AFTER REBATE: $24.99
started in 1999

v.        http://www.encyclopedia.com/

Brought out by Infonautics corporation 1999 - free
For more information about Encyclopedia.com
send email to info@encyclopedia.com

Encyclopedia of World Cultures

Now on CD-ROM as well as in 10 print volumes
Available  through Macmillan.

Bibliography of Native North Americans

BNNA is published by SilverPlatter Information, Inc. It is available as a  CD-ROM, through
SilverPlatter's client-server system, and through the  internet.

*4.1.5   Examples of  primary sources available in CD ROM*

i)        http://www.allheart.com/allheart/cmmj3.html

The New England Journal of Medicine

Is available on CD-ROM
It gives access full-text articles with color images, graphs and tables
Works for both WIN & MAC systems

ii)        CMC-NEJM1993-1998Compare At: $295.00Our Everyday Low Price: $279.94

The New England Journal of Medicine: Recent 3 Years, 1996-1998
CMC-NEJM1996-1998Compare At: $195.00Our Everyday Low Price: $184.94

The New England Journal of Medicine: Archived Edition, 1993-1995
CMC-NEJM1993-1995Compare At: $125.00Our Everyday Low Price: $119.94

Email Address: customerservice@allheart.com

E-Mail: hrafmem@hrafmem.mail.yale.edu

ii)        SPIE Web — Scholarly Journals

 SPIE produces world-class scholarly journals in the field of optics.  For details refer  above.

*4.1.6   Tertiary Sources in Internet*

i)    htpp://www.indiana.edu/~cheminfo/00-02.html

Guides to the literature of Science and  Technology.  (by Division of Chemical Information, Indiara University) started in 1996.


## 4.2      Other Electronic Resources

There are various kinds  of electronic resources in the Net.  New resources/sites are added almost every day.  In this section, only a few of them are mentioned as examples.

The iworld (www.iworld.com),  an Internet resource, is an online magazine.  It basically gives Internet news.  It also offers a searchable list of Internet service providers.  The other similar resources are CNET:- the computers network (www.cnet.com),  web review (www.webreview.com),  Hotwired (www.hotwired.com).   CNET gives information about Internet and its technologies; it offers reviews and tips for using some of the new software products.  The webreview features articles, tutorials and demos; also assists us in learning the latest web authoring techniques and tools -- graphic design, animation, information architecture, audio, video, etc.  The Hotwired is yet another Internet magazine  -- gives information about Internet.

One of the most important electronic sources is amazon.com.  In this site, one can browse list of newly published books, place an order for books; one can even browse the site for music, video, auctions, electronics, toys & games, etc.   The "amazon.com" opened its virtual doors in July 1995 with a mission to use the Internet to transform book buying into the fastest, easiest, and most enjoyable shopping experience possible.

Today, the "amazon.com" is a place to find and discover anything we want to buy online. More than 10 million people in more than 160 countries have used this site for shopping in the last few years.  It offers a variety of services.  For instance:

- Search for books, music, videos, and more -- in a snap.

- Browse the virtual aisles in hundreds of products categories -- everything form audiobooks, jazz, and video documentaries to coins and stamps up for auction.

- Instant personalized recommendations; (it is based on our earlier purchases )

- Sign up for <u>Delivers</u>, e-mail subscription services, to provide the latest reviews of exceptional new titles in categories that we are interested-in.

- To search over a million UK-published titles and local content at <u>Amazon.co.uk</u>  and German-published title at <u>Amazon.de</u>.

- Provision to become an  <u>Amazon.com Associate</u> and earn money by selling books, CDs, DVDs, videos, and many other products on our Web site.

**The Amazon.com family of Web site also includes:**

- Internet Movies Database (www.imdb.com), the Web's comprehensive and authoritative source of information on more than 150,000 movies and entertainment programs and 500,000 cast and crew members dating from 1892 to the present.

- LiveBid.com (www.livebid.com), the sole provider of live-event auctions on the Internet.

- PlanetAll.com , (www.planetall.com), a Web-based address book, calendar, and reminder service.

- Drugstore.com, an online retail and information source for health, beauty, wellness, personal care, and pharmacy, at www.drugstore.com.

- Gear.com, an online sporting-goods company that offers extraordinary deals on new equipment in a wide range of categories, at www.gear.com.

- HomeGrocer.com, the first fully integrated Internet grocery-shopping and home-delivery service, with operations in Seattle and Portaland, Oregon, at www.homegrocer.com

- Pets.com , the largest pet-supply company on the Internet and a valuable source of free information for pet owners, at www.pets.com

## 4.3    Online News Papers

The online versions of many newspapers and magazines can give us additional information as well as display the same in a fun way; online newspapers are becoming extremely popular. The "newspaper online" (www.newspapers.com)  in their online service provides the important national and international news stories as well as extensive financials news. Further, they also offer news in multi-media form -- charts & graphs, photos, audio & video chips. However, their services are more concentrated towards synthesizing news rather than as an information  solution for individuals. Also, www.netgazettes.com gives a directory of web magazines.

There are sites which refer to a collection of sites -- often, they are also called search engines; for instance, the pathfinder (www.pathfinder.com) is both a search engine and a collection of web sites. Almost all site, here in, however affiliated to Time-Warner. Among the searchable  sources, Time, Life, Fortune, Sports Illustrated, etc are the few important magazines.

Other related sites are MusicSeek, MovieSeek , Artslink and kindstuff. The Musicseek is a searchable database of more than 200,000 albums and 16,000 artists,  read reviews and discographies, browse through hundreds of musical categories. The movieSeek is a database of films, search by title, actors, years, etc.  The Artslink is a site from which one can reach

museums, and other art organizations online as well as read about and view art.  The kidstuft is a site that links to Sports Illustrated for kids, Time for kids,  Warner Brothers Animation, etc.

## 4.4      Reference Sources

Among the advantages of searching electronic sources on the Net are that it is fast, readily available and mostly free.  The Net also allow us to search multiple sources at a time. There are a number of reference sources on the Net.  The Net has information about libraries; it has dictionaries, almancs, acronyms, abbreviations, maps, charts, tables, etc.

Marriam Webster offers its online webster dictionary (www.m-w.com/netdicto.htm/) when search results are returned, we also have the option is provided to check thesaurus entries for the word.  Also, the onlook dictionaries (www.onlook.com)  index more than 100 dictionaries covering a variety of disciplines.  In this site, one can search dictionaries of science, business, religion, sports, technology, medicine as well as a number of general dictionaries.  The site, www.almanac.com gives current weather conditions in more than 800 US cities and it also gives five day forecasts with maps and illustrations.

## 4.5      People and Place

Search engines are the basic tools for locating general information in Internet.  Many of these  search engines have provision to locate simple information about people, place and Institutions.  There are two common ways to approach the task of finding a person or place on the Net.

- ♦   Try people finder, business finder, or other appropriate directory facility offered by search engines

- ♦   Try a service intended specifically for these types of queries

For research involving people and place one may use the following:

The general search engines:  Infoseek, Excite and Webcrawler

- ♦       The specific services Bioyellow, Infospace and Fourll

- ♦       Yahoo powered by Fourll to find e-mail address

The world of electronic publishing is evolving at a rapid pace.  Most of the developments in this area will be directed towards the users, with emphasis on entertainment,  leisure  pursuits and e-Commerce.  The extent to which it penetrates this market effectively will depend on the rate at which digital technology is introduced and digital television sets with interactive capacity are available  and used.  But for information managers, electronic publications are already an integral part of the  information services.  As with  the other technologies, the technology of Electronic Publishing is clanging   and developing at a faster rate than the skills for using it, to say nothing of the strategies and techniques -- the knowledge base for its effective management.

## 5.    CONCLUSION

Almost all conventional information sources, such as dictionaries, encyclopedia, journals, etc are now available in the Net.  Librarians connot afford ignore this development and must make sufficient efforts to access such e-sources.  This has several advantages in long-range.  It is expected that, in long-range cost of such e-publications will reduce and with a little budget one can access to many number of publications.  Apart from the cost aspect, user will be in a position to get pin-pointed information with the help of a most powerful search engines.

The libraries are changing significantly and they will  no doubt change even more; access to information has improved and will continue to improve.  Agencies/vendors who provide access to information, now provide services that give direct contact access.  Effective management of libraries and information systems, and information sources is a variety of media is a major requirements as well as a problem.  Such a management must be adaptable to change and cost efficient.

Yet another trend in this field may be that all electronic articles may be sold individually in the future, with the users there by exercising greatest control over selection decisions than library professionals.

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The increased reliance on electronic resources by Congress and public researchers demands a sustained effort to identify and acquire these resources. Given the nature of electronic resources and the rapidly changing technology associated with their use, the Library will review these guidelines on a regular basis to ensure that the Library's current and future research needs are met. I. Scope. Â The collection comprises sources from academic, government, trade, news, and popular publishers, as well as collections of archival, manuscript, and rare book materials. Â However, particular emphasis is placed on unique content of contemporary interest that is useful in serving the current or future informational needs of Congress and researchers. Sources of Information includes all the sources from where you can get hold of information for an effective study. Information is an integral part. Â These are essential types of documentary resources that are also known as first-hand information. The primary sources are the first records of the original research to be published and are often known as unfiltered and original ideas and information. These are mostly unorganized and often the only information source available to mankind. At present, they look like electronic information resources and can be used to search both general information and highly specialized ones. Newspapers. The newspaper is a collection of articles oncurrent events, usually published daily. Â to find out what sources the library or website owns on your topic (today electronic libraries predominate; therefore, catalogs these days are information resources of the Internet); Find where the particular item is in the library. Books. Source: Taken in part from Gellman, Robert. Public Records: Access, Privacy, and Public Policy: A Discussion Paper, http://www.cdt.org/privacy/pubrecs/pubrec.html ; David S. Sanson. â€œThe Pervasive Problem of Court-Sanctioned Secrecy and the Exigency of National Reform.â€Â A Quiet Revolution in the Courts: Electronic Access to State Court Records, http://www.cdt.org/publications/020821courtrecords.shtml. On Their Own Terms: A Lexicon with an Emphasis on Information-Related Terms Produced by the U.S. Federal Government. Susan Maret, Ph.D. (6. th.Â On Their Own Terms is a lexicon of informationâ€"rich terms created by the U.S. legislative, regulatory, and policy process, and routinized by various branches of the U.S. government.