

LJ INFOTECH ONLINE DATABASES

BY CAROL TENOPIR

Should We Cancel Print?

How many times have you heard statements like these recently:

- "Now that everything is digital, why do we need the library?"
- "Why do we need to build an addition to the library, when we can get everything online?"
- "Now that all journals are on the web, why do we need to spend any money on journals or magazines?"

Yes, the realities of digital periodicals are exciting, but sometimes far less so than the expectations fostered by our enthusiasm and media hype.

On the other hand, when a patron or staff member cautions against canceling *any* print journals because of the uncertainty of online journals, we end up paying for two or more versions of almost the same thing. Libraries cannot afford this either.

The solution, of course, lies somewhere in between. Some materials should be purchased only in print, some only in digital form, and some still in both. The challenge is making a wise decision for your library. "Can't We Ever Cancel Anything?" was a helpful session sponsored by the Association of Specialized and Cooperative Library Agencies/Interlibrary Cooperation and Networking Section (ASCLA ICAN) at the American Library Association (ALA) annual meeting.

Finding out what's available

The number of journal, magazine, and newspaper titles available online has grown rapidly in recent years. To track them, you should consult two ongoing print publications, which overlap very little. The Association of Research

Libraries' *Directory of Electronic Journals, Newsletters, and Academic Discussion Lists* (7th ed., 1998), edited by Dru Mogge, has kept track of e-journals and listservs since the early 1990s.

Most journal titles listed in the directory are available in electronic form only and are available directly from the publisher. Analysis of the directory contents and ordering information is available at www.arl.org/scomm/edir/index.html. The number of titles in the ARL directory has grown from only 26 in 1991 to nearly 2500 in 1997. Over 1000 of these titles are scholarly (peer-reviewed), and of the nearly 2500 titles, about 900 charge an access or subscription fee.

Fulltext Sources Online (s-a. Information Today), edited by Donald T. Hawkins and Mary B. Glose, is an alphabetic arrangement of magazines, journals, and news sources that tells where each source is available, as full text on traditional online services or on the web directly from the publisher. Most listings are electronic versions of titles also available in print.

The number of listings in *Fulltext Sources Online* has grown from about 4400 in 1993 to about 8900 as of May 1999 (up from 7600 in 1997). In the 1996 edition about one-third of the listings were scientific, technical, or medical (STM) titles (2,107), about ten percent of which were scholarly journals.

Who provides full texts?

Directories are a good place to start, but for the most current information you should go directly to the companies that provide online journals. According to Ruth Orenstein, the founder and longtime editor of *Fulltext Sources Online*, in 1989 only about two online vendors or web sites would include a specific periodical in full text, but in 1998 about six sources provided such full-text options. That means that the same journal, magazine, or newspaper may now be available from several commercial online aggregators (or vendors) such as Lexis-Nexis, SilverPlatter, ProQuest from Bell & Howell In-

formation and Learning, and EBSCO and perhaps also from the publisher.

Major publishers that lease electronic versions of their journals directly to libraries include Elsevier Science (1100 titles), Springer Link (300 titles), Academic Press (175 titles), Johns Hopkins MUSE (40 titles), and the American Chemical Society (ACS) (33 titles). The numbers of titles were confirmed as of April of this year and reported at the 1999 Association of College and Research Libraries meeting by Malcolm Getz (see www.ala.org/acrl/getz.html).

Aggregators of electronic journals provide access to titles from a variety of publishers. Major general interest aggregators include those above as well as OCLC, Information Access Co. (Gale), and H.W. Wilson. Others specialize in particular topics such as archives of major journals (JSTOR), STM (Ovid and Highwire), or business (Dialog, Lexis-Nexis, Dow Jones Interactive).

What you get in e-versions

Even now that the web is a standard platform for most of these publishers and aggregators, they're still inconsistent in providing full text on the web. Even all versions of the same title are not identical. Never assume that just because you can access a title from more than one source that it will be exactly the same thing. It's often more complicated than that.

What you get is a continuum of choices, from one endpoint (paper by-product, text-only document delivery, linked to indexing) to another (electronic only, multimedia, interactive, direct from publisher).

Digital titles today fit anywhere along this continuum, from simplistic (and quite old-fashioned-looking) ASCII texts to complex multimedia and interactive electronic journals and all the combinations in between.

Category 1 journals (the beginning) through Category 5 (the endpoint) represent several characteristics, including:

- form and format (from byproduct of

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a paper version to electronic only, and from text only to multimedia)

- purpose or use (from document delivery only where a user prints an article found in an index to a highly interactive process with data that can be downloaded and manipulated)
- source (from access through an aggregator or indexing company to access directly from the publisher).

Category 1

What I call Category 1 journals are the old-fashioned, preweb products that have now moved excerpts onto web versions of old online systems, such as Dialog, Dow Jones Interactive, or Lexis-Nexis. Such journals are available on the web but don't exploit it.

They are print journal byproducts but are just the text portions of some parts of journals. That means that you get *some* parts of *some* articles from *some* print journals. For example, Dialog, Lexis-Nexis, and Dow Jones each offers dozens of newspapers online but excludes syndicated features, wire stories, and short items. Even those articles that are on web versions of these systems (such as DialogWeb) lack graphics.

Today Category 1 titles are almost always distributed by an aggregator and are used for document delivery when a relevant article has been found by a full-text search or by a search of a linked bibliographic database. These do not completely replace a print journal, but if you need these titles only for occasional articles, Category 1 can replace print.

Category 2

Category 2 journals look a bit more like their print equivalents but are still tied to the print world and still are used mostly for document delivery of articles located through a search of an index. While this category began with CD-ROMs, versions are widely available on the web, many from commercial aggregators like Proquest Direct or Ovid.

These contain text and graphics of full articles (not full journals) or selected articles from journals, delivered in varied formats: scanned images, PDF, SGML, or HTML. While they look better than articles from Category 1, they still lean back toward print. As with the previous category, these full texts are selected articles, usually not full titles (and if an author retained copyright in print, these articles usually won't be available in these electronic versions).

Category 3

Category 3 journals are transitional, with one foot firmly in the print world, while beginning to exploit the web environment. This category includes full journals as well as selected parts of articles. In this category, most parts of a traditional journal, magazine, or newspaper are included (including ads, letters to the editor, and some features), but there may be differences with a corresponding print version. These may be directly available from a publisher as a way to attract readers to print or to supplement print. Two examples are *LJDigital* (www.libraryjournal.com) and *Journal of Artificial Intelligence Research* (www.cs.washington.edu/~research/jair/home.html). The digital *LJ* offers some extra features but also leaves out major articles. You cannot replace the print with the web version. *JAIR* is a web journal that produces an exact copy in print and does not fully exploit the capabilities of the web.

So, can you cancel print and rely on digital versions instead?

My answer is a qualified yes—for some titles, for now

libraryjournal.com) and *Journal of Artificial Intelligence Research* (www.cs.washington.edu/~research/jair/home.html). The digital *LJ* offers some extra features but also leaves out major articles. You cannot replace the print with the web version. *JAIR* is a web journal that produces an exact copy in print and does not fully exploit the capabilities of the web.

Category 4

Electronic journals in Category 4 offer substantially more than print, but print remains a distribution option. An important new journal in this category will be *New Organic Letters* from ACS, a title in ARL's SPARC program. Most newspapers that you get directly on the paper's own web site fit here as well. These sources offer multimedia, with interactivity, but may hold back by providing current stories only, or may charge more for archives. You may seriously consider canceling print for those sources that are peripheral to your collection and instead provide a link in your catalog.

Category 5

Finally, Category 5 publications are fully electronic journals, without

print equivalents. These tend to be highly interactive and include substantial multimedia; they are often subject-specific, aiming to build reader communities. Most now have no fee or a low fee or include many advertisements, but more may charge fees in the future. *The Journal of Electronic Publishing* (www.press.umich.edu/jep) is a Category 5 journal of interest to librarians. The number of such titles is growing quickly, but they don't always succeed, so pointers in the catalog must be verified regularly.

Patron preference

In a recent survey of public and academic libraries (see Online Databases, *LJ* 5/1/99, p. 36,38; *LJ* 6/1/99, p. 40,42), librarians were asked why they think patrons select a particular database to search or article to use. They mentioned many factors, including usefulness and quality of content; convenience; and uniqueness.

Still, they said that one factor overrides all these criteria. If an electronic full-text version is available, patrons prefer it. When they begin to rely on electronic full texts, they often don't bother to check print journal stacks. So it is especially important for libraries to provide a wide variety of online journals, since most patrons will select the digital versions, even if the particular title or article is not best for their needs. Of course, remote access and numerous in-house workstations are essential if a library relies on electronic versions.

So, can you cancel print and rely on digital versions? My answer is a qualified yes—for some titles, for now. As we are in a transition in electronic publishing, selectors need to consider carefully what we gain and what we give up with various versions of the same title. Form, purpose, and source of access will vary considerably among the five categories of full texts described here. The decision should be made on a title-by-title (or publisher-by-publisher) basis, depending on the needs of each library's users. The various versions of digital periodicals are not exactly the same, but few libraries can afford to pay multiple times for multiple variations of titles.

[This column is based on the author's presentations at the 1999 American Library Association annual conference and the National Online Meeting.]