FILTERS

What They Are

Before alternatives to filters are examined, a brief description what filters are—and why alternatives are needed—is in order.

Definitions

When people speak of filters, they are usually referring to one of many methods employed to restrict Internet access. Mick O'Leary writing in Online says the field of filters includes "over 100 separate products, including a bewildering array of blockers, limiters, monitors, and browsers" (O'Leary, 2000). The following definitions lend precision to the term filter.

The American Library Association provides the following definitions:

"Blocking/filtering software is a mechanism used to restrict access to Internet content: based on an internal database of the product, or through a database maintained external to the product itself, or to certain ratings assigned to those sites by a third party, or by scanning content, based on a keyword, phrase or text string, or based on the source of the information" (ALA, 1997, as quoted in Rosenberg, no date).

Another definition of filters is provided by CPSR (Computer Professionals for Social Responsibility):

"**A content filter** is one or more pieces of software that work together to prevent users from viewing material found on the Internet. This process has two components.

Rating: Value judgments are used to categorize Web sites based on their content…[and/or]

Filtering: With each request for information, the filtering software examines the resource that the user has requested. If the resource is on the "not allowed" list, or if it does not have the proper PICS rating, the filtering software tells the user that access has been denied and the browser does not display the contents of the Web site" (Rosenberg, no date).

Perhaps the best description of filters is provided by Karen Schneider: Filters are "mechanical tools wrapped around highly subjective and often idiosyncratic decisions" (Schneider 2000).

Here are definitions of other terms frequently used within filtering discussions:

Obscenity

"As defined by courts, to be obscene, a court or jury must determine that:

1. The average person, applying contemporary community standards, would find that the work, taken as whole, appeals to the prurient interest;
2. The work depicts or describes, in a patently offensive way, sexual conduct specifically defined by the applicable law; and
3. The work, taken as a whole, lacks serious literary, artistic, political, or scientific value" (Miller v. California, 413 U.S. 15, 24 (1973) as quoted in Peck, 2000).

Harmful to minors

As defined in the COPA Commission Report (COPA Commission, 2000), harmful to minors means "any communication…that is obscene or that

A. the average person, applying contemporary community standards, would find, taking the material as a whole with respect to minors, is designed to appeal to, or is designed to pander to, the prurient interest;
B. depicts, describes, or represents, in a manner patently offensive with respect to minors, an actual or simulated sexual act or sexual contact, an actual or simulated normal or perverted sexual act, or a lewd exhibition of the genitals or post-pubescent female breast; and
C. taken as a whole lacks serious literary, artistic [sic] political, or scientific value for minors" (47 U.S.C. 231 (e)(6) as quoted in COPA Commission, 2000).

Child Pornography

In Libraries, the First Amendment and Cyberspace, "child pornography" is deemed "a special category of sexual material that the U.S. Supreme Court has said can be prohibited in the interests of preventing commerce in the abusive use of children as subjects of pornography" (Peck, 2000).

Types of Filters and How They Work

Though most filtering devices were originally designed for home computer use, many have found their way into library public access use. Filters are intended to "restrict access to undesirable Internet content." A study done by the National Commission on Libraries and Information Science estimated about 15% of public libraries use some form of filtering device on their pubic access stations (Rogers, May 1, 2000). A subsequent study, done in California, found 28% of that state's libraries use some form of filters, including those that offer filters only in the children's room (ALA, 2000, Toolkit).

Though a confusing array of types of devices exists, filters can be categorized into the following basic types, based on either where the filtering occurs or how it is filtered. As Christopher D. Hunter noted, "where a filter is implemented within an information access and distribution chain makes all the difference" (Hunter, 1999). All these devices, however, operate with the same goal: to "restrict individuals from accessing particular sites and materials" (Benson, 1997).

Where the Filtering Occurs

Individual Computer (Client-based) Filters

Many of the well-known Internet filtering products are primarily client-based, that is, they are installed on individual computers, also known as clients or workstations. Well-known products in this category include Cyber Patrol, Cybersitter and Surfwatch (Schneider 1997). Many of these products can be purchased for home use and cost as little as $34.

Proxy Filters

In his Master's Thesis on filters, Christopher D. Hunter likens proxy filters to the Bishops "in the time of the Index" 400 years ago. "Bishops essentially controlled the views allowed to enter their own regional diocese and stood above printers, bookstores, and libraries. So do proxy servers sit atop the network and channel all incoming and outgoing information" (Hunter, 1999).

According to the filtering device used, the proxy may be programmed to deny access requests to certain Web sites or forbid the dissemination of certain types of messages. "The rules programmed into a proxy server have tremendous power to define the reality of the Internet and its possibilities to network users," Hunter says. Programs such as NetNanny, Cybersitter, Cyberpatrol, and SurfWatch "offer proxy filtering solutions which they primarily market to large organizations like libraries, schools and businesses" (Hunter, 1999).

Internet Service Provider (ISP) Based Filters

Rather than filtering Internet content at or near the local level, some filters restrict access to information at the provider level. Most major providers, such as America Online and Microsoft Network, provide users with an option to filter certain types of information. Many of these filters are free with the Internet subscription. Most are equipped with an on-off switch that can be activated or de-activated by the user. Some notify users when cites are blocked, but others do not. Likewise, some let the user know the filtering device is in use, and others do not.

How Filtering Gets Done

Text review

Most of the well-known filtering products, such as NetNanny use some version of a computer program or a "bot" to surf the Web looking for sites that contain a certain word or combination of words in the text, using what is known as string recognition software. Some products block information at the site level and others go into the individual page level. Several filtering products allow the home user or library to select the words or phrases they want blocked. Problems associated with this type of filtering are legendary and are discussed below.

Human review of Web pages

Because of the limitations encountered with mechanical filtering, some companies employ people to review Web pages and classify them "generally into different categories that a parent [or library] may or may not choose to block" (Getnetwise.org/tools/index).

The book Netslaves; True Tales of Working the Web by Bill Lessard and Steve Baldwin (New York: McGraw-Hill, 2000) provides a fascinating glimpse into the life of an Internet reviewer, referred to in the book as "Cyber-Cops."

Website Address (URL - Uniform Resource Locators) Review

Rather than trying to categorize the content of a Web page, either mechanically or by hand, some filters limit access to a specific list of Web sites that have been classified as "inappropriate" based on some criteria. As described in the industry-sponsored Web page GetNetWise these types of filters use companies to decide what is filtered. In these types of products "some let parents pick among pre-set categories…, some provide a "starter list" where a parent can add or remove sites and some allow a parent to override the filter if they think the site is appropriate for their child to view, but others do not" (**www.getnetwise,org/tools/inctx**). Also within this category are filters that automatically block access to Web addresses with certain URLs such as those with .xxx.

Problems With Filters

Problems with existing Internet content filters could fill this entire book. New problems emerge almost daily, as evidenced by the recent revelation that advertisements have been placed in filtering products in schools (Schwartz, John, Dec. 21, 2000).

By now most people have heard stories of filters blocking the word breast from breast cancer articles and chicken breast recipes. Other blocking blunders include the following.

A Superbowl.XXX Web site was blocked because of the domain name. The Web site for the FBI was blocked by one filter and eBay was blocked from another. The Utah Education Network found that the filtering software used in the public schools prevented access to the Declaration of Independence, the U.S. Constitution, the Bible, the Koran, and all Shakespeare's plays (Sobel, David L. as quoted in Neumann and Weinstein, 1999). The Chicago Public Library found its Web site blocked by a filter. One Congressman found a filter had blocked his own Web site (as quoted on LIS News.com, Nov. 9, 2000). Even a U.S. Supreme Court case relied on to support the Communications Decency Act (FCC v. Pacifica Foundation) was "made illegal to post on the Internet because it reprints, as an appendix, a George Carlin monologue that the Court adjudged to be indecent…" (Peck, 2000). Though this was not due to a mechanical filtering device, it demonstrated the difficulty in trying to define and limit Internet access.

The National Coalition Against Censorship has identified the following broad categories of problems with the use of filters (Censorship's Tools DuJour, 1998 as quoted in Rosenberg).

Oversimplification

How to distinguish "good" sex (or violence) from "bad"? After the six-month filter evaluation project she headed, Karen G. Schneider concluded that no filter can "guarantee that anyone will never see 'bad stuff' on the Internet (however you define it)" (Schneider, 1997). Defining it is the crux of the problem. The ALA toolkit on filters states filters may provide "a false sense of protection to parents" who believe filters can divine "good" from "bad" sites (ALA Toolkit, 2000). In one test of 200 Web sites, filters were found to block one in five legal, useful sites, but failed to block an average of 15% of material deemed "undesirable."

The Web site GetNetWise even provides a box marked "illegal" that can be clicked to supposedly find a filter to locate and block sites outside of the law. But no device yet produced can possibly apply and interpret all applicable laws to Internet content and mechanically separate legal from illegal sites.

Overbreadth

Ratings and filters often ignore context and, thus, inevitably exclude materials that users might want to have, along with materials they may not want. The "chicken breast" recipe is a classic example of this overbreadth. Though some filters are now adding contextual searching and phrase capabilities to their search strategies, the problem has not been completely solved.

Feasibility

Many filtering proposals sound like a good idea but are not feasible to implement. One California survey of libraries using filters found that nine of 22 had experienced technical problems with their deployment (Rogers, May 1, 2000). Many librarians agree that typical patron behavior will circumvent blocking software, especially among teen users. "Kids can be quite clever in getting around things," noted one Popular Electronics article (Angelopoulos, 1999). As those of us with children are well aware, Christopher Hunter was right when he said, "one of the truisms of the computer revolution is that kids know far more about computers than their parents do" (Hunter, 1999).

Subjectivity and Bias

"Any rating system that classifies or describes content is dependent on the subjective judgment of the rater" (Censorship's Tools DuJour, 1998 as quoted in Rosenberg). Gays and lesbians have been among the most vocal groups to decry the blocking of their sites due to bias on the part of the rater. Others have found political bias the basis for filtering decisions. Peacefire, a nonprofit group involved in the filtering issue, found that "nearly 4 of 5 sites classified by one popular filter as pornographic were actually innocuous" (Salkowski, 2000). With the increasing globalization of the Web, national bias and language limitations will further limit the ability to use filters universally without subjectivity or bias.

www.peacefire.org

Legal Problems

Legal problems with the use of Internet filters abound. In striking down the Communications Decency Act (CDA) passed in 1996, the Court found that the Act violated the First Amendment because it "suppresses a large amount of speech that adults have a constitutional right to receive and to address to one another" (Reno v. ACLU, 117 S.Ct. 2329, 2336 at 2346 (1997) as quoted in Peck, 2000). The three-judge federal court convened to rule on the matter found that "the Internet may fairly be regarded as a never-ending worldwide conversation. The Government may not…interrupt that conversation. As the most participatory form of mass speech yet developed, the Internet deserves the highest protection from governmental intrusion" (ACLU v. Reno. 929 F. Supp. 824, 883 (E.D. Pa. 1996) (Dalzell, J.), aff'd, 117 S. Ct. 2329 (1997) as quoted in Peck, 2000).

Cost and Time

As with any other software, implementation has costs, both the price of the software and time spent on technical support. From her study of Internet filter use in 1997 Karen G. Schneider advises, "If you don't need a filter, don't spend the money (which you will spend many times over in maintenance…)" (Schneider, 1997). Frank Bridge from the Austin Public Library quips: "It's just one more thing you gotta mess with" (as quoted in Schneider, 1997).

Ineffective

Along with the legal issues and costs, one of the main problems with filters lies in the fact they are not effective. The TIFAP study found "the strongest predictor of filter performance was the person using the computer" (Schneider, 1997), implying filters are not uniformly beneficial and effective with all patrons. As Allen C. Benson notes, "Nothing will prevent a teenager from logging in and accessing a new address for pornography or white supremacy that was just handed to him or her by a friend" (Benson, 1997). When hearing the title of this report, Alternatives to Filters, one friend jokingly suggested, "how about breaking their little fingers." She had correctly identified that—short of physical debilitation—few filtering devices will accomplish the goal of controlling children's Internet access.

Finally, Marvin Scilken's rule about library technology comes into play with filters. As quoted by Karen G. Schneider, Scilken told her "anything the staff doesn't like will be lost or broken" (Schneider, 1997). Internet filters may not be found in pieces in the floor, but they may end up on the book sale table soon enough.

ALA Policy on Library Internet Content Filters

Throughout the filtering debate ALA has steadfastly defended the rights of libraries and intellectual freedom. After his recent encounter with Dr. Laura, Pentecostal minister Michael Wessells cheered the efforts of this organization and called ALA "a bulwark of support" (Wessells, 2000).

The mission of the American Library Association (ALA) "is to promote the highest quality library and information services….[and] protect the rights of library users to read and receive information as defined by the U.S. constitution and courts" (ALA Toolkit, 2000). ALA "does not endorse using Internet filters in libraries that block access to constitutionally protected information that is legal and useful" (ALA Toolkit, 2000).

ALA "has never endorsed the viewing of pornography by children or adults" (ALA Toolkit, 2000) and "strongly respects the right and responsibility of parents to guide their children's library use, including the Internet. ALA encourages parents to learn about this important technology so they can guide their children and encourages local libraries to offer instruction for children and adults in how to use the Internet effectively" (ALA Toolkit, 2000).

The ALA Toolkit, "Libraries & the Internet," is a one-stop resource for information on filters and ALA. (See that section of Overview Websites.) Their policy statements concerning intellectual freedom and public access are available in the appendix of this report.