

## By Morris A. Enyeart and By Richard D. Ackermann

Everywhere you turn the media is trumpeting the explosive growth in the number of computers and Web sites on the Internet. In many ways the rush to the Internet is similar to the scramble for land in the West during the mid-1800s. There are hucksters and hype at every turn as the new frontier opens up to businesses, organizations and people. However, like the land rush, there is also real value for those who possess clear goals and a well defined plan for achieving those goals. Opportunity and pitfalls abound.

Governments in general, and local governments in particular, have been much slower than private industry, educational institutions, and individuals to embrace this latest technological phenomena. However, there are clear indications that the rate of involvement by municipalities is beginning to accelerate. The number of municipal Web sites in New Jersey has increased ten-fold in the last eight months. Currently there are more than 90 New Jersey municipal Web sites and that number is expected to more than double in the next eight months. The quality of these municipal Web sites and their value to the municipalities varies greatly. Some sites are nothing more than electronic billboards, while others serve both the municipality and its residents well.

There are four areas that must be carefully considered if a municipality is to create and maintain an effective Web site:

- What value does a Web site bring to the municipality?
- Who should create and control the Web site?
- · Criteria for selecting a design firm.
- Tips for designing an effective Web site.

As is the case with any municipal initiative the first step is to develop a clear plan that answers the question "How

Dr. Enyeart is the CEO of City Connections, Inc. (an Inter-net Web development corporation), and a Councilman in North Brunswick Township. He and his partner Richard D. Ackermann have been involved in all phases of computing and the Internet for over 30 years. will a Web site on the Internet help us to provide better service to our residents in a cost effective way?" There are three broad categories where municipalities can find value on the Internet. First is for internal research within the municipal government itself. There is a large and growing body of information relevant to almost every segment of local government. Resources and idea sharing that were prohibitively expensive in the past are now freely accessible on the Internet. It is also possible to find new and innovative ideas that can help you cut costs without sacrificing services. You do not need a Web site to have this capability.

A second benefit is that many of the vendors who deal with a municipality are also probably on the Internet. It is only a matter of time before the Internet is approved as a legal mechanism for publishing bid specifications and making other public announcements. Until then the Internet

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can be a cost effective way to re-order materials reducing the cost of maintaining an inventory. It is also a very cost effective way to exchange working documents and receive status reports from vendors.

Third, and unquestionably the most visible benefit, is the ability to provide residents with information and receive feedback on a 24-hour-a-day, 7-day-a-week basis. No other form of information dissemination is as cost effective or timely. However, using a Web site for this purpose cannot replace traditional avenues at this time because estimates indicate that on the average only 25 to 50 percent of the residents currently have access to the Internet. In the not too far distant future, you will be able to receive the Internet on a cable TV channel and reach more residents at less cost than through the newspaper.

The question of who should create your Web site is

extremely important. There are basically four choices; volunteers, municipal staff, consultants and contracted firms. Each has its own benefits and dangers.

Even though using volunteers to create the site for free seems like an attractive proposal because it has no Internet costs or labor costs, it is the least desirable of the four choices for the following reasons. Most important is the fact that the municipality loses a substantial degree of control over the content of its Web site. Second is the lack of control over the service level provided for updates and information exchange. Responses and updates must be made in a timely fashion if they are to be of value to residents. Third is the concern about the confidentiality and integrity of information exchange between residents and the municipality. Finally is the fact that if the volunteer quits, the municipality may lose its entire site without adequate notification or be forced to assume responsibility at a less competitive cost.

Using consultants to create the municipal Web site and then turn it over to the municipality is the third lowest choice because it only accomplishes the first phase (creating the initial pages). Maintaining and evolving a Web site to provide additional services is even more challenging than developing and implementing the initial design. If your staff does not have the skill to do the initial work it is doubtful they will have the skills to do the work that follows. Long range, the costs of this option are almost the same as doing everything in-house. In either case there must be a commitment to continual training of staff.

Using municipal staff to develop your municipal Web site provides the highest degree of control and safety, but it is the most expensive. For that reason it is the second highest preferred option. This choice is only a viable option for large municipalities who already have a permanent computer applications development staff. Here the main risk is staff turnover which can be mediated by good succession planning. Staff and infrastructure costs make this choice too expensive for medium to small municipalities.

Outsourcing to a Web development company is the most desirable choice for creating a municipal web site for a number of reasons. Absolute control over content and service level is maintained by the municipality. Contracts can establish succession planning procedures to minimize the possibility the vendor may go out of business. Using a pro-

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fessional development company also assures you have the benefit of people who stay abreast of the latest Web development capabilities. Costs vary widely. We know of some companies who offer their services for free and others who charge as much as \$3,500 per page. Both are unwise choices. Also beware of hidden charges. Speak to at least one of their references about their flexibility and billing practices. We know of one municipality that agreed to pay \$2,200 per page because they did not understand all of the hidden charges.

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## SURFING THE WEB

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Given the recommendation to outsource the creation and ongoing main-

performed development work for other municipalities or government entities? Is their municipal experience as a vendor or do they have experience with municipal government? Look at one or two of their best Web sites. Do they

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tenance of the municipal Web site to a professional Web development firm, what should you look for, what should you ask for and what should you avoid? Look for a track record. Has the firm

meet your expectations? Request a co plete listing of all of their charges even if they will not charge you initially. Do they have their own Web server or are they renting space from a larger provider? If they own their server, make sure they have adequate connections to the Internet, backup capabilities and disaster recovery. Finally, will they give you a copy of the programming code for your site or at least place it in escrow in case they are no longer able to perform? Giving you a copy each time the page it is changed is preferable. If the code is escrowed it should be at a location of your choosing.

Finally, what should you consider when actually designing the pages for your site? First, remember you are designing a Web site for repeated use

by your residents and vendors. Use graphics conservatively. While graphics do enhance the quality of a Web page, they also make your page load slower. As a general rule of thumb, try to use

no more than two or three graphics per page. Do not make your Web pages too long since it will increase the amount of time it takes the page to load even though it may reduce the per page cost of development. One government site we are aware of loads a single Web page that when printed is seventy-five pages long. Needless to say, there are very few repeat visits to that site.

Technology is wonderful but do not try to use every capability available. Be careful in using sound and animation in your Web pages. Most of your residents will not have the capability to take advantage of them. In addition, using techniques such as Java scripts for things like headliners and animation will sometimes cause problems on people's computers who are viewing the site. One municipal site in New Jersey has used almost every technical capability available on their home page. The result is that it is slow to load and can cause computer crashes. These capabilities do have their place when used judiciously for the right audience but do not try to do everything on one page. One of the most important aspects in designing a Web page is to give your residents the capability to send you electronic mail when they visit your Web site. Municipal Web pages should be interactive, two-way exchanges. Their value is dramatically decreased if there is no e-mail capability. Registration forms for recreation programs and licensing applications also provide interactive value to residents using your pages.

In summary, we believe there is substantial value in a municipality having its own Web site. As is the case with many new endeavors, it is *caveat emptor* for municipalities. The most comprehensive listing on the Internet of New Jersey municipal Web sites can be accessed from the League's Home Page (http://www.njslom.com) or connecting directly to the City Connections site (http://www.cityconnections.com).