

**Testimony Given Before the Local Government Committee of the  
Michigan State House of Representatives**

**By Russ Bellant**

**October 24, 2002**

## Regionalization History

A premise of those who have advocated taking DWSD from the City of Detroit is that it can be taken without compensating Detroit. Indeed, the bill seems to be saying that Detroit will have to pay to the new authority for its share of ownership. The supporters of this bill seem to believe that suburban users have been paying Detroit for water services and therefore have a claim to ownership.

In fact, Detroit built through bond financing all the water plants, waste water system, major transmission mains, booster and lift stations. Detroit took the risks, not the suburbs. Suburban communities voluntarily chose to contract with Detroit for water supply and/or sewerage services. The decision to contract with the City as a customer did not entitle any community to assume a claim to ownership. No communities have asserted that they have ownership rights based on their contract, to my knowledge.

So how do some legislators believe that over a century of the City of Detroit's investments can be legally ignored? Perhaps there is an erroneous belief that Detroit has built a resource-controlling monopoly rather than a voluntary association by persons who do not know the 166 year history of the system.

In 1835 Detroit sold its first two bonds at \$50,000 each. One was to finance the purchase and improvement of the local water works, the other to build the first sewer. On June 4, 1836, the City established its own water department. This was a year before Michigan became a state.

In 1849, the Legislature authorized the City to levy a special tax on its citizens for the expansion of the water works. The City purchased land in 1851 for the expansion. It hired contractors to make the improvements. By 1851 Detroit had spent \$175,898.93 on its water department.

During this period, the City also piped water to residents of the townships of Hamtramck on the east side and Springwells on the west. A few years later these townships became part of Detroit.

As the town and the water system grew, it was decided to create a Board of Water Commissioners to supervise the system and its improvements. Established in 1853, the first board had members whose names were memorialized in the names of Detroit's roads, such as Shubael Conant, Henry Ledyard, Edmund Brush and James Van Dyke. This board borrowed \$500,000 to again expand and modernize its water works.

With the projects completed in 1860, the board set a 15% rate increase and required payment from previously exempt groups. It was probably the first double digit rate increase to pay for capital improvements.

In 1870, the City was again petitioned by nonresidents to be served with Detroit water. The City agreed to supply 100 homes that were within 700 feet of the City. As with earlier townships, this area was absorbed into the growing City limits of the day. But it showed then as

today a willingness by the City to help others beyond its borders with this basic health service.

In 1871 the Legislature sought to create a Department of Public Works and abolish many offices, including the Board of Water Commissioners. There was much protest to this new law. The Board of Water Commissioners refused to turn over its books to the new agency. The Michigan Supreme Court thereafter negated the Legislature's act.

Chastened, in 1873 the Legislature gave the Board of Water Commissioners the power to borrow one million dollars and to levy a direct tax, as well as condemn property and build works outside the City. Finally, the act banned industrialization for a six mile stretch along the Detroit River above the planned water intake across from Belle Isle. The land for the 56 acre site we now call Water Works Park was purchased by the City in 1874 and a new pumping station with settling basins was put in service in 1877.

By the 1890's the Board began to contemplate the feasibility of building an intake in Lake Huron. In 1900 the first municipality, River Rouge, signed a water supply agreement with the City of Detroit.

The City continued to acquire property and expand capacity to meet the needs of its own growing population, industrialization and the requests for service from the suburbs. It was financed through the City of Detroit sale of bonds. The Springwells plant went into service in 1935. Starting as a reservoir and booster station in 1945 to serve Macomb County, the Northeast Treatment Plant was put into operation in 1956. The Lake Huron plant, long requested by Oakland and Macomb counties, went into service in 1973 and also supplied the greater Flint area.

In the 1950's wide debate occurred about whether Detroit should build a regional system or whether suburban communities should build their own systems. Laurence Lenhardt, the manager of the Detroit Water Department, issued a report in January, 1955 saying that Detroit would not hook up any more cities to the Detroit system and only will serve the 42 cities currently receiving Detroit water. "Why should Detroit finance suburban growth which will lure away our residents and industry," asked Lenhardt. He advocated that the suburbs build their own systems.

The suburban need was great at that time. Most of the suburban population was in western Wayne County at the time, which had more people than the combined populations of Oakland and Macomb counties. And many of those western suburbs were hurting for water in the summers of 1952 to 1955. Local well systems were being tapped out. Undersized water mains also helped to contribute to low pressures and an inability to fight fires. Total bans on lawn sprinkling by suburban authorities and gurgling rather than flowing faucets caused great concern in many communities. Schools were closed, while health and fire hazards mounted.

Water was being delivered by police in milk cans to some residents, while others got their residential water by going to centrally located community taps and filling their own containers. Limits were also placed on residential building permits in suburbs such as Livonia. In 1955 the Detroit Free Press reported considerable loss of industry due to the water shortage.

Within three months of Lenhardt's statement, Wayne County placed a millage on the ballot to create a water system for Wayne County. The millage was for an out-County system that Detroit would never benefit from, yet Detroit, which had two thirds of Wayne County's population,

approved the millage. Detroit Mayor Albert Cobo eased Lenhardt out as business groups, public health and safety officials, civic associations and the suburbs demanded that Detroit expand their system.

In 1955 an Intercounty Supervisors Committee was established from Supervisors (now Commissioners) from six counties to map out development of a regional plan for Wayne, Oakland, Macomb, Monroe, St. Clair and Washtenaw counties. A 1957 report to them by a national group of water systems experts organized by the National Sanitation Foundation said Detroit should build the regional system and supported the plan to build a plant at Lake Huron. This was also backed by the Detroit Regional Planning Commission (later SEMCOG), which said that the growth of the population and economic base of the region was "endangered" by inadequate water services. It noted that 58 communities in southeast Michigan could meet current needs, 37 could not and 100 had no water systems at all.

The Detroit Board of Commerce (later the Detroit Regional Chamber of Commerce) also fought for Detroit building the regional system from 1955 onwards. Newspaper editorial boards also endorsed the Detroit plan, summarized by the Detroit Times (later absorbed by the Detroit News), which editorialized that "The reason for unification of the water supply in Detroit's department is because the Detroit system has the economic base-its present facilities and paying customers-to finance expansion. No other apparent combination of communities has such resources."

As Detroit and its suburbs coalesced around a Detroit-built regional system, Wayne County experienced technical and financial difficulties in their planned water system. They decided to sell to Detroit the system they were building. So the county system started mainly with Detroit millage revenues was now paid for again from Detroit water funds. But from that transaction came the Southwest Water Treatment Plant in Allen Park in 1965. With legal obstacles cleared, Detroit then financed and built additional mains so that Livonia and other suburbs could restart residential building, occupy already built but vacant homes and open already constructed schools.

In the 1960's Michigan health officials stopped development in Oakland and Macomb counties due to lack of sewerage systems. The counties asked for help from Detroit and, according to then Macomb County Public Works Director Thomas Welsh, "Detroit obliged with a sewer system to accommodate Oakland and Macomb counties." Welsh noted that neither county wanted to assume the debt or responsibility of building their own systems after they studied the matter. With the help of Detroit, development restarted in both counties, as it had done in western Wayne County. The volumes of water demanded by the region now made the Lake Huron plan economically feasible.

Detroit voters also amended the City Charter in 1960 at the request of Mayor Louis Mariani in order to add a representative from each of the three counties to the Board of Water Commissioners. The Times then concluded that "the Detroit region will now move toward a long-needed program of area-wide centralized control of the supply of water."

The inclusion of suburban representatives is dismissed today as insufficient by advocates of HB 5788. Nevertheless, suburban representatives said in testimony in 1993, 1999 and this month before this subcommittee that they were fully equal in their roles, that they are not isolated, that votes have never occurred along City-Suburban lines. This would be a good model for the

Legislature to follow.

Today the system has evolved in just the way previous generations planned it. Local communities are still contracting with Detroit for services. Not everyone thinks that the system Detroit built for the suburbs means that the suburban communities should ingratelously turn around and steal it from the City. No longer do Livonia police have to haul water in milk cans to their residents.

## Rates

Although the City of Detroit charges among the lowest rates in the United States, that does not mean that people do not complain about their water bills. The report on suburban charges shows only 40 of the 125 suburban customers add less than 100% to the water bills of their residents. Some of those charges are necessary to cover local municipal costs. But questions can also be raised as to whether some communities are using the funds strictly for water utility uses, as prescribed by law. It seems clear, however, that most of the money collected in the suburbs stays in the suburbs.

Few people have visited a water or waste water treatment plant and therefore do not understand the resources and costs involved in disinfecting and cleaning their water. Nor do they understand the volumes of water treated. On a single hot, dry day the fresh water system may pump over one billion gallons of treated water. That is 4.2 million tons of water, as much tonnage as a steel rolling mill produces in a year. All that water tonnage must be pressurized from 80 to 200 pounds per square inch and sent through thousands of miles of water mains, with pressure boosters at key elevated points throughout the system. The equipment and its operating costs alone are a major source of the necessary charges to customers. Electricity to power 1600 to 5000 horsepower motors alone costs tens of millions of dollars per year.

The City's rates have gone up in recent years and will continue to rise. This is predictable and necessary. Thirteen years ago the executive director of the American Water Works Association wrote that the public and press expect that "drinking water must be brought to the highest standards of quality and safety."

Noting the future regulatory requirements then being formulated, he also noted "The issue is no longer whether rates should be increased. The issues are how high, how soon and with how much political and public howling." Briefly put, higher standards means higher costs means higher rates.

Prior to 1980, Detroit charged wholesale customers based on meter sizes, modified by distance and elevation factors. Detroit, with the assistance of nationally recognized water rate engineers, developed a rate model for the Detroit system that took into account not only base distance and elevation differences among each customer, but peak hour and peak day demands, maximum distances and several elevation factors. Black and Veatch, an international engineering firm that performs water rate services nationally, studied the system's performance for a period of years in order to perfect the rate model. The intent of the rate model is to pass along to each wholesale customer the actual costs of service for their community, so that one municipality was not paying costs incurred by another community. Each Spring DWSD conducts forums on the new rates for elected and public works officials from each municipality served by the system.

Detroit has said for some years that rates would be climbing significantly in each of the coming years because new treatment systems based on increased health need and regulatory requirements must be installed. Let me offer just one example of this need.



In 1993, Milwaukee had an outbreak of *Cryptosporidium* that incapacitated 400,000 people. About 4,400 people were hospitalized and over 100 people died from this tiny protozoan in the water supply. There have also been *Cryptosporidium* outbreaks in England, Australia, Europe and Canada in recent years. Other waterborne protozoa, such as *Giardia*, also pose threats to the public health.

While others in the U.S. contemplated action in response to the Milwaukee outbreak, Detroit studied, designed and built a plant to provide protection from these diseases. The new treatment plant built at Water Works Park will include ozone treatment, which the U.S. Environmental Protection Agency describes as "Highly effective for *Cryptosporidium* eradication" and is a "More powerful disinfectant than more chlorine compounds." It has other treatment benefits as well.

The cost of this new facility, which also replaced many functions of the aged treatment plant, is \$250,000,000. It is a lot of money, but it ensures a safer water supply for generations to come. Consider the cost also of the Milwaukee outbreak. The lost wages, adjusted for inflation, were \$26 million. Medical costs, reduced economic activity and the statistical value of life were additional tens of millions of dollars not added to the above cost. The emotional costs of the loss of life are, of course, not possible to calculate.

Preventing such problems is what the public expects of the Detroit system. This plant is a national leader in water treatment technology. Given that there are an estimated 900,000 cases of infection from water borne diseases in the U.S. each year, resulting in 900 deaths annually, all public officials should be recognizing and encouraging this kind of investment and explaining the rate increase issues rather than exploiting them for campaign advantages.

In summary I would like to reiterate that:

- Due to the high add-on charges by suburban communities, most money suburban residents pay stays in their own communities
- Detroit developed, assisted by national expertise, a scientific model for rate charges that places direct costs on the city that incurs the cost.
- Public health concerns for water and waste water treatment will require continuing and increasing investments that will mean higher rate charges.
- Political leaders need to explain and support these efforts instead of pandering to narrow attitudes that harm those bringing regional solutions.

## Warren Rate Debate

The City of Warren has tried to deflect criticism from its residents about water rate hikes to make it appear that Detroit is responsible for its charges. It filed one lawsuit over claims that it has been denied information about how rates have been set. It has filed a second suit over what it has characterized as price gouging. Before considering those issues, however, I want to challenge Warren about its own transparency concerning its water funds and accountability, since the Warren issues have been tied to a justification for HB 5788.

If you look in the City of Warren's annual published budget, you will not find any reference to the Water or Waste Water budgets. Warren publishes a separate booklet on those agencies that is a recommended budget. There are no published, independently audited financial statements available to the public. They are not at the library, not at the City Clerk's office, not at the water department. By contrast, the Detroit Water and Sewerage Department issues independently audited financial statements in annual reports that also include listings of capital improvement programs and other major projects, as well as other general data.

This is not a criticism of the Warren water or waste water agencies themselves. Their employees undoubtedly approach their jobs with the same attitude as Detroit employees do. They want to provide a public health service and keep their facilities up to date and their systems reliable now and for the future. They understand the need to invest in order to do that, which means rate increases on the charges the City of Warren includes in its bills to Warren residents.

It is impossible to know, however, whether the amounts of those add-on charges are justified, given the lack of independently audited information available to the public. In 1992 Warren added charges equal to a 60.45 % increase over the Detroit rate to that City. In 2002, the add-on charges are 125% above the Detroit rate.

Warren has not yet justified to its residents or to this committee their doubling of their own charges. They may have an audited capital improvement program that justifies their policy. Detroit provides its customers with a detailed and independently audited explanation of our capital improvement program to explain our rate increases. Warren does not.

*If Warren is accurate that Detroit's charges have increased 50% over the last five years and they had kept their add-on charges to 60%, Warren's revenue would also have increased 50%. The fact that they have also slightly more than doubled their own charges means that residents are paying the claimed 50% increase plus 125% increase applied by their own local government.*

A look at Warren's unaudited recommended 2002 budget for its utility operations projects \$50,182,295 in expenses, of which payment of water to the City of Detroit is but \$7,475,000, or 14.9%. It should be clear from all of the above that Detroit is not the primary reason that Warren residents pay the costs that they do. Warren's rate issues should not be presented to this committee as justification for the legislation before this committee.



On the matter of the City of Warren's lawsuits against the City of Detroit, it seems obvious that the City Attorney for Warren is using litigation as a means to draw attention to his campaign for circuit judge. His disruption of the Mayor of Detroit's press conference, his theatric serving of his second lawsuit on our Water and Sewerage Department Director in front of the cameras on October 9 and his use of the lawsuits in his campaign literature all suggest political motivations for this litigation.

When the City Attorney for Warren was at the September 23 City of Detroit press conference, he stated in the presence of many media organizations that he "never denied" that Warren increased rates 125% over the Detroit charges. When he was asked by a member of this subcommittee about the 125% increases at the October 9 hearing, in front of Warren voters, he said he wasn't sure whether the 125% was accurate.

In September he tried to blame the add-on charges as stemming from 30 broken water mains due to high water pressure. If he was being more truthful on this issue, he would have said that the rates were set in 2001 for the current year, well before any summer problems. If Warren feels the pressure is too high they can install pressure reducing valves, as has been done elsewhere. The pressures were set to serve all of Macomb County, and Warren, only 50 feet away, is the closest Macomb city to the Northeast Water Treatment Plant. Warren responded by telling their residents they could ignore odd-even watering days established to maintain pressures in other Macomb County municipalities, such as Clinton Township. Detroit had joined the water restrictions to help conserve water needed in the suburbs. Warren's Mayor said that they had all the water they needed and the shortages elsewhere in the County were not their concern.

For your background, water mains are designed to operate at much higher pressure than the City operated at during the summer. Even household plumbing is rated at 150 PSI, well below pressures in Warren. Most water main breaks occur due to extended life in excess of 60 years; mineral buildups that can more that double the weight of the main; shifting soil foundations, vehicle traffic over mains, especially in the winter, as well as water hammer that can result from authorized or unauthorized operation of fire hydrants. Warren need not blame the City for these problems as well.

At the October 9 hearing the Warren City Attorney could not answer the questions of when Warren first began receiving Detroit water (in 1940) or whether the arrangement was voluntary. Since he had just filed a lawsuit alleging breach of a water supply contract between Warren and Detroit, which is by definition a mutually established, voluntary relationship, his inability to answer the question really calls into question either his honesty or his competence.

Warren has three members of their City Council that are facing a recall over water rate increases. Although the recall is stalled in courts, it can only help for them to have Warren voters and the media believe that Detroit, not Warren, is responsible for the charges facing residents. Warren may also want to try to convince residents that they can lower their rates through their lawsuit, although such litigation can only add to the costs of ratepayers.

It should be noted that Detroit holds annual all day seminars for local elected and public works officials on how rates are calculated for their communities. Detroit also offers to set up additional, one-on-one meetings with any community that has concerns about its rates that

were not answered in the meetings. Warren never requested such a meeting.

Finally, on the lawsuit itself, it must be said that Detroit has given Warren substantial material in response to its information requests. Warren seems to insist that there is a formula that is used to calculate rates that is not being made public. The rates are not calculated on a one-size-fits-all formula, but a computer model established and developed over a period of years for the City in cooperation with Black and Veatch, a Kansas-based international engineering firm that specializes in water rate design for utilities across the U.S.

The City has given Warren all the information needed for them to compute their rates. They are keeping the case alive for reasons that seem to be explained by politics. This explanation is underscored by the fact that none of the other 124 municipalities have joined the lawsuit. They have all been given the same information as Warren and know how their rates are calculated.

## Inefficiency claims unfounded

In the hearing of this Subcommittee held October 15 in Royal Oak, Brennan Brown of Ortonville claimed that DWSD was inefficient based on data he collected and presented. Mr. Brown said his research was done for a college paper. Its conclusions have been distributed in an effort to discredit the City of Detroit's operation of DWSD.

What Mr. Brown did not say last week is that he is part of an effort through the Midland-based Mackinac Center to privatize or commercialize the DWSD system. He published a longer article on this subject two years ago in a Mackinac Center publication, in which he advocated those goals. His article then contained the same errors and apparent misjudgments as his testimony last week.

Before discussing those problems, it should be noted that Mr. Brown describes himself as the Coordinator of the Freedom Fund of the Mackinac Center and therefore has an identity with Mackinac beyond writing three articles for them. Because of the critical written and oral commentary related to the well-funded Mackinac organization regarding DWSD, we have a right to consider the purpose of Mackinac's critique and the quality of its commentary.

Mackinac exists for the purpose of reducing or eliminating public sector activity. The conclusions of its reports and studies are predetermined prior to any research being conducted. An Arizona State University report on the soundness of the research of Mackinac's academic studies over an 11 year period found that its work did "not represent genuine social science research" and its "research is often of low quality and because of this it should be treated with considerable skepticism by the public, policy makers and political leaders." It also said Mackinac is "systematically ignoring evidence that does not agree with its proposed solutions."

Those critiques could apply equally well to Mr. Brown's testimony. He was a bit careless in stating that Detroit pumps "as much as 700 million gallons of water per day through 3400 miles of transmission and distribution mains" when Detroit pumps as much as 1.1 billion gallons a day through 3900 miles of mains.

Of more substantive concern, his statement claims that Detroit is inefficient because it takes 3.5 employees to pump a million gallons of water. Since he uses an average day output of 673 million gallons, he is saying that it takes about 2,355 employees for our daily output. In fact the number is far less. Reviewing data from the time period when he published his conclusions for Mackinac, there were 851 employees involved in water production, including operations, maintenance, safety, security, engineering, meter operations, water quality staff, buildings and grounds and administration. Dividing the 851 employees by 673 equals 1.26 employees per million gallons, not 3.5.

Even using that as a measure against other utilities can be misleading. If we were to accept the rest of Mr. Brown's data, Detroit would be the most efficient of the utilities studied. But he did not report the numbers from which he made his calculations to determine the numbers in his tables, so it is not possible to determine whether other utilities, including privately owned ones,

have artificially lower employee numbers because they contract out some work and those employees are not counted as part of the utility workforce. No real foundation is provided for any of the tables in his testimony.

Some other questionable data in his tables include:

- A statement that DWSD has 113.5 customers per employee. Since he assumes about 2355 employees, that means we would have 267,292.5 customers. There is no clue even in his Mackinac article where this number came from; its just out there. Are these Detroit households, or Detroit and suburban households? Does it include commercial accounts? With over 4 million people in our service area, there are certainly a lot more households receiving Detroit water than the number projected by his figures. But since his employee number is off by a factor of three, the calculations and all of Table 1 are irrelevant.
- In Table 2, the testimony compares employees per connection and total operating expenses per collection. Again, with the wrong employee count this datum is useless. But how does this become a measure of efficiency anyways? "Connection" is not defined, but presumably it is each metered tap into a main that is part of the system. There is no data supplied as to what count is used; Detroit only or city and suburban? Are commercial connections included as well? Using his numbers of 8.8 employees per 1000 connections, he projects about 267, 614 connections. This number does not seem to be anywhere near realistic. It is likely to be at least four times higher.

If that is not enough, one must also ask how an undifferentiated count of connections makes sense, when connections can be 5/8" to 48." It takes over 6,000 household connections to equal the volume of a 48" connection. The capacity and costs of one is not comparable to the other.

It appears that Mr. Brown's use of this dubious standard was borrowed from a Reason Foundation study, which created the measure because there were too few useful criteria for comparisons between private and public water utilities. That does not, however, make it a viable comparison tool. Even the Reason Foundation, which also exists for the purpose of dismantling the public sector, regretted the limitations of its analytical tools. Mr. Brown and the Mackinac Center did not acknowledge the indirectness of the method of comparison. None of the persons involved in either report were water utility professionals.

Finally, I believe everyone on all sides of this question want to eliminate inefficiency at DWSD. The sloppy data and preconceived conclusions of Mr. Brown do not contribute to any solutions and should not be a factor when considering this legislation. Detroit supplies data to the bond rating agencies that data includes the number of employees, salaries, system performance, customer base, revenue collection, water leakage rates and other factors. The rating agencies are not primarily motivated by politics or ideology, but about the soundness of the DWSD system so that investors will make money. I think their hard-headed conclusions and very high

ratings are a more reliable gauge about DWSD's overall condition.

## The \$59 Million question

Another reason cited by supporters of HB 5788 for the takeover of the Detroit water and Sewerage system is the claim that the City has been indifferent to bill collections. Quite incorrectly, some in the press and public infer that the suburbs have paid higher rates to make up for slower collection in Detroit.

About \$27 million of the amount is from accounts from razed or abandoned residential and commercial property. Before leaving the property, previous owners did not pay their water bills. These former owners often left the City, beyond the reach of DWSD collection efforts.

The amount owed was kept on the books for years because the City never gave up on the idea that it might be possible to eventually recover the money. The idea that the unpaid bills on abandoned property would just be dismissed as bad debt was not considered good policy, as it could be construed as lax on deadbeats.

Press coverage that insinuated through quotes and text that suburban users made up the loss to DWSD from these debtors was unfounded and inflammatory. No evidence was offered to support such a conclusion. The City's insistence that this was untrue was buried near the end of the story. The statement that DWSD collected all but 9% of its revenue last year was also belittled and buried. The intent to now write off bad debt does not actually improve the financial situation. It may help us avoid press distortions in the future, however.

Of the remaining \$32 million, \$18 million was for bills one day to three months overdue. Some of those were undoubtedly paid by the time the article was printed.

The other \$14 million was for bills over three months old. Some of these would be disputed bills that are in the process of investigation and resolution, others have been sent shutoff notices. Some of the largest balances were recently reported on and paid this month. The bills in this category are considered collectible and will be pursued.

If the Detroit News story on this subject is distilled, Detroit had 9% of its revenue uncollected and Warren had 5% uncollected. Are they really that far apart? Does this difference even partly justify taking Detroit's property?

## Lost Water

Supporters of HB 5788 cite as a reason for their endorsement of the bill a Detroit News report about the system losing 17% of its water. Implied was the idea that it was due to leakage. As the article noted, the DWSD loss was not considered unusual for a system our size and age. Even the bible of water systems operators, titled Water Distribution System Operation and Maintenance, published by California State at Sacramento, says that some systems operators have "little concern until 20 percent of the water produced cannot be accounted for."

While that may sound like too much loss to ignore, the costs of aggressively tracing thousands of leaks and repairing them is more expensive for ratepayers. Further, in Detroit, a considerable amount is not necessarily lost to leakage.

Firefighting over a one year period can consume great amounts of unmetered water. Detroit has thousands of fires per year. Detroit residents benefit from this usage and pay that cost through water sent into the Detroit mains.

Also, construction, renovation and demolition of property is sometimes done with water drawn from hydrants, as only hydrants can supply the amount needed. The neighborhoods and City benefit from this usage and the Detroit fund pays for it.

It should be noted that Detroit has a crew that surveys every street in the City, checking through listening devices placed on every hydrant and gate valve for leak indications. They also use computer technology to pinpoint the precise location of leaks when conventional means fail to identify the location of the leak.

In summary, all of the reported loss is not waste but goes to community purposes, the City makes reasonable efforts to locate those leaks within its limits, but it is not cost effective to locate and repair every leak.



## Security

It has been charged that DWSD has not been attentive to security because of failures of a contractor to perform satisfactorily. The fact that DWSD Director Victor Mercado dropped this contractor and quickly replaced it with another company has not mollified some that want to dredge up issues from the first contractor.

I believe that DWSD has made reasonable efforts to anticipate concerns on this matter. Immediately after September 11, 2001, DWSD sent personnel to be present at all booster stations. The stations already have high fences with locked gates and alarmed doors. When DWSD could replace these employees with a contractor who did patrols, it probably represented more security than exists in most suburban systems.

It may be thought that a person could enter one of these facilities and easily contaminate the water. That is not so. We do not have open reservoirs like other big cities do. Further, all our treatment plants have gate guards 24 hours a day, seven days a week, with perimeter cameras and high security fences.

There have been no documented instances that I am aware of where our security system has failed our city or suburban customers. But all must realize that if they want considerably more security at the outlying stations, they must be willing to pay the costs that would be incurred.