



## 8.1 INTRODUCTION

The utility services of Mentor have developed with the city over the past 45 years. The majority of the city is served by all sanitary sewer, water, natural gas, electric, cable and telephone. The majority of the infrastructure is relatively new. Many of the larger infrastructure items such as sanitary sewer treatment and water treatment plants are also located in the City. With the large population, the city is in a good position to have the next greatest technology to be installed in their community first.

This section represents a general inventory of existing utility services in Mentor. The Capital Improvement Program (2009-2013) should be referenced for specific projects and associated timeframes and finances.

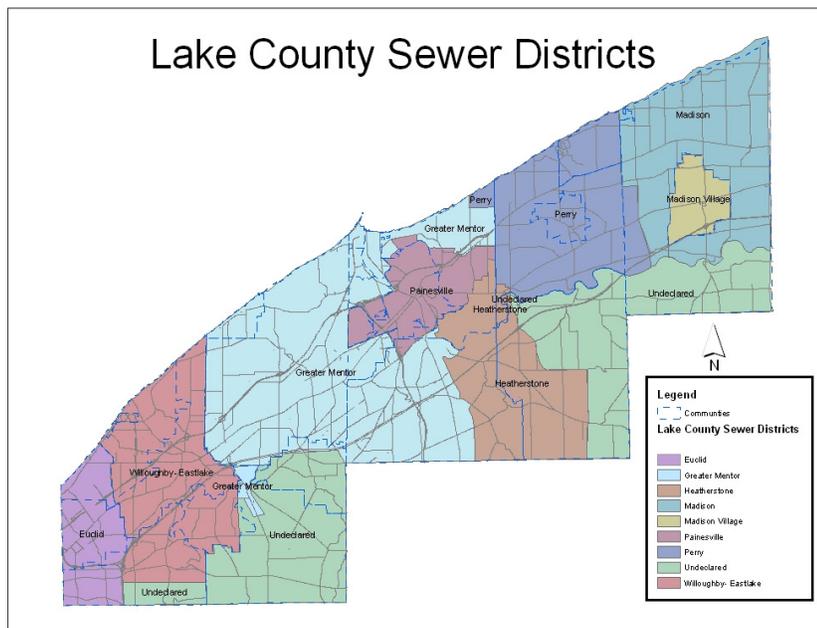
## 8.2 WATER SERVICE

Water is provided to the majority of residents through Aqua Ohio.

## 8.3 SEWER SERVICE

The sanitary sewer system is owned and operated by Lake County, and likewise serve the majority of the residents. Sewage is processed at the Gray Kron Wastewater Treatment Plant located on Lakeshore Blvd.

Mentor is located in the Greater Mentor Sewer District, which also serves Mentor-on-the-Lake, and parts of Concord Township, Kirtland, and Painesville Township.



## **8.4 ELECTRICAL SERVICE**

First Energy (formerly CEI) provides electrical service to the entire city.

Most electric utility lines in the city are above ground, strung on poles placed in the public right-of-way. Utility lines are buried in the newest subdivisions. Undergrounding existing utility lines is expensive. Nonetheless, the city should work towards a long-term goal of placing all utility lines underground. New electrical substations should be carefully placed, well-designed, and screened so they are visually unobtrusive.

## **8.5 NATURAL GAS**

Natural gas has been extended to most new subdivisions since 1967 and all industrial subdivisions. 86.4% of the homes in Mentor are heated by natural gas. Natural gas is provided by Dominion East Ohio and Orwell Natural Gas

## **8.6 TELEPHONE / DSL**

Telephone service in Mentor is provided by AT&T. DSL broadband Internet service is available in much of the city. Service availability depends on proximity to central switching offices.

Telephone lines are above ground in parts of the city where electrical lines are also above ground.

## **8.7 CABLE TELEVISION / CABLE BROADBAND**

Cable and digital cable television is available for all of Mentor and is provided by Time Warner. Mentor has access to three public access channels that allow the city and the schools an additional method of communicating with citizens. High Speed internet is also provided by Time Warner. Cable lines are above ground in parts of the city where electrical lines are also above ground.

AT&T is currently providing U-verse to a limited area in Mentor. U-verse TV is AT&T's television service which is 100-percent digital television. The service uses Internet Protocol (IP)-based video service. U-verse delivers its digital television services to its customers via phone lines or over cable using Internet protocol ([IPTV](#) - Internet Protocol TV).

The Ohio Municipal League is suggesting that cities install 1.5 inch conduits along their major road arterials and industrial corridors in order to make the installation of fiber optic lines easier. Fiber optic lines could provide extremely high volume electric communications for the City and could be an economic development tool in the future. Mentor is in the beginning stages of this project. The Mentor Capital Improvements Plan indicated the planning, engineering, and construction of the 1.5 inch conduit.

As noted in Chapter 9, the City should also consider select 'hot spot' areas of the community for wireless internet access. If successful, and feasible, wireless internet service could be extended throughout the City.

## 8.8 STORMWATER MANAGEMENT

The City of Mentor drains primarily to Lake Erie with two exceptions. About 25% of the city in the southwest corner lies within the Chagrin River watershed. About 3% of the city in the southeast corner lies within the Grand River watershed. Each of these sub watersheds is comprised of local watersheds that drain into ditches and creeks. Mentor is 28.4 square miles in area and is urban in nature. Its infrastructure provides both sanitary and storm water service. There are a small number of home sewage treatment systems, or septic systems, in the city. Retention and/or detention basins have been required in new developments for many years to control increased storm water runoff.

In 2002 Ohio EPA's Stormwater Phase II Rule established a storm water management program that is intended to improve the Nation's waterways by reducing the quantity of pollutants that storm water picks up and carries into storm sewer systems during storm events. The first permit term for the Phase II program ran from December 2002 until December 2007 (NPDES Permit No.: OHQ000001).

Mentor City Council formally approved the city's Stormwater Management Plan on March 4, 2003. The Engineering Department and the Public Works Department currently address storm water issues within the city under Article III, Section 3.06 of the Charter. Recent improvements to the storm sewer system have relieved flooding problems and minimized inconveniences.

The new permit for next 5 years runs from January 2009 through January 2014 (NPDES Permit No.: OHQ000002). The City of Mentor is considered a regulated community under the Phase II program and has designed a Storm Water Program Plan and has been implementing it since 2005. The plan is focused around six elements or minimum control measures (MCM), with the goal to reduce the discharge of pollutants, protect water quality, and satisfy the appropriate water quality requirements of the Clean Water Act.

The Stormwater Program Minimum Control Measures include the following.

1. *Public Education and Outreach:* Distributing educational materials and performing outreach to inform citizens about the impacts polluted stormwater runoff discharges can have on water quality.
2. *Public Participation and Involvement:* Providing opportunities for citizens to participate in program development and implementation, including effectively publicizing public hearings and/or encouraging citizen representatives on a stormwater management panel.
3. *Illicit Discharge, Detection and Elimination:* Developing and implementing a plan to detect and eliminate illicit discharges to the storm sewer system that includes developing a system map and informing the community about hazards associated with illegal discharges and improper disposal of waste.
4. *Construction Site Runoff:* Developing, implementing, and enforcing an erosion and sediment control program for construction activities that disturb 1 or more acres of land.
5. *Post-Construction Runoff Control:* Developing, implementing, and enforcing a program to address discharges of post-construction storm water runoff from new development and redevelopment areas. Applicable controls could include preventative actions such as protecting sensitive areas or the use of structural BMPs such as grassed swales or porous pavement.

6. *Pollution Prevention and Good Housekeeping*: Developing and implementing a program with the goal of preventing or reducing pollutant runoff from municipal operations. The program must include municipal staff training on pollution prevention measures and techniques.

At this time the City is working to update the Erosion and Sediment Control Ordinance - Chapter 1353, and is working to enact a Comprehensive Storm Water Management Ordinance and a Riparian Setback Zoning Ordinance in accordance with its Storm Water Program Plan. The City of Mentor will continue to implement its Stormwater Program Plan and make necessary updates to meet the requirements of the new permit over the next 5 years of the permit term.

## 8.9 GOALS

### GOAL 1

*“MANAGE THE IMPACTS OF DEVELOPMENT UPON THE NATURAL AND MAN-MADE STORMWATER MANAGEMENT INFRASTRUCTURE SYSTEM.”*

#### Policies:

- A. Require that all new development be designed and constructed in a manner which minimizes and controls stormwater impacts on adjacent properties.
- B. Encourage the construction of stormwater management facilities which serve multiple developments wherever possible.
- C. Ensure that the City of Mentor shall have the right of access to perform cleaning/repair/improvement upon every major drainage facility which has significant implications for downstream watershed conditions.
- D. Ensure that responsibility for the long-term maintenance of stormwater management facilities be clearly assigned and accepted as part of council’s approval of a subdivision.

### GOAL 2

*“IMPROVE SANITARY SEWER SYSTEM IN THE FRENCH HOLLOW SUBDIVISION AREA WHERE A HIGH CONCENTRATION OF SEPTIC SYSTEMS EXISTS.”*

### GOAL 3

*“PLACE ALL UTILITY LINES UNDERGROUND”*

### GOAL 4

*“INSTALL 1.5” CONDUIT ALONG MAJOR ROADS AND COMMERCIAL/INDUSTRIAL ZONES TO PROVIDE EASY INSTALLATION OF FIBER OPTICS AND OTHER TECHNOLOGIES.”*