

# BEST OF BLOOMINGTON WATER QUALITY REPORT

2024 TEST RESULTS REPORTED JUNE 2025



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## KEEPING DRINKING WATER SAFE

This Water Quality Report is created to advance residents' understanding of drinking water and heighten awareness of the need to protect precious water resources. This report includes information about water sources, water treatment, the City's water system and topics that address frequently asked questions.

See Page 4 for the results of water quality monitoring on Bloomington's water sources from January 1 to December 31, 2024.

## GET INVOLVED

Public Works welcomes input on water quality issues. Contact the water quality supervisor at 952-563-4904.

If you have questions about your water or need assistance, call or visit the City's website at [blm.mn/utilities](http://blm.mn/utilities) or call the Water Plant (24 hours a day) 952-563-4905.

Este informe contiene información muy importante. Si necesita una traducción del mismo, sírvase llamar al MN RELAY 711. Warbixintaan waxaa ku jira macluumaad aad muhiim u ah. Haddii aad u baahan tahay in lagu turjumo, fadlan la xirii MN RELAY 711. Ban bao cao nay co cac thong tin rat quan trong. Neu quy vi can ban dich tieng Viet, xin goi so MN RELAY 711

## RAISE A GLASS! BLOOMINGTON TAP WATER REIGNS SUPREME IN MINNESOTA

Bloomington's tap water was crowned "Best in Glass" last fall after a statewide taste test hosted by the Minnesota Section of the American Water Works Association. This is the third time Bloomington has earned recognition for having the best tasting tap water in Minnesota. Judged on taste, color, odor and mouthfeel, Bloomington's water stood out in a blind taste test against 17 other cities. Next up, Bloomington will represent Minnesota at the national competition in Denver this month—so stay tuned for the results.



## EPA'S FINAL RULE ON LEAD AND COPPER REGULATION IMPROVEMENTS

In 1986, the federal government prohibited the installation of lead pipes in public water systems. Since 1991, the Environmental Protection Agency (EPA) has regulated lead and copper in drinking water. In October 2024, the EPA issued an updated final rule, known as the lead and copper rule improvements, requiring drinking water systems nationwide to identify and replace lead pipes within 10 years. The new rule mandates more rigorous water testing and calls for proactive community measures to safeguard residents from lead exposure. Additionally, it enhances public communication, ensuring communities are informed about lead risks in drinking water, the locations of lead pipes and plans for their replacement.

### BLOOMINGTON'S PROACTIVE MEASURES

Since 1960, Bloomington's City Code has mandated the use of copper-only pipes for water service lines under two inches and cast iron for larger lines. As a result, the City has no identified lead water service pipes or galvanized pipes requiring replacement and is not required to replace any water service lines.

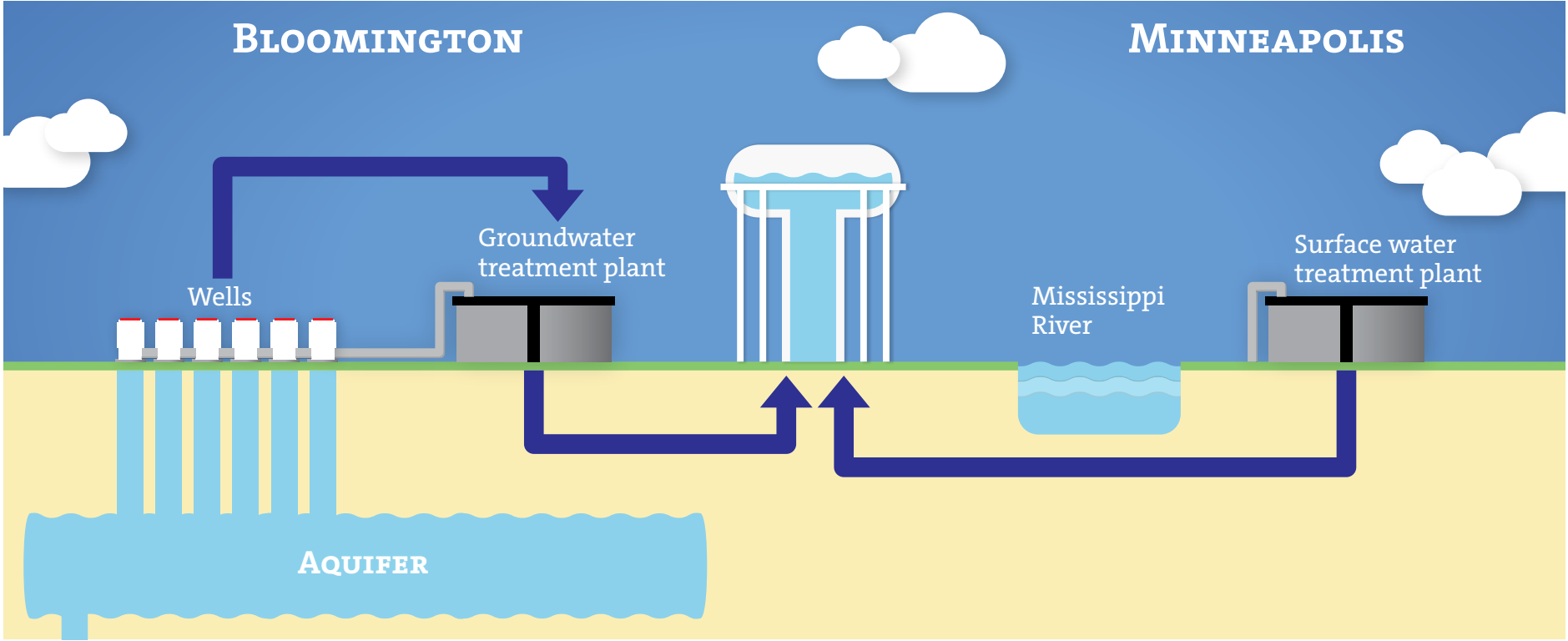
In 2024, Bloomington's Public Works Utilities completed an inventory of lead service lines, confirming that none exist within the City's distribution infrastructure. The Minnesota Department of Health (MDH) verified and approved this inventory, which is publicly accessible through the MDH/University of Minnesota Lead Inventory Tracking Tool at [maps.umn.edu/LSL](http://maps.umn.edu/LSL).

The City continues to implement water treatment technologies to prevent lead from leaching into drinking water from private plumbing and fixtures. Decades ago, Bloomington collaborated with MDH to develop an optimal corrosion control treatment that promotes a "scaling effect," forming a natural mineral layer inside pipes. This barrier helps prevent lead contamination. Investments in such treatment technologies have ensured Bloomington maintains excellent water quality while adhering to all federal and state regulations.

### UNDERSTANDING LEAD EXPOSURE

Lead is a toxic metal that can impair brain development in children and affect kidney function. It can also interfere with red blood cell production, which is essential for oxygen transport in the body. Although lead is not present in water leaving the treatment plant, it can enter drinking water through residential pipes and fixtures. For more information, contact the Safe Drinking Water Hotline at 1-800-426-4791 or visit [epa.gov/safewater/lead](http://epa.gov/safewater/lead).

# TAP WATER SOURCES



## WELLS

Bloomington's water treatment plant draws water from deep groundwater wells that extend into the Jordan Sandstone, Prairie du Chien Group and Tunnel City-Wonewoc Sandstone aquifers.

## MISSISSIPPI RIVER

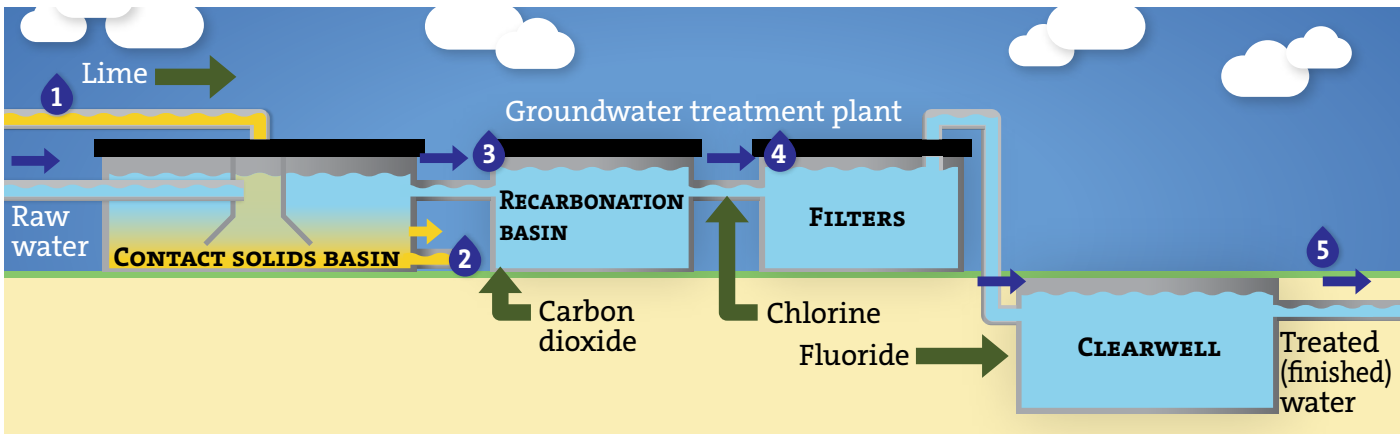
To supplement production at the water treatment plant, Bloomington purchases finished water from Minneapolis' surface water treatment plant, which takes raw water from the Mississippi River. Treated water from Bloomington's plant is blended with similarly treated water from Minneapolis.

FOR MORE INFORMATION ABOUT WATER SOURCES, VISIT [BLM.MN/WATER](http://blm.mn/water).

### BLOOMINGTON'S WATER SUPPLY

The City of Bloomington's municipal water supply comes from two sources: Bloomington municipal groundwater wells and a connection with Minneapolis' water supply system. For more information about water sources, visit [blm.mn/water](http://blm.mn/water).

# WATER TREATMENT PROCESS



## WATER TESTING

The Tri-City William Lloyd Analytical Laboratory is certified by the Minnesota Department of Health to test water. In 2024, the lab performed more than 9,211 tests on Bloomington's well, raw, finished and distribution water. The lab also analyzed 105 samples for new water main construction projects and conducted 385 water quality tests on Bloomington's surface water bodies.

## THE COST OF SAFE DRINKING WATER

Keeping Bloomington's water safe is the primary focus for the City's Utilities Division. And so is using taxpayer dollars wisely. Here is a breakdown of how funds are used to ensure safe drinking water.



1

The softening process begins when slaked quicklime is mixed with raw water in one of the City's two solids contact basins. Each basin holds 550,000 gallons of water.

2

The lime-and-water mixture causes a chemical reaction that creates calcium and magnesium, two main components of hardness, to form insoluble particles called floc. Floc particles settle to the bottom of the basins and are removed, dewatered and used by Minnesota farmers as a USDA-approved source of lime to stabilize the pH in farm fields.

3

The water enters a recarbonation basin where it is adjusted to the proper pH by adding carbon dioxide. A precise amount of chlorine is added to discourage bacterial growth as the water travels through the City's distribution system.

4

The water is filtered to remove any remaining particles, then enters an underground reservoir called a clearwell where small quantities of fluoride are added. Because fluoride promotes strong teeth and bones, fluoridation is mandated by state law at a dosage between 0.5 and 0.9 parts per million.

5

Finished water from the City's treatment plant is pumped into the distribution system, where it is mixed with treated water purchased from the city of Minneapolis. For more information, visit [blm.mn/water](http://blm.mn/water).



# FREQUENTLY ASKED QUESTIONS



## How much water does Bloomington use?

In 2024, 26,097 residential, commercial and multi-family customers were served 3.5 billion gallons of clean water. That's 9.45 million gallons of clean water daily.



## Should I have a water softener?

Great news! Bloomington is one of just 24 municipal utilities in Minnesota that provide softened water, eliminating the need for homeowners to install their own water-softening systems.

Through the City's lime-softening process, water hardness is significantly reduced—from 19 grains per gallon to approximately 5.2 grains per gallon. Additionally, the water is treated to be noncorrosive, helping to prevent harmful levels of lead and copper from leaching into home plumbing.

For comparison, the cost of home water softening ranges from \$5.37 to \$6.11 per 1,000 gallons, whereas City-treated water in 2024 costs just \$5.02 per 1,000 gallons.



## Is Bloomington water safe if I have a compromised immune system?

Bloomington's water is safe for nearly everyone. However, individuals with weakened immune systems—such as those undergoing chemotherapy, with an organ transplant, or with HIV/AIDS or other immune disorders—may be more vulnerable to contaminants in drinking water. These individuals should consult their healthcare providers for guidance on drinking water safety.

For additional precautions and guidelines to reduce the risk of infection from Cryptosporidium and other microbial contaminants, the Environmental Protection Agency and the Centers for Disease Control provide resources through the Safe Drinking Water Hotline at 1-800-426-4791.



## Why is the water out of my faucet cloudy?

Cloudy water from your faucet is typically caused by oxygen or calcium, both of which are completely safe to drink.

- Oxygen: Changes in temperature and pressure can cause excess oxygen in the water, making it appear cloudy. This is harmless, and no action is needed.
- Calcium: Water treatment efforts to reduce corrosion and lead or copper leaching can sometimes result in trace amounts of calcium sediment. This appears as white or grayish flecks in cold water, which usually settle within 30 minutes. Calcium is safe for drinking and cooking.

To help draw clear water through your system and flush out any remaining calcium, allow an hour or two for the water to settle or open a large faucet and run cold water for about 20 minutes.



## Is water that tastes or smells funny, safe to drink?

Yes, water that tastes or smells funny can still be safe to drink. The earthy, fishy, musty or grassy odors and tastes you might notice—especially when Bloomington supplements its supply with water from Minneapolis—are typically caused by naturally occurring organic matter in surface water. While these smells and tastes can be unpleasant, they do not pose health risks. If you're ever concerned about the safety of your water, you can contact your local water utility for testing and further information.



## How do I build a career in the water industry?

Careers in the water industry are in high demand due to the essential role of clean, safe drinking water. Water environment technology professionals have higher placement rates than many other occupations, with opportunities available in both the public and private sectors.

To explore career opportunities, visit the American Water Works Association Minnesota Section's website at [blm.mn/watercareers](http://blm.mn/watercareers).



# 2024 WATER QUALITY RESULTS

The Minnesota Department of Health and City staff regularly test samples of Bloomington’s water for contaminants. Substances detected appear in the table below. Undetected substances are not listed and unregulated contaminants are only listed if federal health risk limits are exceeded. The top half of the table summarizes test results performed on Bloomington water. The lower half presents results for Minneapolis water which is blended into Bloomington’s distribution system. Information on Bloomington’s Source Water Assessment can be found at blm.mn/swa or by calling the MDH at 651-201-4700 or 1-888-345-0823.

## BLOOMINGTON

| LEAD AND COPPER - TESTED AT CUSTOMER TAPS        |                         |                                    |                              |                                  |                                |           |                                  |
|--|-------------------------|------------------------------------|------------------------------|----------------------------------|--------------------------------|-----------|----------------------------------|
| Contaminant (date, if sampled in previous years) | EPA's ideal goal (MCLG) | EPA's action level                 | 90% ofresults were less than | Number of homes with high levels | Range of detected test results | Violation | Typical sources                  |
| Lead (07/24/23)                                  | 0 ppb                   | 90% of homes are less than 15 ppb  | 1.9 ppb                      | 0 out of 30                      | 0 - 3.2 ppb                    | NO        | Corrosion of household plumbing. |
| Copper (07/24/23)                                | 0 ppm                   | 90% of homes are less than 1.3 ppm | 0.02 ppm                     | 0 out of 30                      | 0 - 0.02 ppm                   | NO        | Corrosion of household plumbing. |

| CONTAMINANTS RELATED TO DISINFECTION – TESTED IN DRINKING WATER |                                  |                           |   |                                |           |  |
|---|----------------------------------|---------------------------|---|--------------------------------|-----------|--|
| Substance (date, if sampled in previous years)                  | EPA's ideal goal (MCLG or MRDLG) | EPA's limit (MCL or MRDL) | Highest average or highest single test result | Range of detected test results | Violation | Typical sources                            |
| Total Trihalomethanes (TTHM's)                                  | NA                               | 80 ppb                    | 32.1 ppb                                      | 4.3 – 71.8 ppb                 | NO        | By-product of drinking water disinfection. |
| Total Haloacetic Acids (HAA)<br>Total HAA refers to HAA5        | NA                               | 60 ppb                    | 26.1 ppb                                      | 4.8 - 54.6 ppb                 | NO        | By-product of drinking water disinfection. |
| Total Chlorine  | 4.0 ppm                          | 4.0 ppm                   | 1.91 ppm                                      | 1.4 - 2.26 ppm                 | NO        | Water additive used to control microbes.   |

| OTHER SUBSTANCES – TESTED IN DRINKING WATER    |                         |                   |   |                                |           |  |
|--|-------------------------|-------------------|---|--------------------------------|-----------|--|
| Substance (Date, if sampled in previous years) | EPA's ideal goal (MCLG) | EPA's limit (MCL) | Highest average or highest single test result | Range of detected test results | Violation | Typical sources  |
| Fluoride**                                     | 4.0 ppm                 | 4.0 ppm           | 0.7 ppm                                       | 0.57 – 0.72 ppm                | NO        | Erosion of natural deposits; Water additive to promote strong teeth. |

| OTHER SUBSTANCES – TESTED IN DRINKING WATER |                  |   |                                |
|---|------------------|---|--------------------------------|
| Contaminant                                 | Comparison value | Highest average or highest single test result | Range of detected test results |
| Sodium*                                     | 20 ppm           | 6.66 ppm                                      | NA                             |
| Sulfate                                     | 500 ppm          | 20.5 ppm                                      | NA                             |
| Perfluorobutanoic acid (PFBA) (2022)        | 7000 ppt         | 8.7 ppt                                       | 0.00 - 8.7 ppt                 |

\*Note that home water softening can increase the level of sodium in your water.

## MINNEAPOLIS

| LEAD AND COPPER - TESTED AT CUSTOMER TAPS        |                         |                                    |                               |                                  |   |           |                                  |
|--|-------------------------|------------------------------------|-------------------------------|----------------------------------|---|-----------|----------------------------------|
| Contaminant (date, if sampled in previous years) | EPA's ideal goal (MCLG) | EPA's action level                 | 90% of results were less than | Number of homes with high levels | Range of detected test results            | Violation | Typical sources                  |
| Lead (08/15/24)                                  | 0 ppb                   | 90% of homes are less than 15 ppb  | 2 ppb                         | 1 out of 67*                     | <1.0 – 4.0 ppb, one result of 133000 ppb* | NO        | Corrosion of household plumbing. |
| Copper (08/15/24)                                | 0 ppm                   | 90% of homes are less than 1.3 ppm | 0.07 ppm                      | 1 out of 67*                     | <0.02 – 0.12 ppm, one result of 1.48 ppm* | NO        | Corrosion of household plumbing. |

\*Follow up sampling for the single highest result showed lead levels below 2ppb and copper levels below 0.07ppm.

| INORGANIC AND ORGANIC CONTAMINANTS – TESTED IN DRINKING WATER. |                         |                   |   |                                |           |  |
|--|-------------------------|-------------------|---|--------------------------------|-----------|--|
| Substance (date, if sampled in previous years)                 | EPA's ideal goal (MCLG) | EPA's limit (MCL) | Highest average or highest single test result | Range of detected test results | Violation | Typical sources  |
| Nitrate  | 10 ppm                  | 10 ppm            | 0.86 ppm                                      | 0.72 – 0.86 ppm                | NO        | Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits. |

| CONTAMINANTS RELATED TO DISINFECTION – TESTED IN DRINKING WATER |                                  |                           |   |                                |           |  |
|---|----------------------------------|---------------------------|---|--------------------------------|-----------|--|
| Substance (date, if sampled in previous years)                  | EPA's ideal goal (MCLG or MRDLG) | EPA's limit (MCL or MRDL) | Highest average or highest single test result | Range of detected test results | Violation | Typical sources                            |
| Total Trihalomethanes (TTHM's)                                  | NA                               | 80 ppb                    | 36.7 ppb                                      | 10.0 – 58.3 ppb                | NO        | By-product of drinking water disinfection. |
| Toal Haloacetic Acids (HAA)<br>Total HAA refers to HAA5         | NA                               | 60 ppb                    | 24.1 ppb                                      | 1.0 – 39.0 ppb                 | NO        | By-product of drinking water disinfection. |
| Chloramine  | 4.0 ppm                          | 4.0 ppm                   | 3.33 ppm                                      | 2.8 – 3.7 ppm                  | NO        | Water additive used to control microbes.   |

| OTHER SUBSTANCES – TESTED IN DRINKING WATER    |                         |                   |   |                                |           |  |
|--|-------------------------|-------------------|---|--------------------------------|-----------|--|
| Substance (date, if sampled in previous years) | EPA's ideal goal (MCLG) | EPA's limit (MCL) | Highest average or highest single test result | Range of detected test results | Violation | Typical sources  |
| Fluoride**                                     | 4.0 ppm                 | 4.0 ppm           | 0.7 ppm                                       | 0.66 – 0.71 ppm                | NO        | Erosion of natural deposits; Water additive to promote strong teeth. |

| OTHER SUBSTANCES – TESTED IN DRINKING WATER |                  |   |                                |
|---|------------------|---|--------------------------------|
| Contaminant                                 | Comparison value | Highest average or highest single test result | Range of detected test results |
| Sodium*                                     | 20 ppm           | 18.7 ppm                                      | NA                             |
| Sulfate                                     | 500 ppm          | 27.3 ppm                                      | NA                             |
| Perfluorobutanoic acid (PFBA)               | 7000 ppt         | 10.12 ppt                                     | 7.43-12 ppt                    |
| Perfluorohexanoic acid (PFHxA) (2021)       | 200 ppt          | 1 ppt   | 0.0 – 1.0 ppt                  |
| Perfluoropentanoic acid (PFPeA) (2021)      | NA               | 1 ppt   | 0.0 – 1.0 ppt                  |

\*Sodium levels change seasonally based on river conditions. People on a sodium – restricted diet should be aware of the sodium level in their drinking water.

| DISINFECTION BYPRODUCT INDICATOR – TESTED IN SOURCE WATER AND IN DRINKING WATER |                  |                                   |                                     |           |                 |
|---|------------------|-----------------------------------|-------------------------------------|-----------|-----------------|
| Substance   | Removal required | Range of percent removal achieved | Average of percent removal achieved | Violation | Typical sources |
| Total Organic Carbon  | Variable         | 54 – 63                           | 59                                  | NO        | NA              |

The percentage of Total Organic Carbon (TOC) removal was measured each month. The system met all TOC removal requirements, unless there is a “YES” in the violation column.

| TREATMENT INDICATOR – TESTED DURING TREATMENT |                     |   |                     |           |                 |
|---|---------------------|---|---------------------|-----------|-----------------|
| Substance                                     | Removal Required    | Lowest monthly percent of results in compliance | Highest test result | Violation | Typical rources |
| Turbidity                                     | Treatment technique | 100   | 0.11 NTU            | NO        | Soil runoff     |

### \*\*POTENTIAL HEALTH EFFECTS AND CORRECTIVE ACTIONS (IF APPLICABLE)

Fluoride is nature's cavity fighter, with small amounts present naturally in many drinking water sources. There is an overwhelming weight of credible, peer-reviewed, scientific evidence that fluoridation reduces tooth decay and cavities in children and adults, even when there is availability of fluoride from other sources, such as fluoride toothpaste and mouth rinses. Since studies show that optimal fluoride levels in drinking water benefit public health, municipal community water systems adjust the level of fluoride in the water to an optimal concentration between 0.5 to 0.9 parts per million (ppm) to protect your teeth. Fluoride levels below 2.0 ppm are not expected to increase the risk of a cosmetic condition known as enamel fluorosis.

### KEY

|             |   |              |  |            |  |
|-------------|---|--------------|--|------------|--|
| <i>AL</i>   | <b>Action level.</b> An amount that, if exceeded, triggers a specific response that a water system must follow.   | <i>MRDLG</i> | <b>Maximum residual disinfectant level goal.</b>   | <i>R</i>   | <b>Regulated.</b>  |
| <i>cfu</i>  | <b>Colony forming unit.</b>   | <i>NA</i>    | <b>Not applicable.</b>   | <i>TT</i>  | <b>Treatment technique.</b> Routine and repeat samples are total coliform-positive and either is E. coli positive or system fails to take repeat samples following E. coli-positive routine sample or system fails to analyze total coliform-positive repeat sample for E. coli. |
| <i>MCL</i>  | <b>Maximum contaminant level.</b> The highest level allowed in drinking water. MCLs are set as close to MCLG as feasible using the best available treatment technology. | <i>nd</i>    | <b>No detection.</b>   | <i>U</i>   | <b>Unregulated,</b> but monitoring is required by the State of Minnesota. No limits have been set for this compound.   |
| <i>MCLG</i> | <b>Maximum contaminant level goal.</b> Below this level there is no known or expected health risk. MCLGs allow for a margin of safety.                                  | <i>NTU</i>   | <b>Nephelometric turbidity unit.</b> A measure of water clarity.                                     | <i>90%</i> | <b>Value obtained after disregarding the 10 percent of the samples taken that had the highest levels.</b>  |
| <i>MRDL</i> | <b>Maximum residual disinfectant level.</b>   | <i>ppb</i>   | <b>Parts per billion.</b> Units of a substance, in pure form, found in every billion units of water. |            |  |
|             |   | <i>ppm</i>   | <b>Parts per million.</b> Units of a substance, in pure form, found in every million units of water. |            |  |