

Village of Streamwood

Annual Drinking Water Quality Report

January 1 to December 31, 2016
Streamwood, IL PWS ID#: 0313060

This year as in years past, your tap water met all USEPA and state drinking water health standards. This report summarizes the quality that was provided last year, including details about the water source, what the water contains and how it compares to the standards set by regulatory agencies. **We are pleased to report that Streamwood had no violations** of a contaminant level or of any other water quality standard.

Este informe contiene informacion muy importante sobre el agua que usted bebe. Traduscalo o hable con alguien que lo entienda bien.

We want our valued customers to be informed about their water quality. If you would like to learn more, please feel welcome to attend any of our regularly scheduled meetings. Board meetings are normally the first and third Thursday of each month. See www.streamwood.org for meeting times. For more information regarding this report, contact Water Department Operator Tom Salzmann at (630) 736-3850. The source water assessment for our supply has been completed by the Illinois EPA (IEPA). If you would like a copy of this information, please stop by Public Works or call the water operator at (630) 736-3850. To view a summary version of the completed Source Water Assessments, including: Importance of Source Water; Susceptibility to Contamination Determination; and documentation/recommendation of Source Water Protection Efforts, you may access the IEPA website at dataservices.epa.illinois.gov/swap/factsheet.aspx.

SOURCE OF DRINKING WATER

The source of drinking water used by Streamwood is purchased surface water from the City of Chicago (Lake Michigan). The City of Chicago utilizes Lake Michigan as its source water via two water treatment plants. The Jardine Water Purification Plant serves the northern areas of the City and suburbs, while the South Water Purification Plant serves the southern areas of the City and suburbs. Lake Michigan is the only Great Lake that is entirely contained within the United States. It borders Illinois, Indiana, Michigan, and Wisconsin, and is the second largest Great Lake by volume with 1,180 cubic miles of water and third largest by area. The sources of drinking water (both tap water and bottled water) include rivers, lakes, streams, ponds, reservoirs, springs, and wells. As water travels over the surface of the land or through the ground, it dissolves naturally-occurring minerals and radioactive material, and can pick up substances resulting from the presence of animals or from human activity. Possible contaminants that may be present in source water include:

- Microbial contaminants, such as viruses and bacteria, which may come from sewage treatment plants, septic systems, agricultural livestock operations, and wildlife.
- Inorganic contaminants, such as salts and metals, which can be naturally-occurring or result from urban storm water runoff, industrial or domestic wastewater discharges, oil and gas production, mining, or farming.
- Pesticides and herbicides, which may come from a variety of sources such as agriculture, urban storm water runoff, and residential uses.

- Organic chemical contaminants, including synthetic and volatile organic chemicals, which are by-products of industrial processes and petroleum production, and can also, come from gas stations, urban storm water runoff, and septic systems.
- Radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

In order to ensure that tap water is safe to drink, the USEPA prescribes regulations which limit the amount of certain contaminants in water provided by public water systems. FDA regulations establish limits for contaminants in bottled water which must provide the same protection for public health. Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of some contaminants. The presence of contaminants does not necessarily indicate that water poses a health risk. Some people may be more vulnerable to contaminants in drinking water than the general population. Immuno-compromised persons such as persons with cancer undergoing chemotherapy, persons who have undergone organ transplants, people with HIV/AIDS or other immune system disorders, some elderly and infants can be particularly at risk from infections. These people should seek advice about drinking water from their health care providers. USEPA/CDC guidelines on appropriate means to lessen the risk of infection by Cryptosporidium and other microbial contaminants and their health effects are available from the USEPA's Safe Drinking Water Hotline ((800) 426-4791).

The Village maintains ground water wells for emergency backup purposes. These wells are exercised on a monthly basis and water samples are taken to meet IEPA quality standards. **Activation of the emergency wells was not required in 2016.**

SUSCEPTIBILITY TO CONTAMINATION AND SOURCE WATER ASSESSMENT

The IEPA considers all surface water sources of community water supply to be susceptible to potential pollution problems. The very nature of surface water allows contaminants to migrate into the intake with no protection only dilution. This is the reason for mandatory treatment for all surface water supplies in Illinois. Chicago's offshore intakes are located at a distance that shoreline impacts are not usually considered a factor on water quality. At certain times of the year, however, the potential for contamination exists due to wet-weather flows and river reversals. In addition, the placement of the crib structures may serve to attract waterfowl, gulls and terns that frequent the Great Lakes area, thereby concentrating fecal deposits at the intake and thus compromising the source water quality. Conversely, the shore intakes are highly susceptible to storm water runoff, marinas and shoreline point sources due to the influx of groundwater to the lake. The source water assessment for our supply purchased from the City of Chicago has been completed by the IEPA. If you would like a copy of this information please visit the Public Works Department at 565 S. Bartlett Rd. or call the Water Department at (630) 736-3850 or City of Chicago Department of Water Management (CDWM) at (312) 744-6635. Information is also available on the IEPA website at www.epa.illinois.gov/topics/water-quality/swap/index and then by clicking on Source Water Assessment Fact Sheet.

Source Water Information

Source Water Name

REPORT STATUS, TYPE OF WATER, LOCATION

INTAKE (00104) JARDINE SHORE INTAKE; LAKE MICHIGAN WATER; SW

INTAKE (00105) SOUTH PLANT SHORE; LAKE MICHIGAN WATER; SW

INTAKE (01305) DUNNE INTAKE CRIB; LAKE MICHIGAN WATER; SW; SOUTH PLANT 68TH ST.

INTAKE (01306) JARDINE DEVER INTAKE; LAKE MICHIGAN WATER; SW

WATER QUALITY TEST RESULTS NOTES

Definitions	The succeeding tables contain scientific terms and measures, some of which may require explanation.
Maximum Contaminant Level Goal (MCLG):	The level of a contaminant in drinking water below which there is no known or expected risk to health. MCLGs allow for a margin of safety.
Maximum Contaminant Level (MCL):	The highest level of a contaminant that is allowed in drinking water. MCLs are set as close to the MCLGs as feasible using the best available treatment technology.
Maximum Residual Disinfectant Level Goal (MRDLG):	The level of a drinking water disinfectant below which there is no known or expected risk to health. MRDLGs do not reflect the benefits of the use of disinfectants to control microbial contaminants.
Maximum Residual Disinfectant Level (MRDL):	The highest level of a disinfectant allowed in drinking water. There is convincing evidence that addition of a disinfectant is necessary for control of microbial contaminants.
Action Level (AL)	The concentration of a contaminant which, if exceeded, triggers treatment or other requirements which a water system must follow.
Treatment Technique (TT)	A required process intended to reduce the level of a contaminant in drinking water.
Level Detected	This column represents an average of sample result data collected during Consumer Confidence Report (CCR) calendar year. For well samples it may represent the highest level as often a single sample was collected.
Range of Detections	This column represents a range of individual sample results from lowest to highest that were collected during the CCR calendar year.
% pos/mo	Percent positive samples per month.
Abbreviations	The succeeding tables contain scientific terms and measures, some of which have been abbreviated.
AL	Action Level: The concentration of a contaminant which if exceeded triggers treatment or other requirements which a water system must follow.
ppm:	Milligrams per liter or parts per million – or one ounce in 7,350 gallons of water.
ppb:	Micrograms per liter of parts per billion – or one ounce in 7,350,000 gallons of water.
ppt:	Micrograms per liter of parts per trillion – or one ounce in 7,350,000,000 gallons of water
ND:	Not Detectable at testing limits
NA:	Not applicable.
Avg:	Regulatory compliance with some MCLs are based on running annual average of monthly samples.
%≤0.3 NTU	Percent of samples less than or equal to 0.3 NTU
NTU (Nephelometric Turbidity Units)	A measure of clarity.
pCi/L or picocuries per liter	A measure of radioactivity.
Date of Sample	If a date appears in this column that is not the Consumer Confidence Report (CCR) reporting year, the Illinois EPA requires monitoring for this contaminant less than once per year because the concentrations do not frequently change. If year sampled is previous calendar year then monitoring for this contaminant was conducted during the attached CCR reporting year.

2016 Regulated Contaminants Detected: Streamwood

Contaminant	Unit	Year Sampled	MCLG Health Goal	MCL USEPA's Limits	Level Detected	Range Detected	Violation	Typical Source
Microbial Contaminants								
Total Coliform Bacteria	% pos/month	2016	0%	5%	0%	NA	NO	Naturally present in the environment
Disinfectants and Disinfection By-Products								
Chlorine	ppm	2016	MRDLG=4	MRDL=4	0.7	0.6-0.8	NO	Water additive to control microbes
Haloacetic Acids (HAAs)	ppb	2016	NA	60	17	6.31-24.1	NO	By-product of drinking water disinfection
Total Trihalomethanes (TTHMs)	ppb	2016	NA	80	37	16.52-56.9	NO	By-product of drinking water disinfection
Lead and Copper								
Lead	ppb	2013	0	15=AL	0	0 sites detected	NO	Corrosion of household plumbing systems; erosion of natural deposits
Copper	ppm	2013	1300	1300=AL	120	0 sites above Action Level (AL)	NO	Corrosion of household plumbing systems; erosion of natural deposits; leaching from wood preservatives

2016 Violation Summary – Village of Streamwood (IL PWS ID#0313060)

The Village of Streamwood recorded no violations in 2016.

2016 Regulated Contaminants Detected: City of Chicago

Turbidity	Collection Date:	MCLG	MCL	Level Detected			Range of Detections	Violation	Likely Source of Contamination
NTU/Lowest Monthly %≤0.3NTU Measurement	2016	NA	TT(Limit 0.3NTU)	Lowest Monthly % 100%			100%-100%	NO	Soil runoff
NTU/Highest Single Measurement	2016	NA	TT(Limit 1NTU)	0.16			NA	NO	Soil runoff
Contaminants	Collection Date:	Highest Level Detected	Range of Levels Detected	MCLG	MCL	Units	Violation	Likely Source of Contamination	
State Regulated									
Fluoride	2015	1.01	0.76-1.01	4	4	ppm	NO	Erosion of natural deposits; water additive that promotes strong teeth; discharge from fertilizer and aluminum factories	
Inorganic Contaminants									
Barium	2016	0.0206	0.0196-0.0206	2	2	ppm	NO	Discharge of drilling wastes, discharge from metal refineries; erosion of natural deposits	
Nitrate(measured as Nitrogen)	2016	0.46	0.40-0.46	10	10	ppm	NO	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits	
Total Nitrate and Nitrite	2016	0.46	0.40-0.46	10	10	ppm	NO	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits	
Unregulated Contaminants									
Sodium (Unregulated)	2016	8.92	8.49-8.92	NA	NA	ppm	NO	Erosion from naturally occurring deposits; used in water softener regeneration	
Sulfate (Unregulated)	2016	25.7	25.0-25.7	NA	NA	ppm	NO	Erosion of natural deposits	
Radioactive Contaminants									
Combined Radium 226/228	2/11/2014	0.84	0.50-0.84	0	5	pCi/L	NO	Decay of natural and man-made deposits	
Gross alpha excluding radon and uranium	2/11/2014	6.6	6.1-6.6	0	15	pCi/L	NO	Decay of natural and man-made deposits	
Total Organic Carbon	The percentage of Total Organic Carbon (TOC) removal was measured each month; the system met all TOC removal requirements set by the IEPA.								

2016 Violation Summary – City of Chicago (IL PWS ID#0316000)

The City of Chicago recorded no violations in 2016.

2016 Voluntary Monitoring

The CDWM has continued monitoring for Cryptosporidium, Giardia and E. coli in its source water as part of its water quality program. To date, Cryptosporidium has not been detected in these samples, but Giardia was detected in 2010 in one raw lake water sample collected in September 2010. Treatment processes have been optimized to provide effective barriers for removal of Cryptosporidium oocysts and Giardia cysts in the source water, effectively removing these organisms in the treatment process. By maintaining low turbidity through the removal of particles from the water, the possibility of Cryptosporidium and Giardia organisms getting into the drinking water system is greatly reduced. Also in compliance with Long Term 2 Enhanced Surface Water Treatment Rule Round 2, the City of Chicago has continued the 24 months long monitoring program started in April 2015, collecting samples from its source water once per month to monitor for Cryptosporidium, Giardia, E. Coli, and turbidity, with no detections for Cryptosporidium and Giardia reported so far.

In 2016, CDWM has also continued monitoring for hexavalent chromium, also known as chromium-6. USEPA has not yet established a standard for chromium-6, a contaminant of concern which has both natural and industrial sources. Please address questions or concerns to CDWM's Water Quality Division at (312) 742-7499. Data reports on the monitoring for chromium-6 are posted on the City's website at www.cityofchicago.org/city/en/depts/water/supp_info/water_quality_resultsandreports/city_of_chicago_emergincontaminantstudy.html

Water Quality Data Table Footnotes

Turbidity: Turbidity is a measure of cloudiness of water. It is measured because it is a good indicator of water quality and the effectiveness of filtration systems and disinfectants.

Lead: If present, elevated levels of lead can cause serious health problems, especially for pregnant women and young children. Lead in drinking water is primarily from materials and components associated with service lines and home plumbing. The Village of Streamwood cannot control the variety of materials used in plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for 30 seconds to 2 minutes before using water for drinking or cooking. If you are concerned about lead in your water, you may wish to have your water tested. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available from the Safe Drinking Water Hotline at (800) 426-4791 or by visiting <http://www.epa.gov/safewater/lead>.

Unregulated Contaminants: A maximum contaminant level (MCL) for this contaminant has not been established by either state or federal regulations, nor has mandatory health effects language. The purpose for monitoring this contaminant is to assist the USEPA in determining the occurrence of unregulated contaminants in drinking water, and whether future regulation is warranted.

Fluoride: Fluoride is added to the water supply to help promote strong teeth, The Illinois Department of Public Health recommends an optimal fluoride level of 0.7 mg/L and a range of 0.6mg/l to 0.8 mg/l.

Sodium: There is not a state or federal MCL for sodium. Monitoring is required to provide information to consumers and health officials that are concerned about sodium intake due to dietary precautions. If you are on a sodium-restricted diet, you should consult a physician about this level of sodium in the water.

Help Keep Our Water Clean!

Keep Storm Drains Clear and Clean



When rain falls or when the snow melts only some soaks into the ground. The rest of the water flows over the land, heading downhill to the nearest stream. This is called storm water runoff. Areas with a lot of pavements, such as driveways, streets and sidewalks, have more storm water runoff because the ground can't absorb the water. Water flows toward the streets into a storm drain. Many people believe that storm drains are connected to a sewage treatment plant. They are not. Anything that goes down the storm drain goes untreated into local area streams and lakes. People would never dream of polluting a lake or stream. Yet some pour antifreeze, paint, used motor oil, pet waste or litter down storm drains.

Help us keep our water clean by helping to prevent storm water pollution:

- Never dump anything into a storm drain
- Clean up after your pet
- Use fertilizer and pesticides carefully; read the label and follow the instructions
- Put leaves and grass clippings in a bag for pickup, or compost clippings and use as mulch
- Recycle often, and only throw litter in the trash
- Dispose of household hazardous waste properly
- Recycle used motor oil at local auto parts stores
- Check your vehicle for leaks and repair them
- Recycle car batteries at the Streamwood Public Works Department (565 South Bartlett Rd.) by dropping off old batteries at Door 14 (behind building) between 8:00 am and 4:30 pm Monday thru Friday
- For a full list of local recycling locations see the Village website at www.streamwood.org
- Tell a friend or neighbor about how to prevent storm water pollution



Remember – storm drains are for rainwater only!

Clean Up After Animals



Cleaning up after animals also keeps our water safe. Animal waste left in your yard or in our parks eventually runs off into the nearest body of freshwater after it rains. Poop not properly disposed of moves through the storm sewer system and into nearby creeks, rivers and streams. Scientists have discovered that pet waste is a major cause of water pollution.

Water Fun Facts

- Did you know that the Village has four water towers?
- Did you know that the letters in “Streamwood” on the Lake Street water tower are 12 feet tall?
- The smallest sewer in Streamwood is only six inches in diameter. The biggest is 60 inches!
- On average, Streamwood uses 3,000,000 gallons of water per day!
- Our connection to Lake Michigan starts near O’Hare Airport with a 90 inch pipe.
- Streamwood has more miles of water main than streets!
- Did you know that the Village has nearly 2,000 fire hydrants?



Water Use Restrictions

Remember that lawn and garden watering is only allowed between the hours of 6:00 pm and 11:00 am, unless new sod or gardens have been installed. For details, please contact Public Works at (630) 736-3850.