

***2024 Annual Drinking Water Quality Report***  
South Granville Water and Sewer Authority  
PWSID # NC 02-39-107

## **REPORT OVERVIEW**

The SGWASA Water Plant regularly checks for contaminants in your drinking water in compliance with federal and state regulations. This report presents the findings from our monitoring efforts between January 1 and December 31, 2024, and includes results from previous years' contamination tests that were not scheduled for 2024.

We are pleased to present to you the Annual Drinking Water Quality Report. Included in this report are details about SGWASA's water source, the water composition, and how the water compares to standards set by regulatory agencies. Our goal is to provide you with a safe and dependable supply of drinking water. We are committed to ensuring the water meets all federal and state regulations. We want our valued customers to be informed about their water utility. Therefore, if you have any questions about this report, or concerning your water, then please contact Jonathan Yancey, Water Plant Superintendent at 919-575-3118 Monday-Friday between 8:30 am – 4:30 pm. Should you want to learn more SGWASA, please consider attending any of our regularly scheduled monthly Board meetings that are held at 6:00 pm on the 2nd Tuesday of the month at the Butner Town Hall. Please see our website at [www.sgwasa.org](http://www.sgwasa.org) for more information.

## **SGWASA'S WATER SOURCE**

SGWASA's water source is the R.D. Holt Reservoir ("reservoir") located off Old Oxford Highway 75, just northwest of Butner, NC. The reservoir is a 2.2-billion-gallon surface water supply covering an area of approximately 374 acres. The reservoir is part of the Upper Neuse River basin and is nestled within a heavily forested watershed that helps to minimize outside impacts on the lake. The reservoir provides excellent seasonal non-contact (no swimming or water-skiing allowed) recreation such as fishing, boating, and picnicking. The reservoir provides over 13 million gallons of water for treatment each day. The R.D. Holt Reservoir is a valuable natural water resource for SGWASA and its customers.

## **HOW SGWASA TREATS THE WATER FROM THE RESERVOIR**

Water is withdrawn from the R.D. Holt Reservoir and treated at the SGWASA Water Plant. The water plant can treat up to 7.5 million gallons of water a day. The treatment process has five (5) main steps: coagulation, flocculation, sedimentation, filtration, and disinfection. The first step in the process, known as coagulation, adds chemicals to the raw water where the chemicals form solid material around solid particles such as silt, mud, sand, etc. The second step in the process,

known as flocculation, occurs as the particles move along the treatment process clumping together forming larger and heavier particles. Step three, the sedimentation process, is when the heavier particles from step two settle to the bottom of large settling basins, where they are removed later. Step four, the filtration process, is where the water gets its first addition of disinfectant (chlorine) to eliminate any bacteria that may be present before flowing through additional filters. The filters remove any remaining particles in the water. Finally, step five, known as the disinfection process, is where the water gets one last dose of disinfectant (chloramine) added to the water to ensure the water is safe to drink.

The SGWASA Water Plant laboratory is certified by the State of North Carolina for bacteriological analysis. Lab staff have gained individual certifications through the State Laboratory of Public Health certification program. Compliance and process control monitoring are routinely performed with all National Primary Drinking Water Regulations being met.

### **WHAT THE EPA WANTS YOU TO KNOW**

Drinking water, including bottled water, may reasonably be expected to contain at least small amounts of contaminants. The presence of contaminants does not necessarily indicate that the water poses a health risk. More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency's Safe Drinking Water Hotline (800-426-4791).

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. EPA/CDC guidelines on appropriate means to lessen the risk of infection by *Cryptosporidium* and other microbiological contaminants are available from the Safe Drinking Water Hotline (800-426-4791).

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. SGWASA is responsible for providing high quality drinking water, but cannot control the variety of materials used in residential, commercial, or institutional plumbing components. When your water has been sitting for several hours, you can minimize the potential for lead exposure by flushing your tap for up 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 or at <http://www.epa.gov/safewater/lead>.

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, in some cases, radioactive material, and can pick up substances resulting from the presence of animals or from human activity. 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, septic systems, and radioactive contaminants, which can be naturally-occurring or be the result of oil and gas production and mining activities.

To ensure that tap water is safe to drink, EPA prescribes regulations which limit the number 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.

### **WHEN YOU TURN ON YOUR TAP, CONSIDER THE SOURCE**

The water that is used by this system is surface water from Knapp of Reeds Creek Impoundment (Holt Reservoir) and is located off Old Highway 75 just northwest of Butner.

### **PER- AND POLYFLUOROALKYL SUBSTANCES (PFAS)**

On April 10, 2024, the U.S. Environmental Protection Agency (EPA) announced the final National Primary Drinking Water Regulation (NPDWR) for six PFAS. The NPDWR establishes legally enforceable PFAS levels, called Maximum Contaminant Levels (MCLs), for six PFAS in drinking water.

The Final Rule Requires:

- Public water systems must monitor for these PFAS, and they have three years to complete initial monitoring (by 2027), followed by ongoing compliance monitoring. Water systems must also provide the public with information on the levels of these PFAS in their drinking water beginning in 2027.
- Public water systems have until April 26, 2029, to implement solutions that reduce these PFAS if monitoring shows that drinking water levels exceed the MCLs.

- Beginning in five years (2029), public water systems that have PFAS in drinking water which violates one or more of these MCLs must take action to reduce levels of these PFAS in their drinking water and must provide notification to the public of the violation.

SGWASA, in coordination with CDM Smith (professional engineering company highly experienced in design-build solutions for PFAS reduction in drinking water) are conducting a PFAS Pilot Testing program at the SGWASA water treatment plant. The PFAS Pilot Testing program started in late 2024 and will run through 2025. The results of the PFAS Pilot Testing program will provide the criteria for the engineering design necessary to reduce the PFAS in the drinking water to meet state standards. Following the engineering design process, SGWASA will move toward construction to install the necessary equipment to reduce the PFAS in the drinking water.

### **SOURCE WATER ASSESSMENT PROGRAM (SWAP) RESULTS**

The North Carolina Department of Environment and Natural Resources (DENR), Public Water Supply (PWS) Section, Source Water Assessment Program (SWAP) conducted assessments for all drinking water sources across North Carolina. The purpose of the assessments was to determine the susceptibility of each drinking water source (well or surface water intake) to Potential Contaminant Sources (PCSs). The results of the assessment are available in SWAP Assessment Reports that include maps, background information and a relative susceptibility rating of Higher, Moderate or Lower.

The relative susceptibility rating of each source for SGWASA was determined by combining the contaminant rating (number and location of PCSs within the assessment area) and the inherent vulnerability rating (i.e., characteristics or existing conditions of the well or watershed and its delineated assessment area). The assessment findings are summarized in the table below:

#### **Susceptibility of Sources to Potential Contaminant Sources (PCSs)**

Source Name	Susceptibility Rating	SWAP Report Date
Knapp of Reeds Creek Impoundment (Holt Reservoir)	Lower	Sept. 2020

The complete SWAP Assessment report for SGWASA may be viewed on the Web at: <https://www.ncwater.org/?page=600> and may also be found [here](#). Note that because SWAP results and reports are periodically updated by the PWS Section, the results available on this web site may differ from the results that were available at the time this CCR was prepared. If you are unable to access your SWAP report on the web, you may mail a written request for a printed copy to: Source Water Assessment Program – Report Request, 1634 Mail Service Center, Raleigh, NC 27699-1634, or email requests to [swap@ncdenr.gov](mailto:swap@ncdenr.gov). Please indicate your system name, number, and



provide your name, mailing address and phone number. If you have any questions about the SWAP report please contact the Source Water Assessment staff by phone at 919-707-9098. It is important to understand that a susceptibility rating of “higher” does not imply poor water quality, only the system’s potential to become contaminated by PCSs in the assessment area.

### **HELP PROTECT YOUR SOURCE WATER**

Protection of drinking water is everyone’s responsibility. You can help protect your community’s drinking water source(s) in several ways: (examples: dispose of chemicals properly; take used motor oil to a recycling center, volunteer in your community to participate in group efforts to protect your source, etc.).

### **VIOLATIONS THAT SGWASA RECEIVED DURING 2024**

NONE

### **Important Drinking Water Definitions:**

**Not-Applicable (N/A)** – Information not applicable/not required for that water system or for that rule.

**Non-Detects (ND)** - Laboratory analysis indicates that the contaminant is not present at the level of detection set for the particular methodology used.

**Parts per million (ppm) or Milligrams per liter (mg/L)** - One part per million corresponds to one minute in two years or a single penny in \$10,000.

**Parts per billion (ppb) or Micrograms per liter (ug/L)** - One part per billion corresponds to one minute in 2,000 years, or a single penny in \$10,000,000.

**Parts per trillion (ppt) or Nanograms per liter (nanograms/L)** - One part per trillion corresponds to one minute in 2,000,000 years, or a single penny in \$10,000,000,000.

**Parts per quadrillion (ppq) or Picograms per liter (picograms/L)** - One part per quadrillion corresponds to one minute in 2,000,000,000 years or one penny in \$10,000,000,000,000.

**Picocuries per liter (pCi/L)** - Picocuries per liter is a measure of the radioactivity in water.

**Million Fibers per Liter (MFL)** - Million fibers per liter is a measure of the presence of asbestos fibers that are longer than 10 micrometers.

**Nephelometric Turbidity Unit (NTU)** - Nephelometric turbidity unit is a measure of the clarity of water. Turbidity more than 5 NTU is just noticeable to the average person.

**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.

**Maximum Residual Disinfection 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.

**Maximum Residual Disinfection 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.

**Locational Running Annual Average (LRAA)** – The average of sample analytical results for samples taken at a particular monitoring location during the previous four calendar quarters under the Stage 2 Disinfectants and Disinfection Byproducts Rule.

**Level 1 Assessment** - A Level 1 assessment is a study of the water system to identify potential problems and determine (if possible) why total coliform bacteria have been found in our water system.

**Level 2 Assessment** - A Level 2 assessment is a detailed study of the water system to identify potential problems and determine (if possible) why an E. coli MCL violation has occurred and/or why total coliform bacteria have been found in our water system on multiple occasions.

**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 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.

## **WATER QUALITY DATA TABLE OF DETECTED CONTAMINANTS**

As required by Federal and State laws, SGWASA monitors over 150 contaminants in your drinking water. The table below lists all the drinking water contaminants that SGWASA detected in the last round of sampling for each contaminant group. The presence of contaminants does not necessarily

indicate that water poses a health risk. **Unless otherwise noted, the data presented in this table is from testing performed January 1 through December 31, 2024.** The EPA or the State requires SGWASA to monitor for certain contaminants less than once per year because the concentrations of these contaminants are not expected to vary significantly from year to year. Some of the data, though representative of the water quality, is more than one year old.

Unregulated contaminants are those for which EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulation is warranted.

#### Lead and Copper Contaminants

Contaminant (units)	Sample Date	Your Water (90 <sup>th</sup> Percentile)	Number of sites found above the AL	Range Low High	MCLG	AL	Likely Source of Contamination
Copper (ppm) (90 <sup>th</sup> percentile)	01Jun2024 - 30Sep2024	0.176 mg/L	0	<0.050 mg/L – 0.560 mg/L	1.3	AL=1.3	Corrosion of household plumbing systems; erosion of natural deposits
Lead (ppb) (90 <sup>th</sup> percentile)	01Jun2024 - 30Sep2024	3 µg/L	0	<0.003 mg/L – 0.004 mg/L	0	AL=15	Corrosion of household plumbing systems; erosion of natural deposits

The table above summarizes our most recent lead and copper tap sampling data. If you would like to review the complete lead tap sampling data, please email Jonathan Yancey, Water Treatment Plant Superintendent at [jyancey@sgwasa.org](mailto:jyancey@sgwasa.org).

We have been working to identify service line materials throughout the water system and prepared an inventory of all service lines in our water system. To access this inventory, <https://experience.arcgis.com/experience/4121041d114b4681aa6e5e7f9c6c3ca9>

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. SGWASA is responsible for providing high quality drinking water and removing lead pipes but cannot control the variety of materials used in plumbing components in your home. You share the responsibility for protecting yourself and your family from the lead in your home plumbing. You can take responsibility by identifying and removing lead materials within your home plumbing and taking steps to reduce your family's risk.

Before drinking tap water, flush your pipes for several minutes by running your tap, taking a shower, doing laundry or a load of dishes. You can also use a filter certified by an American National Standards Institute accredited certifier to reduce lead in drinking water. If you are concerned about lead in your water and wish to have your water tested, contact SGWASA 919-575-3367. Information on lead in drinking water, testing methods, and steps you can take to minimize exposure is available at <http://www.epa.gov/safewater/lead>.

### Total Trihalomethanes (TTHM) and Haloacetic Acids (five) (HAA5)

Disinfection Byproduct	Year Sampled	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
TTHM (mg/L)	2024	N	0.052 mg/L	B01- 0.023 / 0.052 mg/L B02- 0.025 / 0.047 mg/L B03- 0.021 / 0.045 mg/L B04- 0.022 / 0.045 mg/L		N/A	80 mg/L	Byproduct of drinking water disinfection
HAA5 (mg/L)	2024	N	0.034 mg/L	B01 - 0.019 / 0.030 mg/L B02- 0.020 / 0.030 mg/L B03- 0.007 / 0.034 mg/L B04- 0.018 / 0.031 mg/L		N/A	60 mg/L	Byproduct of drinking water disinfection

### Disinfectant Residuals Summary

	MRDL Violation Y/N	Your Water (RAA)	Range		MRDLG	MRDL	Likely Source of Contamination
			Low	High			
Chlorine (ppm)	N	2.24	1-3.5		4	4.0	Water additive used to control microbes
Chloramines (ppm)	N	1.9	1-2.8		4	4.0	Water additive used to control microbes



### Inorganic Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Antimony (ppb)	02/01/2024	N	ND	NA		6	6	Discharge from petroleum refineries; fire retardants; ceramics; electronics; solder
Arsenic (ppb)	02/01/2024	N	ND	NA		0	10	Erosion of natural deposits; runoff from orchards; runoff from glass and electronics production wastes
Barium (ppm)	02/01/2024	N	ND	NA		2	2	Discharge of drilling wastes; discharge from metal refineries; erosion of natural deposits
Beryllium (ppb)	02/01/2024	N	ND	NA		4	4	Discharge from metal refineries and coal-burning factories; discharge from electrical, aerospace, and defense industries
Cadmium (ppb)	02/01/2024	N	ND	NA		5	5	Corrosion of galvanized pipes; erosion of natural deposits; discharge from metal refineries; runoff from waste batteries and paints
Chromium (ppb)	02/01/2024	N	ND	NA		100	100	Discharge from steel and pulp mills; erosion of natural deposits
Cyanide (ppb)	02/01/2024	N	ND	NA		200	200	Discharge from steel/metal factories; discharge from plastic and fertilizer factories
Fluoride (ppm)	02/01/2024	N	0.81	NA		4	4	Erosion of natural deposits; water additive which promotes strong teeth; discharge from fertilizer and aluminum factories
Mercury (inorganic) (ppb)	02/01/2024	N	ND	NA		2	2	Erosion of natural deposits; discharge from refineries and factories; runoff from landfills; runoff from cropland
Selenium (ppb)	02/01/2024	N	ND	NA		50	50	Discharge from petroleum and metal refineries; erosion of natural deposits; discharge from mines
Thallium (ppb)	02/01/2024	N	ND	NA		0.5	2	Leaching from ore-processing sites; discharge from electronics, glass, and drug factories

### Nitrate/Nitrite Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Nitrate (as Nitrogen) (ppm)	05/15/2024	N	ND	NA		10	10	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits
Nitrite (as Nitrogen) (ppm)	05/15/2024	N	ND	NA		1	1	Runoff from fertilizer use; leaching from septic tanks, sewage; erosion of natural deposits

### Synthetic Organic Chemical (SOC) Contaminants Including Pesticides and Herbicides

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
2,4-D (ppb)	03/19/2024	N	ND	NA		70	70	Runoff from herbicide used on row crops
2,4,5-TP (Silvex) (ppb)	03/19/2024	N	ND	NA		50	50	Residue of banned herbicide
Alachlor (ppb)	03/19/2024	N	ND	NA		0	2	Runoff from herbicide used on row crops
Atrazine (ppb)	03/19/2024	N	ND	NA		3	3	Runoff from herbicide used on row crops
Benzo(a)pyrene (PAH) (ppt)	03/19/2024	N	ND	NA		0	200	Leaching from linings of water storage tanks and distribution lines
Carbofuran (ppb)	03/19/2024	N	ND	NA		40	40	Leaching of soil fumigant used on rice and alfalfa
Chlordane (ppb)	03/19/2024	N	ND	NA		0	2	Residue of banned termiticide
Dalapon (ppb)	03/19/2024	N	ND	NA		200	200	Runoff from herbicide used on rights of way
Di(2-ethylhexyl) adipate (ppb)	03/19/2024	N	ND	NA		400	400	Discharge from chemical factories
Di(2-ethylhexyl) phthalate (ppb)	03/19/2024	N	ND	NA		0	6	Discharge from rubber and chemical factories
DBCP [Dibromochloropropane] (ppt)	03/19/2024	N	ND	NA		0	200	Runoff/leaching from soil fumigant used on soybeans, cotton, pineapples, and orchards
Dinoseb (ppb)	03/19/2024	N	ND	NA		7	7	Runoff from herbicide used on soybeans and vegetables
Endrin (ppb)	03/19/2024	N	ND	NA		2	2	Residue of banned insecticide
EDB [Ethylene dibromide] (ppt)	03/19/2024	N	ND	NA		0	50	Discharge from petroleum refineries
Heptachlor (ppt)	03/19/2024	N	ND	NA		0	400	Residue of banned pesticide
Heptachlor epoxide (ppt)	03/19/2024	N	ND	NA		0	200	Breakdown of heptachlor
Hexachlorobenzene (ppb)	03/19/2024	N	ND	NA		0	1	Discharge from metal refineries and agricultural chemical factories
Hexachlorocyclo-pentadiene (ppb)	03/19/2024	N	ND	NA		50	50	Discharge from chemical factories
Lindane (ppt)	03/19/2024	N	ND	NA		200	200	Runoff/leaching from insecticide used on cattle, lumber, gardens
Methoxychlor (ppb)	03/19/2024	N	ND	NA		40	40	Runoff/leaching from insecticide used on fruits, vegetables, alfalfa, livestock
Oxamyl [Vydate] (ppb)	03/19/2024	N	ND	NA		200	200	Runoff/leaching from insecticide used on apples, potatoes and tomatoes
PCBs [Polychlorinated biphenyls] (ppt)	03/19/2024	N	ND	NA		0	500	Runoff from landfills; discharge of waste chemicals
Pentachlorophenol (ppb)	03/19/2024	N	ND	NA		0	1	Discharge from wood preserving factories

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Picloram (ppb)	03/19/2024	N	ND	NA		500	500	Herbicide runoff
Simazine (ppb)	03/19/2024	N	ND	NA		4	4	Herbicide runoff
Toxaphene (ppb)	03/19/2024	N	ND	NA		0	3	Runoff/leaching from insecticide used on cotton and cattle

### Volatile Organic Chemical (VOC) Contaminants

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Benzene (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from factories; leaching from gas storage tanks and landfills
Carbon tetrachloride (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from chemical plants and other industrial activities
Chlorobenzene (ppb)	02/06/2024	N	ND	NA		100	100	Discharge from chemical and agricultural chemical factories
o-Dichlorobenzene (ppb)	02/06/2024	N	ND	NA		600	600	Discharge from industrial chemical factories
p-Dichlorobenzene (ppb)	02/06/2024	N	ND	NA		75	75	Discharge from industrial chemical factories
1,2 – Dichloroethane (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from industrial chemical factories
1,1 – Dichloroethylene (ppb)	02/06/2024	N	ND	NA		7	7	Discharge from industrial chemical factories
cis-1,2-Dichloroethylene (ppb)	02/06/2024	N	ND	NA		70	70	Discharge from industrial chemical factories
trans-1,2-Dichloroethylene (ppb)	02/06/2024	N	ND	NA		100	100	Discharge from industrial chemical factories
Dichloromethane (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from pharmaceutical and chemical factories
1,2-Dichloropropane (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from industrial chemical factories
Ethylbenzene (ppb)	02/06/2024	N	ND	NA		700	700	Discharge from petroleum refineries
Styrene (ppb)	02/06/2024	N	ND	NA		100	100	Discharge from rubber and plastic factories; leaching from landfills
Tetrachloroethylene (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from factories and dry cleaners
1,2,4 –Trichlorobenzene (ppb)	02/06/2024	N	ND	NA		70	70	Discharge from textile-finishing factories
1,1,1 – Trichloroethane (ppb)	02/06/2024	N	ND	NA		200	200	Discharge from metal degreasing sites and other factories
1,1,2 –Trichloroethane (ppb)	02/06/2024	N	ND	NA		3	5	Discharge from industrial chemical factories
Trichloroethylene (ppb)	02/06/2024	N	ND	NA		0	5	Discharge from metal degreasing sites and other factories

Contaminant (units)	Sample Date	MCL Violation Y/N	Your Water	Range		MCLG	MCL	Likely Source of Contamination
				Low	High			
Toluene (ppm)	02/06/2024	N	ND	NA		1	1	Discharge from petroleum factories
Vinyl Chloride (ppb)	02/06/2024	N	ND	NA		0	2	Leaching from PVC piping; discharge from plastics factories
Xylenes (Total) (ppm)	02/06/2024	N	ND	NA		10	10	Discharge from petroleum factories; discharge from chemical factories

### Turbidity\*

Contaminant (units)	Treatment Technique (TT) Violation Y/N	Your Water	MCLG	Treatment Technique (TT) Violation if:	Likely Source of Contamination
Turbidity (NTU) - Highest single turbidity measurement	N	.291 NTU	N/A	Turbidity > 1 NTU	Soil runoff
Turbidity (%) - Lowest monthly percentage (%) of samples meeting turbidity limits	N	100%	N/A	Less than 95% of monthly turbidity measurements are $\leq 0.3$ NTU	

\* Turbidity is a measure of the cloudiness of the water. We monitor it because it is a good indicator of the effectiveness of our filtration system. The turbidity rule requires that 95% or more of the monthly samples must be less than or equal to 0.3 NTU.

### Total Organic Carbon (TOC)

Contaminant (units)	TT Violation Y/N	Your Water (lowest RAA)	Range Monthly Removal Ratio Low - High	MCLG	Treatment Technique (TT) violation if:	Likely Source of Contamination
Total Organic Carbon (TOC) Removal Ratio (no units)	N	1.46	1.46-1.57	N/A	Removal Ratio RAA < 1.00 and alternative compliance criteria was not met	Naturally present in the environment

### Unregulated Contaminants

Contaminant (units)		Sample Date	Your Water (average)	Range	
				Low	High
Lithium (ppb)			7.50	7.50 - 7.50	
PFAS (ppt)					
11CI-PF3OUdS			1.53	1.50-1.60	
4:2 FTS			0.93	0.90-0.97	
6:2 FTS			1.70	1.50-2.70	
8:2 FTS			1.53	1.50-1.60	

Contaminant (units)	Sample Date	Your Water (average)	Range	
			Low	High
9Cl-PF3ONS		0.62	0.61	0.65
ADONA		0.93	0.91	0.97
HFPO-DA		1.53	1.50	1.60
NFDHA		6.19	6.10	6.40
Perfluorobutanesulfonic Acid		1.12	0.91	1.50
Perfluorodecanoic Acid		0.93	0.91	0.97
Perfluorohexanoic Acid		1.00	0.91	1.20
PFBA		1.99	1.50	3.00
PFEESA		0.93	0.91	0.97
PFHpS		0.93	0.91	0.97
PFMBA		0.93	0.91	0.97
PFMPA		1.23	1.20	1.30
PFPeA		0.93	0.91	0.97
PFPeS		1.23	1.20	1.30
Perfluorododecanoic Acid		0.93	0.91	0.97
Perfluoroheptanoic Acid		1.11	0.91	1.80
Perfluorohexanesulfonic Acid		1.22	0.91	2.20
Perfluorononanoic Acid		1.23	1.20	1.30
Perfluorooctanesulfonic Acid		6.69	1.20	19.00
Perfluorooctanoic Acid		4.11	1.20	11.00
Perfluoroundecanoic Acid		0.62	0.61	0.65
NEtFOSAA		1.53	1.50	1.60
NMeFOSAA		1.80	1.70	1.90
Perfluorotetradecanoic Acid		2.45	2.30	2.50
Perfluorotridecanoic Acid		2.18	2.10	2.20

Our water system has sampled for a series of unregulated contaminants. Unregulated contaminants are those for which EPA has not established drinking water standards. The purpose of unregulated contaminant monitoring is to assist EPA in determining the occurrence of unregulated contaminants in drinking water and whether future regulations are warranted. If you are interested in examining the results, please contact us.

The PWS Section requires monitoring for other misc. contaminants, some for which the EPA has set national secondary drinking water standards (SMCLs) because they may cause cosmetic effects or aesthetic effects (such as taste, odor, and/or color) in drinking water. The contaminants with SMCLs normally do not have any health effects and normally do not affect the safety of your water.



#### Other Miscellaneous Water Characteristics Contaminants

Contaminant (units)	Sample Date	Your Water	Range Low High	SMCL
Iron (ppm)	02/01/2024	0.118	NA	0.3
Manganese (ppm)	02/01/2024	0.012	NA	0.05
Nickel (ppm)	02/01/2024	ND	NA	N/A
Sodium (ppm)	02/01/2024	25.2	NA	N/A
Sulfate (ppm)	02/01/2024	46	NA	250
pH	02/01/2024	7.9	NA	6.5 to 8.5

#### WHAT CAN YOU DO TO PROTECT DRINKING WATER?

**Get involved with water issues.** Contact the water plant at (919) 575-3118 for information.

**Use water wisely.** Check your plumbing for leaks and fix them. Use water for irrigation only in the early morning or late evening.

**Be environmentally conscious around the lake.** Try to prevent oil and fuel spills while boating. Minimize pet waste to the lake.

More information about contaminants and potential health effects can be obtained by calling the Environmental Protection Agency Safe Drinking Water Hotline at **1-800-426-4791**.