

## **TOTAL TRIHALOMETHANES**

### **Frequently Asked Questions**

#### **WHAT HAPPENED?**

Seminole County's Environmental Services Department routinely monitors drinking water for contaminants, as the Florida Department of Environmental Protection (FDEP) requires. Water sample results received in January 2023 and April 2023 indicated an exceedance of the maximum contaminant level (MCL) for Total Trihalomethanes. Although this incident is not an emergency, County customers have been notified of the exceedance via letter, as required by the FDEP.

#### **WHAT ARE TOTAL TRIHALOMETHANES**

Total Trihalomethanes (TTHM) are a group of chemicals that form as an unintended consequence of disinfecting drinking water. To protect drinking water from disease-causing organisms or pathogens such as E. coli or Salmonella, the State of Florida requires drinking water disinfection to minimize potential bacterial contamination. When water is treated with chlorine, chloramine, or other disinfectants, disinfection byproducts, such as TTHMs, may form.

#### **WHAT IS A DISINFECTION BYPRODUCT?**

A challenge for public water systems is balancing the limitation of pathogens while minimizing the formation of disinfection byproducts. These byproducts form when naturally occurring organic matter in water supplies reacts with chlorine, or other disinfectants, in the water system.

#### **WHAT IS THE MAXIMUM CONTAMINANT LEVEL FOR TTHMs?**

Drinking water standards are called Maximum Contaminant Levels (MCL) and are set by the Federal Environmental Protection Agency. The MCL for TTHM is set at a level to protect against the long-term risk of potential adverse health effects is 80 parts per billion (ppb). Utility companies are required to test for TTHMs every quarter; this standard is compared to a one-year average of samples.

#### **WHAT WAS THE EXCEEDANCE IN THE NORTHWEST SERVICE AREA WATER?**

Seminole County's Environmental Services Department routinely monitors the presence of drinking water contaminants. Water sample results received in January 2023 and April 2023 indicated an exceedance of the maximum contaminant level (MCL) for Total Trihalomethanes. The MCL for TTHMs is 80 ppb.

In January, two collection points averaged 85.54 and 83.83 ppb. In April, the same collection points averaged 83.01 and 86.94 ppb.

### **IS MY HEALTH AT RISK FROM DRINKING WATER WITH AN EXCEEDANCE OF TTHMs?**

This is not an emergency. Based upon Environmental Protection Agency (EPA) and Florida Department of Environmental (FDEP) studies and standards, individuals who drink water containing trihalomethanes in excess of the maximum contaminant level (MCL) over many years may experience problems with their liver, kidneys, or central nervous system and may have an increased risk of getting cancer.

Seminole County's Northwest Service Area's (SEMCO NW) water system has historically tested at-or-below the MCL requirements. Therefore, individuals consuming water from the SEMCO NW system have not been exposed to excess TTHMs for an extended period. These exceedances have been limited and not continuous. Customers with health-related concerns should consult their physician.

### **IS MY WATER SAFE?**

Based on the most recent water samples, the concentration of TTHMs in Seminole County's water distribution system meets the appropriate levels. Customers with health-related concerns should consult their physician.

However, the risk of not disinfecting drinking water, and exposing customers to microorganisms that can cause illness, outweighs the long-term, low-level risk of consuming TTHMs and other water disinfection byproducts.

### **SHOULD I BOIL MY WATER OR SEEK ALTERNATE WATER SOURCES?**

Based on our most recent sampling, the concentration of TTHMs in Seminole County's water distribution system meets the appropriate levels. Therefore, no alternative water source is necessary, and boil water advisories are not in place.

### **WHAT IS SEMINOLE COUNTY DOING TO RESOLVE THE LEVEL OF TTHMs IN THE DISTRIBUTION SYSTEM?**

County staff has modified the operational treatment process and increased hydrant flushing, which removes accumulated sediment and prevents naturally occurring sediment buildup in the distribution system. As the Florida Department of Environmental Protection requires, the County will continue to monitor TTHM sampling results.

### **WHY DID I RECEIVE A NOTIFICATION LETTER FROM THE COUNTY?**

The Florida Department of Environmental Protection (FDEP) and the Safe Drinking Water Act require all public water systems to notify customers when a water standard is not met. Even though this incident is not an emergency, County customers have the right to know when water does not meet treatment requirements and what the County is doing to correct the matter.

### **WHERE CAN I GET ADDITIONAL INFORMATION?**

Call the Seminole County Environmental Services Customer Service Line: 407.665.2110

Visit: [www.seminolecountyfl.gov/TTHM](http://www.seminolecountyfl.gov/TTHM)