#### 2023 ANNUAL REPORT - City of St. Catharines Distribution System

Drinking-Water System Number:	260003279
Drinking-Water System Name:	City of St. Catharines Distribution System
Drinking-Water System Owner:	Corporation of the City of St. Catharines
Drinking-Water System Category:	Large Municipal Residential (pop. 136,803)
Period being reported:	January 1 – December 31, 2023

Complete if your Category is Large Municipal Residential or Small Municipal Residential	Complete for all other Categories.
Does your Drinking-Water System serve more than 10,000 people? Yes [X] No [ ]	Number of Designated Facilities served: Did you provide a copy of
Is your annual report available to the public at no charge on a web site on the Internet? Yes [X] No [ ]	your annual report to all Designated Facilities you serve? Yes [ ] No [ ]
Location where Summary Report required under O. Reg. 170/03 Schedule 22 will be available for inspection.	Number of Interested Authorities you report to:
<b>City Hall</b> 50 Church Street, St. Catharines, ON L2R 7C2	Did you provide a copy of your annual report to all Interested Authorities you report to for each Designated Facility? Yes [] No []

### List all Drinking-Water Systems (if any), which receive all of their drinking water from your system:

Drinking Water System Name	Drinking Water System Number		
Not Applicable			

## Did you provide a copy of your annual report to all Drinking-Water System owners that are connected to you and to whom you provide all of its drinking water?

Yes [] No [] Not Applicable

Indicate how you notified system users that your annual report is available and is free of charge.

- [X] Public access/notice via the web
- [X] Public access/notice via Government Office
- [] Public access/notice via a newspaper
- [X] Public access/notice via Public Request
- [] Public access/notice via a Public Library
- [] Public access/notice via other method

#### Describe your Drinking-Water System

The City of St. Catharines owns and operates a Class II stand-alone residential water distribution system. The City receives its drinking water from the Regional Municipality of Niagara's Decew Water Treatment Plant. The source water is surface water from Lake Erie via an intake from the Welland Ship Canal. The distribution system consists of approximately 605 kilometres of watermain, 3,567 hydrants and approximately 5,578 valves.

#### Were any significant expenses incurred to?

- [] Install required equipment
- [X] Repair required equipment
- [X] Replace required equipment

### Please provide a brief description and a breakdown of monetary expenses incurred

In 2023, approximately \$11,930,000 was budgeted for watermain capital projects. The total length of watermain sections corresponding to the budgeted amount was approximately 7.7 km of watermain.

In addition, the cost of watermain repairs in 2023 was \$261,807.

Provide details on the notices submitted in accordance with subsection 18(1) of the Safe Drinking-Water Act or section 16-4 of Schedule 16 of O.Reg.170/03 and reported to Spills Action Centre

Incident Date	Parameter	Result	Unit of Measure	Corrective Action	Corrective Action Date(s)	Date Resolved
May 25, 2023	Total Coliform	1	cfu/100mL	Flush and resample	May 26, 27, 2023	May 30, 2023
June 30, 2023	Free Chlorine	0.04	mg/L	Flush and resample	June 30, 2023	July 4, 2023
July 6, 2023	Free Chlorine	0.04 0.01	mg/L	Flush and resample	July 6, 2023	July 6, 2023
July 13, 2023	Total Coliform	1	cfu/100mL	Flush and resample	July 14, 15, 2023	July 18, 2023
Sep 20, 2023	Free Chlorine	0.04	mg/L	Flush and resample	Sep 20, 2023	Sep 22, 2023

### Microbiological testing done under the Schedule 10, 11 or 12 of Regulation 170/03, during this reporting period.

	Number of Samples	Range of E.Coli Results (min #)-(max #)	Range of Total Coliform Results (min #)-(max #)	Number of HPC Samples	Range of HPC Results (min #)-(max #)
Distribution	1602	0	0-1	906	0-153

Operational testing done under Schedule 7, 8 or 9 of Regulation 170/03 during the period covered by this Annual Report.

	Number of Grab Samples	Range of Results (min #)-(max #)	Unit of Measure	
Chlorine	2346	0.01-1.51	mg/L	

#### Summary of lead testing under Schedule 15.1 during this reporting period

(Applicable to the following drinking water systems; large municipal residential systems, small municipal residential systems, and non-municipal year-round residential systems)

Location Type	Number of Samples	Range of Lead Results (min#) – (max #)	Unit of Measure	Number of Exceedances
Plumbing	9	<0.001-101	mg/L	1
Distribution	10	<0.001	mg/L	0

### Summary of Organic parameters sampled during this reporting period or the most recent sample results.

Parameter	Sample Date	Result Value	Unit of Measure	Exceedance
THM (Note: show latest annual average)	Jan.– Dec. 2023	0.028	mg/L	0
HAA (Note: show latest annual average)	Jan.– Dec. 2023	0.010	mg/L	0