

Carleton Place Drinking Water System

2017 Annual Water Report

Reporting period of January 1, 2017 – December 31, 2017

Prepared For: The Town of Carleton Place

Prepared By:



Ontario Clean Water Agency
Agence Ontarienne Des Eaux

This report has been prepared to satisfy the annual reporting requirements of the
Provincial Regulations and Guidelines

Contents

Report Availability	1
Compliance Report Card	1
Quality Control Measures	2
System Process Description	3
Raw Source	3
Treatment.....	3
Actiflo treatment (coagulant/flocculation/sedimentation)	3
Filtration.....	3
Residual Management	4
Elevated Tower	4
Treatment Chemicals used during the reporting year:.....	4
Summary of Non-Compliance	5
Adverse Water Quality Incidents.....	5
Boil Water Advisory	5
Non-Compliance	5
Non-Compliance Identified in a Ministry Inspection:.....	5
Flows	6
Raw Water Flows	6
Monthly Total Flow Summary (m3/d).....	6
Monthly Rate of Taking Summary (L/min)	6
Treated Water Flows	7
Monthly Flow Summary (m3/d).....	7
Annual Volumes (m ³ /year).....	7
Regulatory Sample Results Summary	8
Microbiological Testing.....	8
Operational Testing	8
Laboratory.....	8
Additional Legislated Samples	9
Inorganic Parameters	9
Schedule 15 Sampling (Lead)	10

Organic Parameters	10
Maintenance Summary.....	11
Facility Maintenance Highlights	12
Distribution Maintenance Highlights.....	12
Watermain Break	13
Community Complaints.....	13
QEMS	13
Water Taking and Transfer Data.....	13
<u>Appendix</u>	
WTRS Data and Submission Confirmation	A

Report Availability

This system serves more than 10,100 residence and the annual reports will be available to residence at the Town of Carleton Place Municipal Office and on the website (www.carletonplace.ca). Notification will be provided on the website and at the Municipal Office and copies provided free of charge if requested.

The Town of Carleton Place Municipal Office is located at 175 Bridge Street, Carleton Place, Ontario,

There are no systems additional drinking water systems that receive water from this facility.

Compliance Report Card

Drinking Water System Number:	210000372
System Owner:	Town of Carleton Place
Operating Authority:	Ontario Clean Water Agency
Drinking Water System Category:	Large Municipal Residential
Reporting Period:	January 1, 2017 – December 31, 2017

Compliance Event	# of Events	Details
Ministry of Environment Inspections	1	Report received from February 16, 2017 Inspection on April 11, 2017 <ul style="list-style-type: none"> Inspection Rating 100%
Ministry of Labour Inspections	0	
QEMS External Audit	1	One (1) External Surveillance Audit No Non-Conformance
AWQI's	0	
Non-Compliance	2	Filter Effluent Turbidity 2B- trending loss Filter Effluent Turbidity 3B –trending loss
Boil Water Advisories	0	
Community Complaints	31	See Community Complaint section of this report
Spills	0	

Quality Control Measures

The Town of Carleton Place facilities are part of OCWA's operational Eastern Regional Hub. The facilities are supported by cluster, regional and corporate resources. Operational Services are delivered by OCWA staff who live and work in the community.

OCWA operates facilities in compliance with applicable regulations. The facility has comprehensive manuals detailing operations, maintenance, instrumentation, and emergency procedures. All procedures are treated as active documents, with annual reviews.

OCWA has additional "Value Added" and operational support services that the Town of Carleton Place benefits from including:

- Access to a network of operational compliance and support experts at the regional and corporate level, as well as affiliated programs that include the following:
 - Quality & Environmental Management System, Occupational Health & Safety System and an internal compliance audit system.
 - Process Data Collection (PDC) facility operating information repository, which consolidates field data, online instrumentation, and electronic receipt of lab test results for reporting, tracking and analysis.
 - Work Management System (WMS) that tracks and reports maintenance activities, and creates predictive and preventative reports.
 - Outpost 5 wide-area SCADA system allows for process optimization and data logging, process trending, remote alarming and optimization of staff time.
- Client reporting which includes operational data, equipment inventory, financial statements, maintenance work orders, and capital status reports
- Site-Specific Contingency Plans and Standard Operating Procedures
- Use of accredited laboratories
- Additional support in response to unusual circumstances, and extra support in an emergency.
- Use of sampling schedules for external laboratory sampling

System Process Description

Raw Source

The source water for the Carleton Place DWS is the Mississippi River. The water intake is a 600 millimetre (mm) diameter intake pipe complete with an upturned elbow at the river which is surrounded by a coarse screen.

Raw water is directed through the intake pipe into a raw water well, the first of which is equipped with a 1/4 inch opening mesh screen. The wet well is equipped with four (4) vertical turbine low lift pumps which are operator selectable and are automatically controlled by the water level in the treated water clear well.

The raw water is directed by the low lift pumps into a 400 mm diameter stainless steel header which extends to the Actiflo™ treatment process. The common raw water header is equipped with a flow meter. An in-line static mixer and coagulant injection point are located just upstream of the flow meter. The system is designed to provide pre-chlorination with chlorine gas at this point, dependent on the time of year and the source water conditions. A chlorine injection point is also located near the raw water intake and is used for pre-chlorination / zebra mussel control.

Treatment

The Carleton Place Drinking Water System (DWS) provides a potable water supply to the residents of Carleton Place. The facilities consist of a Class III Actiflo treatment process operated by the Ontario Clean Water Agency and a Class I water distribution system operated by the Carleton Place Public Works. Raw water is drawn from the Mississippi River.

The treatment process involves Coagulation / flocculation / sedimentation, filtration, post-chlorination (primary disinfection) and seasonal distribution system chlorine residual (secondary disinfection). This multiple barrier approach helps to ensure consistently compliant drinking water quality, and ultimately improves the level of public health protection.

Actiflo treatment (coagulant/flocculation/sedimentation)

The treatment system consists of two (2) Actiflo™ treatment trains operating in parallel. Each treatment train consists of a coagulation tank, an injection tank, a maturation tank and lamella settling tubes. Each treatment train is complete with microsand recirculation pumps, piping and hydrocyclones, which are used to separate the microsand from residual solids. A polymer coagulant aid is added to the process at the hydrocyclones.

Filtration

The effluent from the two (2) Actiflo™ settling tanks is discharged to a concrete splitter box which divides the flow to three (3) cylindrical double compartment dual media (sand/anthracite) gravity filters. The filters are each equipped with underdrains, self-contained backwash storage compartments, air scour systems and automated control valves for backwash operations.

Filtered water is chlorinated and fluoridated prior to being directed to two (2) underground storage reservoirs, which include isolation gates and piping for flow control. The Carleton Place DWS has

provision to add lime to the filtered water. Four (4) vertical turbine high lift pumps discharge treated water into the distribution system via a common 450 mm diameter discharge header. Filter to Waste is directed to the backwash flow residue compartment.

Residual Management

Backwash wastewater and Actiflo™ residuals are discharged to a two compartment settling tank equipped with two sludge pumps and two supernatant pumps. One compartment is configured to receive the Actiflo residuals and one compartment is configured to receive the filter backwash residue. The Actiflo compartment is configured to send all residue to the on-site pumping station. The pumping station pumps the residue to the sewer collection system.

The filter backwash compartment is configured to pump the supernatant is discharged to the Mississippi River while settled sludge is discharged to the sanitary sewer.

Elevated Tower

The distribution system for the Town of Carleton Place includes a 3,180 m³ elevated water storage tower located on Nelson Street, east of Park Street. The water tower has provision for chlorine boosting with sodium hypochlorite, however, this is only used in the summer during warmer temperatures to maintain adequate chlorine residual in the distribution system.

Treatment Chemicals used during the reporting year:

Chemical Name	Use	Supplier
PAS8	Primary Coagulation	Kemira
Polymer	Coagulation Aid	BASF
Hydrofluorosilic Acid	Fluoridation	Brenntag
Chlorine Gas	Primary Disinfection	Brenntag
Sodium Hypochlorite	Distribution Disinfection Boosting	Brenntag

Summary of Non-Compliance

Adverse Water Quality Incidents

AWQI #	Date	Legislation	Problem	Details	Corrective ActionTaken
There were no Adverse Water incidents during the reporting period.					

Boil Water Advisory

Health Unit	Date	Reason	Details	Corrective ActionTaken
There were no Boil Water advisories during the reporting period.				

Non-Compliance

Legislation	requirement(s) system failed to meet	duration of the failure	Corrective Action	Status
170/03	Trending loss on Filter 3B	15 hours	Signage now posted to remind operators	Closed
	Trending loss on Filter 2B	5 Hours		

Non-Compliance Identified in a Ministry Inspection:

There was one (1) inspection report received during this reporting period.

- Report received from April 11, 2017.
- Inspection on February 2, 2017
 - Inspection Rating 100%

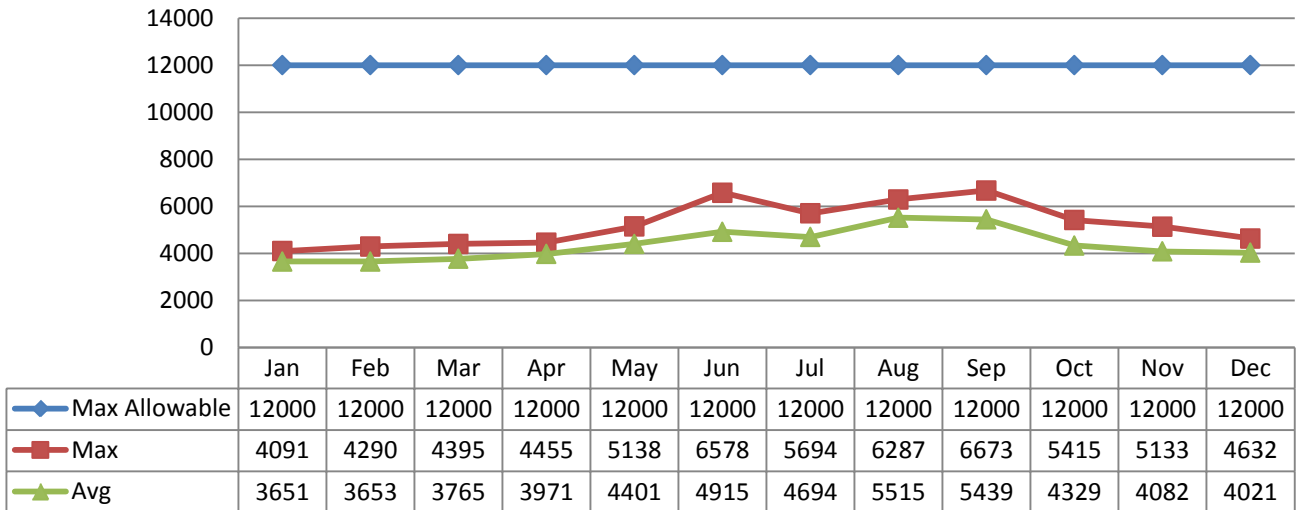
Legislation	requirement(s) system failed to meet	duration of the failure (i.e. date(s))	Corrective Action	Status
There were no Non-Compliance in the Ministry Inspection				

Flows

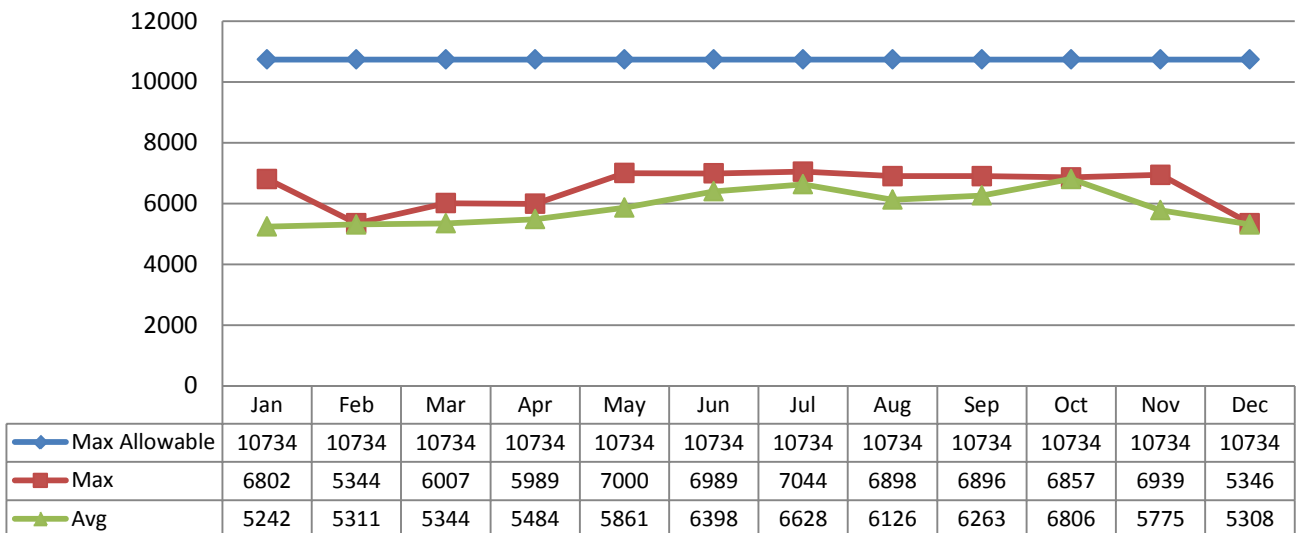
Raw Water Flows

The Raw Water flows are regulated under the Permit to Take Water.

Monthly Total Flow Summary (m3/d)



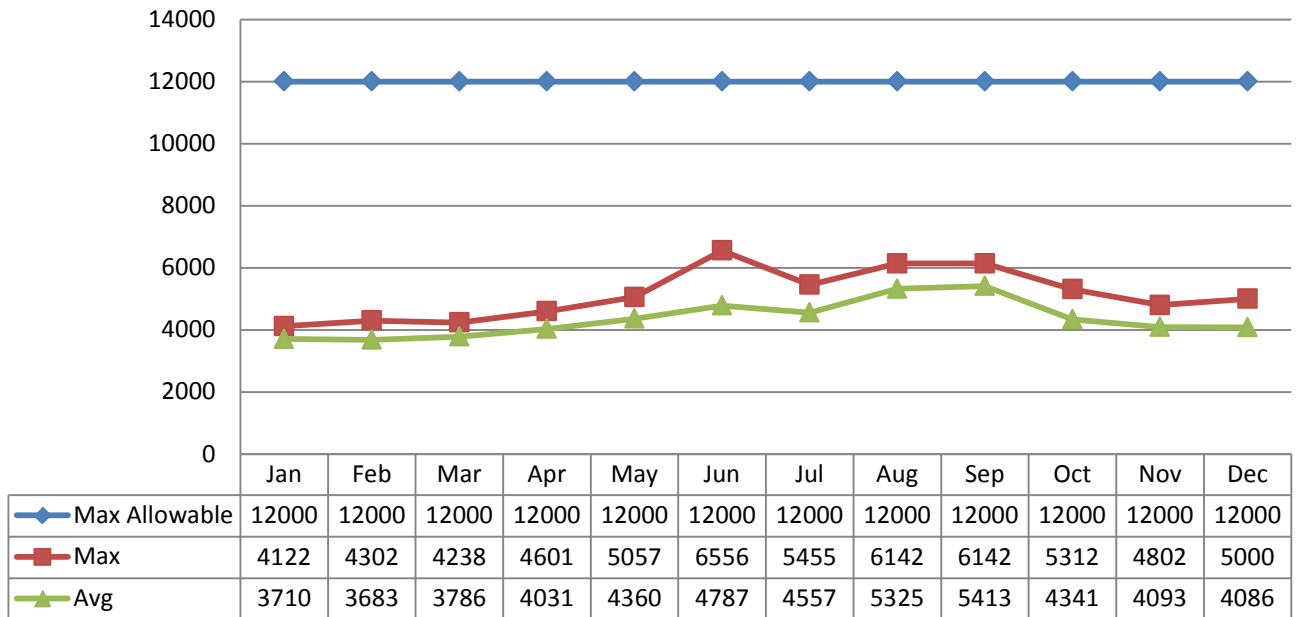
Monthly Rate of Taking Summary (L/min)



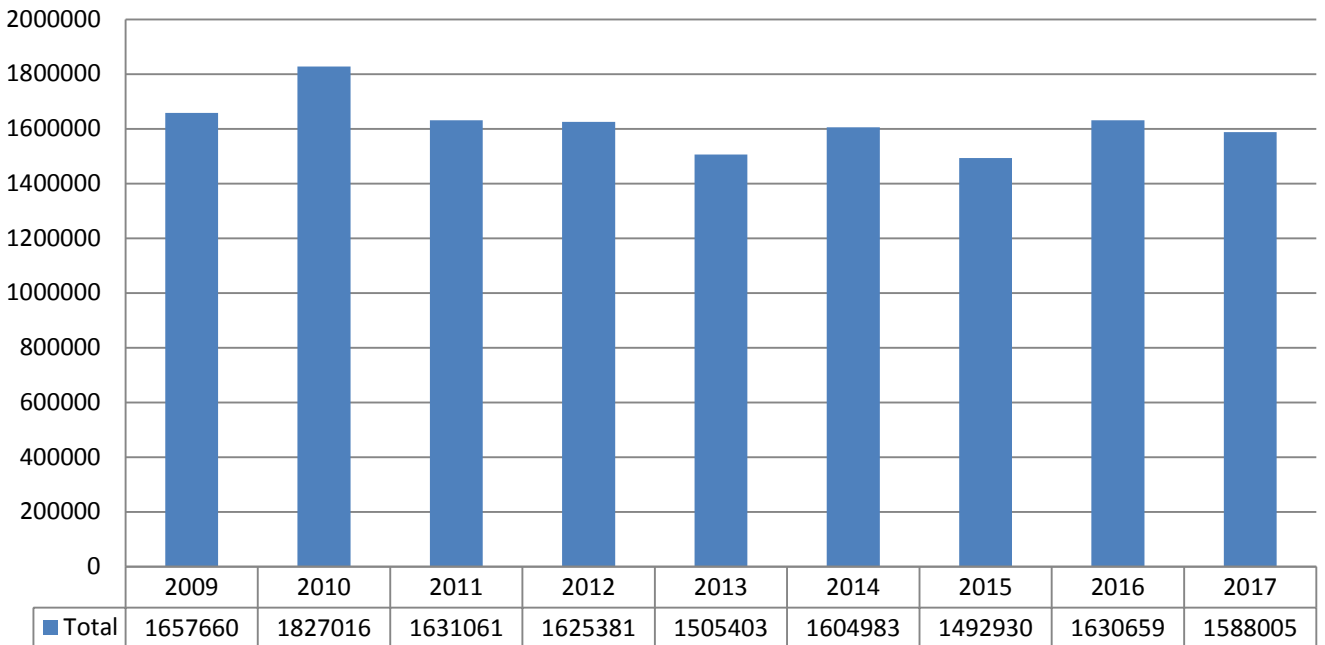
Treated Water Flows

The Treated Water flows are regulated under the Municipal Licence.

Monthly Flow Summary (m3/d)



Annual Volumes (m³/year)



Regulatory Sample Results Summary

Microbiological Testing

	No. of Samples Collected	Range of E.Coli		Range of Total Coliform Results		Number of HPC Samples	Range of HPC Results	
		Min	Max	Min	Max		Min	Max
Raw Water	52	0	12	2	66			
Treated Water	52	0	0	0	0	52	<2	4
Distribution System	367	0	0	0	0	106	<2	12

Operational Testing

	No. of Samples Collected	Range of Results	
		Minimum	Maximum
Turbidity, On-Line (NTU) - RW	8760	0.14	12.16
Turbidity, On-Line (NTU) - TW	8760	0	1.998
Turbidity, On-Line (NTU) - Filt1A	8760	0.045	0.9663
Turbidity, On-Line (NTU) - Filt1B	8760	0.0409	1.5675
Turbidity, On-Line (NTU) - Filt2A	8760	0.0459	1.18
Turbidity, On-Line (NTU) - Filt2B	8760	0.0466	2
Turbidity, On-Line (NTU) - Filt3A	8760	0.0231	1.887
Free Chlorine Residual, On-Line (mg/L) - TW	8760	0.6263	3.8066
Free Chlorine Residual, In-House (mg/L) - TW	141	1.39	2.48
Free Chlorine Residual, TW Field (mg/L) Lab Upload - TW	52	1.36	2.2
Fluoride Residual, On-Line (mg/L) – DW	8760	1.37	2.76
Free Chlorine Residual, DW Field (mg/L) Lab Upload - DW	367	0.6	2.16

*Fluoride system out of service August-November 2017

Laboratory

Parameter	# of grab samples taken	Range of Results (min # - max #)
Raw Water Alkalinity (mg/L)	12	71-93 mg/L
Raw Water Colour (TCU)	12	6-39
Raw Water Dissolved Organic Carbon (mg/L)	12	5.9-9.2
Raw Water Total Organic Carbon (mg/L)	12	5.9-7.3
Raw Water pH	12	7.7-8.04
Treated Water Alkalinity (mg/L)	12	48-64
Treated Aluminum (ug/L)	12	30-100 ug/L
Treated Water Colour (TCU)	12	2-13
Treated Water Conductivity (uS/cm)	12	197-241

Parameter	# of grab samples taken	Range of Results (min # - max #)
Treated Water Dissolved Organic Carbon (mg/L)	12	2.4-4.3
Treated Water Fluoride (mg/L)	12	0.1*-1.2
Treated Water Total Organic Carbon (mg/L)	12	2.4-4.3
Treated Water Total Hardness (mg/L)	12	83-112
Treated Water pH	12	7.26-7.73

*Fluoride system out of service August -November 2017

Additional Legislated Samples

Legal Document	Date of Issuance	Parameter	Date Sampled	Result	Unit of measure
Municipal Licence 172-101 Issue 2	March 10, 2016	Suspended Solids (Limit 25 mg/L)	Annual Avg.	22	mg/L

Inorganic Parameters

These parameters are tested annually as a requirement under 170/03. Sodium and Fluoride are required to be tested every 5 years. Nitrates are tested quarterly as required under 170/03. In the event any of the parameters exceed half of the maximum allowable concentration the parameter is required to be sampled quarterly.

- MAC = Maximum Allowable Concentration as per O.Reg 169/03
- BDL = Below the laboratory detection level

	Sample Date (yyyy/mm/dd)	Sample Result	MAC	No. of Exceedances	
				MAC	1/2 MAC
TREATED WATER					
Antimony: Sb (ug/L) - TW	2017/01/11	<MDL 0.1	6.0	No	No
Arsenic: As (ug/L) - TW	2017/01/11	0.4	25.0	No	No
Barium: Ba (ug/L) - TW	2017/01/11	50.0	1000.0	No	No
Boron: B (ug/L) - TW	2017/01/11	<MDL 5.0	5000.0	No	No
Cadmium: Cd (ug/L) - TW	2017/01/11	<MDL 0.02	5.0	No	No
Chromium: Cr (ug/L) - TW	2017/01/11	<MDL 2.0	50.0	No	No
Mercury: Hg (ug/L) - TW	2017/01/11	<MDL 0.02	1.0	No	No
Selenium: Se (ug/L) - TW	2017/01/11	<MDL 1.0	50.0	No	No
Uranium: U (ug/L) - TW	2017/01/11	<MDL 0.05	20.0	No	No
Additional Inorganics					
Fluoride (mg/L) - TW	Fluoride is added in process. Results under Operational Parameters				
Nitrite (mg/L) - TW	2017/03/07	0.2	1.0	No	No
Nitrite (mg/L) - TW	2017/06/06	<MDL 0.1	1.0	No	No
Nitrite (mg/L) - TW	2017/09/05	<MDL 0.1	1.0	No	No
Nitrite (mg/L) - TW	2017/12/05	<MDL 0.1	1.0	No	No
Nitrate (mg/L) - TW	2017/03/07	0.4	10.0	No	No
Nitrate (mg/L) - TW	2017/06/06	<MDL 0.1	10.0	No	No

	Sample Date (yyyy/mm/dd)	Sample Result	MAC	No. of Exceedances	
				MAC	1/2 MAC
Nitrate (mg/L) - TW	2017/09/05	<MDL 0.1	10.0	No	No
Nitrate (mg/L) - TW	2017/12/05	<MDL 0.1	10.0	No	No
Sodium: Na (mg/L) - TW	2015/02/03	4.0	20*	No	No

*There is no "MAC" for Sodium. The aesthetic objective for sodium in drinking water is 200 mg/L. The local Medical Officer of Health should be notified mg/L when the sodium concentration exceeds 20 mg/L so that this information may be communicated to local physicians for their use with patients on sodium restricted diets.

Schedule 15 Sampling (Lead)

This facility is sampling under the exemption requirements of O.Reg 170/03 Schedule 15 sampling.

Location Type	Number of Samples	Range of Results		MAC (ug/L)	Number of Exceedances
		MIN	MAX		
Distribution System - Lead Results (ug/L)	Lead Sampling completed in 2016. Next lead sampling in 2019.				
Distribution System - Alkalinity (mg/L)	6	52	64		
Distribution System - pH Lab	6	6.69	6.98		

Organic Parameters

These parameters are tested annually as a requirement under 170/03. In the event any of the parameters exceed half of the maximum allowable concentration the parameter is required to be sampled quarterly.

	Sample Date (mm/dd/yyyy)	Sample Result	MAC	Number of Exceedances	
				MAC	1/2 MAC
Treated Water					
Alachlor (ug/L) - TW	2017/01/11	<MDL 0.3	5.00	No	No
Azinphos-methyl (ug/L) - TW	2017/01/11	<MDL 1.0	20.00	No	No
Benzene (ug/L) - TW	2017/01/11	<MDL 0.5	1.00	No	No
Benzo(a)pyrene (ug/L) - TW	2017/01/11	<MDL 0.005	0.01	No	No
Bromoxynil (ug/L) - TW	2017/01/11	<MDL 0.3	5.00	No	No
Carbaryl (ug/L) - TW	2017/01/11	<MDL 3.0	90.00	No	No
Carbofuran (ug/L) - TW	2017/01/11	<MDL 1.0	90.00	No	No
Carbon Tetrachloride (ug/L) - TW	2017/01/11	<MDL 0.2	2.00	No	No
Chlorpyrifos (ug/L) - TW	2017/01/11	<MDL 0.5	90.00	No	No
Diazinon (ug/L) - TW	2017/01/11	<MDL 1.0	20.00	No	No
Dicamba (ug/L) - TW	2017/01/11	<MDL 5.0	120.00	No	No
1,2-Dichlorobenzene (ug/L) - TW	2017/01/11	<MDL 0.1	200.00	No	No
1,4-Dichlorobenzene (ug/L) - TW	2017/01/11	<MDL 0.2	5.00	No	No
1,2-Dichloroethane (ug/L) - TW	2017/01/11	<MDL 0.1	5.00	No	No
1,1-Dichloroethane (ug/L) - TW	2017/01/11	<MDL 0.1	14.00	No	No
Dichloromethane (Methylene Chloride) (ug/L) - TW	2017/01/11	<MDL 0.3	50.00	No	No
2,4-Dichlorophenol (ug/L) - TW	2017/01/11	<MDL 0.1	900.00	No	No

	Sample Date (mm/dd/yyyy)	Sample Result	MAC	Number of Exceedances	
				MAC	1/2 MAC
2,4-Dichlorophenoxy acetic acid (2,4-D) (ug/L) - TW	2017/01/11	<MDL 5.0	100.00	No	No
Diclofop-methyl (ug/L) - TW	2017/01/11	<MDL 0.5	9.00	No	No
Dimethoate (ug/L) - TW	2017/01/11	<MDL 1.0	20.00	No	No
Diquat (ug/L) - TW	2017/01/11	<MDL 5.0	70.00	No	No
Diuron (ug/L) - TW	2017/01/11	<MDL 5.0	150.00	No	No
Glyphosate (ug/L) - TW	2017/01/11	<MDL 25.0	280.00	No	No
Malathion (ug/L) - TW	2017/01/11	<MDL 5.0	190.00	No	No
2-Methyl-4chlorophenoxyacetic Acid (MCPA) (ug/L)	2017/01/11	<MDL 10	N/A	No	No
Metolachlor (ug/L) - TW	2017/01/11	<MDL 3.0	50.00	No	No
Metribuzin (ug/L) - TW	2017/01/11	<MDL 3.0	80.00	No	No
Paraquat (ug/L) - TW	2017/01/11	<MDL 1.0	10.00	No	No
PCB (ug/L) - TW	2017/01/11	<MDL 0.05	3.00	No	No
Pentachlorophenol (ug/L) - TW	2017/01/11	<MDL 0.1	60.00	No	No
Phorate (ug/L) - TW	2017/01/11	<MDL 0.3	2.00	No	No
Picloram (ug/L) - TW	2017/01/11	<MDL 5.0	190.00	No	No
Prometryne (ug/L) - TW	2017/01/11	<MDL 0.1	1.00	No	No
Simazine (ug/L) - TW	2017/01/11	<MDL 0.5	10.00	No	No
Terbufos (ug/L) - TW	2017/01/11	<MDL 0.3	1.00	No	No
Tetrachloroethylene (ug/L) - TW	2017/01/11	<MDL 0.2	10.00	No	No
2,3,4,6-Tetrachlorophenol (ug/L) - TW	2017/01/11	<MDL 0.1	100.00	No	No
Triallate (ug/L) - TW	2017/01/11	<MDL 10.0	230.00	No	No
Trichloroethylene (ug/L) - TW	2017/01/11	<MDL 0.1	5.00	No	No
2,4,6-Trichlorophenol (ug/L) - TW	2017/01/11	<MDL 0.1	5.00	No	No
Trifluralin (ug/L) - TW	2017/01/11	<MDL 0.5	45.00	No	No
Vinyl Chloride (ug/L) - TW	2017/01/11	<MDL 0.2	1.00	No	No
Distribution Water					
Trihalomethane: Total (ug/L) Annual Average	2017/01/01	57.9	100.00	No	Yes

Maintenance Summary

OCWA uses a risk-based preventative maintenance framework that ensures assets are maintained to manufacturer's and/or industry standards. Maintenance is completed using various tools and operational supports. The Ontario Clean Water Agency has specialized certified staff such as Millwrights, Electricians and Instrumentation Specialists to name a few.

OCWA uses a Workplace Maintenance System (WMS). WMS is a maintenance tracking system that can generate work orders as well as give summaries of completed and scheduled work. During the year, the

operating authority at the facility generates scheduled work orders on a weekly, monthly and annual basis. The service work is recorded in the work order history. This ensures routine and preventive maintenance is carried out. Emergency and capital repair maintenance is completed and added to the system.

Capital projects are listed and provided to the Town of Carleton Place in the form of a “Major Maintenance Forecast”. This list is developed by facility staff and provides recommendations for facility components requiring upgrading or improvement.

Facility Maintenance Highlights

WO#	Details
543103	Blanket #2 Items under \$200
243230	Coagulant Flow Meter
243792	Chlorinator service and parts
264280	Unit Heater Replacement
264283	Fluoride Spill Cleanup Costs
289084	Fluoride Pump Panel Replacement
290285	Coagulant Pump Panel Replacement
344564	DWQMS Audit 2017
437994	SCADA ups failure
578686	Daycare Lead Sampling
440929	Facility hardware inventory restock
264479	Chlorinator Service
409719	Storm internet access
473470	Isolation valves BF preventer
472820	Turbidity Analyzer replacement x2
377422	Coagulant Tank Clean Out
290009	Install chlorine analyzer
241557	Actiflo Valve Replacement
472577	Tower Safety Inspection
472579	Water Tower warranty inspection
505456	Water Tower Warranty Inspection

Distribution Maintenance Highlights

- Conducted routine maintenance which includes flushing hydrants and reading water meters.
- Inspections of valves on Bridge Street in the vicinity of the Inverness development
- Responded to a few frozen water services and repaired service leaks
- Installation of services for new construction on Bridge Street and Frank Street
- Began preparations for construction on the remaining portion of Henry Farm (Joseph, Preston, Warren, and Nichols).

- The watermain has now been connected to the pumping station south of Hwy. 7
- Installation of new services for the splash pad expansion in Riverside Park
- Commissioned 2.6km of new watermain in Millers' Crossing and Miller's Crossing
- Installation of new services on Napoleon and provided oversight of new services installed on Franklin Street
- Hydrant repair on Argyle Street
- Public Works responded to 1037 Request for Locates in 2017 compared to 896 in 2016
- Oversight was provided to the Flora Street watermain relining project
- Regular hydrant flushing schedule along with increased flushing of new development areas where Public Works has taken over operation of the mains but occupancy (and consumption) is minimal. (Miller's Crossing, Meadow Ridge, Jackson Ridge)
- Winter checks on hydrants and installed snow markers
- Service line repair at 457 Joseph
- Valve exercising – over 150 valves were exercised in 2017
- Summer services off and blown out in preparation for colder temperatures
- Oversight provided to Cavanagh (Meadow Ridge) to remove stacks and install flushing hydrant
- Fire flow testing of hydrants was conducted in spring 2017.
- All hydrants were painted and reflective fire flow indicators were affixed to each hydrant.

Watermain Break

Location	Date	Details	Corrective Action
No Watermain Breaks			

Community Complaints

	Number of Incidents
Service Related eg. Noise, Pressure, No Water	18
Taste and Odour	3
Visual	8
Other	1

QEMS

The Ontario Clean Water Agency has received Full scope accreditation. There was a surveillance audit completed by a third party auditor and there were no non-conformances identified. The Internal Audit and Management Review were completed. Minutes from the Management Review were provided to the Town.

Water Taking and Transfer Data

2017 Data was submitted electronically on January 18, 2017 under permit #1310-9UHPPW. The confirmation and a copy of the data that was submitted are attached in Appendix A.

Appendix A

WTRS Data and Submission Confirmation

18/01/2018

Water Taking Reporting System



Location: WTRS / WT DATA / Input WT Record

WTRS-WT-008

Water Taking Data submitted successfully.

Confirmation:

Thank you for submitting your water taking data online.

Permit Number: 1310-9UHPPW

Permit Holder: THE CORPORATION OF THE TOWN OF CARLETON PLACE.

Received on: Jan 18, 2018 3:04 PM

This confirmation indicates that your data has been received by the Ministry, but should not be construed as acceptance of this data if it differs from that specified on the Permit Number, assigned to the Permit Holder stated above.

[Return to Main Page](#)

TOWN2 CARLETON PLACE2 | 2018/01/18

version: v4.5.0.7 (build#: 17)

Last modified: 2017/09/15

	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	January	3614	3497	4024	3749	3487	4029	3667	3593	3860	3568	3291	3650	3890	3726	3564
16		17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
4023		3755	3617	3520	3141	4091	3782	3507	3054	3602	3608	3824	3522	3517	3753	3649
February	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	3561	3598	3502	4290	3736	3400	3662	3468	3894	3325	3867	3984	3406	3553	3522	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
	3518	3838	3427	3306	3757	3570	3836	3496	3585	3683	3992	3718	3792			
March	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	3558	3979	3418	3902	3846	3793	4110	3811	3874	3654	3747	3891	3820	3903	3166	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
	4058	3618	3367	4102	3817	3886	3460	3482	4395	3497	4230	3699	3503	3900	3808	3434
April	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	3902	4291	3442	3865	3820	3680	3987	3561	4455	4078	3760	4304	3620	3871	3972	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
	4018	4088	4069	3561	3968	3907	4337	4195	4119	3962	3710	4043	4419	4056	4070	
May	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	4558	4033	4019	4207	4076	3800	4455	4512	3950	3751	4251	3873	4133	4503	4262	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
	4366	5033	4687	4681	5067	4442	4399	4862	4245	4682	4324	4791	5138	4095	4748	4503
June	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	4208	4288	4828	4466	4582	4840	4463	5023	5263	5084	5753	6442	6086	6578	5246	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
	4643	4777	4926	5715	4591	5275	4874	4190	5823	4576	4168	4115	4494	4187	3964	

July	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	4170	3732	4696	4738	5067	4914	4287	4308	4593	3982	4793	4528	4041	4060	4831	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
4830	4778	5152	5095	4483	5606	4647	5082	4378	4354	4531	4860	5011	4937	5337	5694	
August	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	5945	5691	5790	5124	4911	5139	5217	5679	5926	5519	5922	4966	5329	4653	6236	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
5793	5551	5490	5323	5884	6118	5070	5435	5961	5376	5637	5344	5390	6287	6130	4131	
September	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	6673	5180	4827	5267	5826	5522	5034	5067	5405	5539	6087	5966	5094	5369	5485	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
5477	5905	5667	5910	5231	5375	5142	5799	5997	5964	5784	4790	5044	4376	4377		
October	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	5415	4657	5133	4083	4072	4171	4321	4358	4069	3988	4144	4938	4399	4268	4256	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
3965	4591	4156	4196	4133	4531	4581	4344	3825	4246	4269	3836	4177	4639	4027	4401	
November	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	3945	4451	5133	4018	4719	3980	4229	4064	3981	4397	4127	4236	3795	3966	4519	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
4135	4050	4043	4390	4167	4005	3542	3728	3689	3853	3915	3700	3795	3761	4119		
December	1	2	3	4	5	6	7	8	9	10	11	12	13	14	15	
	3662	3916	4224	4267	3829	3767	3896	3709	4139	4236	3748	4101	3549	4272	3526	
	16	17	18	19	20	21	22	23	24	25	26	27	28	29	30	31
4388	3929	4223	3983	4333	3978	4114	3827	4330	3570	3883	4257	4154	4118	4632	4094	