



2019

DRINKING WATER

ANNUAL REPORT

**Prepared by the Environmental Service
January 1, 2019 to December 31, 2019 reporting period**



ANNUAL REPORT

Drinking-Water System Number:	177-101
Drinking-Water System Name:	Hawkesbury Drinking Water System
Drinking-Water System Owner:	Corporation of the Town of Hawkesbury
Drinking-Water System Category:	Large Municipal Residential System
Period being reported:	January 1, 2019 to December 31, 2019

<p><u>Complete if your Category is Large Municipal Residential or Small Municipal Residential</u></p> <p>Does your Drinking-Water System serve more than 10,000 people? Yes [<input checked="" type="checkbox"/>] No [<input type="checkbox"/>]</p> <p>Is your annual report available to the public at no charge on a web site on the Internet? Yes [<input checked="" type="checkbox"/>] No [<input type="checkbox"/>]</p> <p>Location where Summary Report required under O. Reg. 170/03 Schedule 22 will be available for inspection.</p> <div style="border: 1px solid black; padding: 5px;"> <ul style="list-style-type: none"> - ENVIRONMENTAL DEPARTMENT - HAWKESBURY PUBLIC LIBRARY - WEB SITE: WWW.HAWKESBURY.CA - TOWNSHIP OF CHAMPLAIN </div>	<p><u>Complete for all other Categories.</u></p> <p>Number of Designated Facilities served:</p> <div style="border: 1px solid black; padding: 5px; width: 100px;">n/a</div> <p>Did you provide a copy of your annual report to all Designated Facilities you serve? Yes [<input type="checkbox"/>] No [<input type="checkbox"/>]</p> <p>Number of Interested Authorities you report to:</p> <div style="border: 1px solid black; padding: 5px; width: 100px;"></div> <p>Did you provide a copy of your annual report to all Interested Authorities you report to for each Designated Facility? Yes [<input type="checkbox"/>] No [<input type="checkbox"/>]</p>
--	--

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
Township of Champlain (L'Orignal)	260037102
Township of Champlain (Vankleek Hill)	260002395
Township of Champlain (Park Laurentien)	260090012



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 []

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

- Public access/notice via the web
- Public access/notice via Government Office
- Public access/notice via a newspaper
- 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 Corporation of the Town of Hawkesbury’s drinking water system serves 3,917 water services in its own town and approximately 1,456 services in the township of Champlain.

Drinking water is supplied by the Drinking Water Plant, which is owned and operated by the Corporation of the Town of Hawkesbury. The plant was built in 1953 and went through significant expansion and modernization in 1996-1997.

The key elements of Hawkesbury’s drinking water system are:

- A raw water pumping station,
- A water treatment plant,
- A water distribution system for the Town of Hawkesbury,
- A remote standpipe water storage in the Town of Hawkesbury complete with booster pumping system,
- A booster pumping station for the Town of Vankleek Hill,
- A distribution pipeline connection to supply the Village of L’Orignal, complete with metering chamber, and
- A distribution connection to Laurentian Park (Champlain), complete with metering chamber.

The raw water source for Hawkesbury is the Ottawa River. Water is drawn through the intake pipe from the low lift pumping station. Raw water flows into the drinking water plant where it undergoes a treatment process based on coagulation and flocculation followed by clarification and filtration.

Treated water then travels through over 35 km of water distribution piping system and stored in a 5,450-m³ standpipe water storage.



List all water treatment chemicals used over this reporting period:

- Aluminium Sulphate
- Aluminium hydroxide sulphate
- Sodium Silicate
- Sodium Aluminate
- Liquid Chlorine (compressed gas)
- HydroFluosilicic Acid
- Zinc Orthophosphate
- Caustic Soda
- Sodium Hypochlorite

Were any significant expenses incurred to:

- Install required equipment
- Repair required equipment
- Replace required equipment

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

WATER TREATMENT PLANT MAIN EXPENSES	
DESCRIPTION	COST
Water treatment discharge piping	274,000.00 \$
New sodium hypochlorite metering pump	3,230.00\$
Chemical storage upgrade design	100,000.00\$
New laser technology turbidity meters	19,500.00\$
Water treatment plant roof replacement	\$75,000.00\$

WATER DISTRIBUTION MAIN EXPENSES	
DESCRIPTION	COST
Cameron street rehabilitation completed at 80%. Maintenance of the CSO execution will begin in spring 2020.	2,500,000.00\$
New Harden street	1,000,000.00\$
Extension of Tessier street	530,000.00\$
Extension of Roxane Crescent street	50,000.00\$
Extension of Jacynthe/Roch street	20,000.00\$

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
April 23, 2019	Sodium	20.95	mg/l	Re-sampling	April 24, & 29, 2019
June 12, 2019	Total coliforms E.coli	37 14	cfu/100mL cfu/100mL	Re-sampling	June 12 & 13, 2019

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 Or Fecal Results (min #) - (max #)	Range of Total Coliform Results (min #) - (max #)	Number of HPC Samples	Range of HPC Results (min #) - (max #)
Raw	53	(0) – (131)	(2) – (334)	0	n/a
Treated	53	(0) – (0)	(0) – (0)	51	(2) – (4)
Distribution	426	(0) – (14)	(0) – (37)	156	(2) - (400)

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 #)
Turbidity	8760	(0.05) – (0.32) NTU
Chlorine	8760	(0.69) – (1.30) mg/l
Fluoride	8760	(0.12) – (0.78) mg/l

Summary of additional testing and sampling carried out in accordance with the requirement of an approval, order or other legal instrument:

Date of legal instrument issued	Parameter	Date Sampled	Result	Unit of Measure
April 25, 2005	TSS Creek discharge	1/ month	(3) – (17)	mg/L

Summary of Inorganic parameters tested during this reporting period or the most recent sample results:

Parameter	Sample Date	Result	Unit of Measure	Exceedance
Antimony	September 9, 2019	<0.0001	mg/L	No
Arsenic	September 9, 2019	0.0002	mg/L	No
Barium	September 9, 2019	0.009	mg/L	No
Boron	September 9, 2019	0.006	mg/L	No
Cadmium	September 9, 2019	<0.000015	mg/L	No
Chromium	September 9, 2019	<0.002	mg/L	No
Mercury	September 9, 2019	<0.00002	mg/L	No
Selenium	September 9, 2019	<0.001	mg/L	No
Sodium	December 30, 2019	14.4	mg/L	No
Uranium	September 9, 2019	<0.00005	mg/L	No
Nitrite	October 15, 2019	0.1	mg/L	No
Nitrate	October 15, 2019	0.3	mg/L	No

**only for drinking water systems testing under Schedule 15.2; this includes large municipal non-residential systems, small municipal non-residential systems, non-municipal seasonal residential systems, large non-municipal non-residential systems, and small non-municipal non-residential systems*

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

Location Type	Number of Samples	Range of Lead Results (min#) – (max #)	Unit of Measure	Number of Exceedances
Plumbing	14	0.00002 - 0.00889	mg/L	None
Distribution	6	0.00002 - 0.00070	mg/L	None

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

Parameter	Sample Date	Result	Unit of Measure	Exceedance
Alachlor	September 9, 2019	<0.3	µg /L	No
Atrazine + N-dealkylated metabolites	September 9, 2019	<0.05	µg /L	No
Azinphos-methyl	September 9, 2019	<1	µg /L	No
Benzene	September 9, 2019	<0.5	µg /L	No
Benzo(a)pyrene	September 9, 2019	<0.005	µg /L	No
Bromoxynil	September 9, 2019	<0.5	µg /L	No
Carbaryl	September 9, 2019	<3	µg /L	No
Carbofuran	September 9, 2019	<1	µg /L	No
Carbon Tetrachloride	September 9, 2019	<0.2	µg /L	No
Chlorpyrifos	September 9, 2019	<0.5	µg /L	No
Diazinon	September 9, 2019	<1	µg /L	No
Dicamba	September 9, 2019	<10	µg /L	No
1,2-Dichlorobenzene	September 9, 2019	<0.5	µg /L	No
1,4-Dichlorobenzene	September 9, 2019	<0.5	µg /L	No
1,2-Dichloroethane	September 9, 2019	<0.5	µg /L	No
1,1-Dichloroethylene (vinylidene chloride)	September 9, 2019	<0.5	µg /L	No
Dichloromethane	September 9, 2019	<5	µg /L	No
2-4 Dichlorophenol	September 9, 2019	<0.1	µg /L	No
2,4-Dichlorophenoxy acetic acid (2,4-D)	September 9, 2019	<10	µg /L	No
Diclofop-methyl	September 9, 2019	<0.9	µg /L	No
Dimethoate	September 9, 2019	<1	µg /L	No
Diquat	September 9, 2019	<5	µg /L	No
Diuron	September 9, 2019	<5	µg /L	No
Glyphosate	September 9, 2019	<25	µg /L	No
Malathion	September 9, 2019	<5	µg /L	No
MCPA	September 9, 2019	<10	µg /L	No
Metolachlor	September 9, 2019	<3	µg /L	No
Metribuzin	September 9, 2019	<3	µg /L	No
Monochlorobenzene	September 9, 2019	<0.5	µg /L	No
Paraquat	September 9, 2019	<1	µg /L	No
Pentachlorophenol	September 9, 2019	<0.1	µg /L	No
Phorate	September 9, 2019	<0.3	µg /L	No
Picloram	September 9, 2019	<20	µg /L	No
Polychlorinated Biphenyls(PCB)	September 9, 2019	<0.05	µg /L	No

Parameter	Sample Date	Result	Unit of Measure	Exceedance
Prometryne	September 9, 2019	<0.1	µg /L	No
Simazine	September 9, 2019	<0.5	µg /L	No
THM (latest annual average)	September 9, 2019	44.5	µg /L	No
Terbufos	September 9, 2019	<0.3	µg /L	No
Tetrachloroethylene	September 9, 2019	<0.5	µg /L	No
2,3,4,6-Tetrachlorophenol	September 9, 2019	<0.1	µg /L	No
Triallate	September 9, 2019	<10	µg /L	No
Trichloroethylene	September 9, 2019	<0.5	µg /L	No
2,4,6-Trichlorophenol	September 9, 2019	<0.1	µg /L	No
Trifluralin	September 9, 2019	<0.5	µg /L	No
Vinyl Chloride	September 9, 2019	<0.2	µg /L	No

List any Inorganic or Organic parameter(s) that exceeded half the standard prescribed in Schedule 2 of Ontario Drinking Water Quality Standards:

Parameter	Result	Unit of Measure	Date of Sample
n/a	n/a	n/a	n/a

AVAILABILITY OF REPORT

This report is available at the following locations:

- 1. Environmental Service Department**
 Corporation of the Town of Hawkesbury
 815 Main East
 Hawkesbury (Ontario) K6A 1B5
 (613) 632-4770
- 2. Hawkesbury Public Library**
 550 Higginson Street
 Hawkesbury, Ontario
 K6A 1H1
- 3. Town's website** www.hawkesbury.ca



If the format of this document is inadequate, please contact the Clerk's office at 613-632-0106 extension 2226 and the municipality will provide, to the best of its abilities, the required assistance.

Additionally, a copy of this Annual Report will be forwarded to the Township of Champlain.

This 2019 Annual Report has been prepared on March 5, 2020 and has been endorsed by the Corporation of the Town of Hawkesbury Municipal Council on March 30, 2020.

Nancy Beks

Préparé par
Nancy Beks
DWQMS rep.
Corporation de la ville de Hawkesbury

Martin Perron

Approuvé par
Martin Perron
Superintendant Service de l'Environnement
Corporation de la ville de Hawkesbury