



2015
WATERWORKS
SUMMARY REPORT
(January 1, 2015 to December 31, 2015)

PREPARED BY:

TOWN OF HAWKESBURY
Technical Services / Waterworks
600 Higginson Street
Hawkesbury, Ontario
K6A 1H1
Tel. (613) 632-3112
Fax (613) 632-5861

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CORPORATION OF THE TOWN OF HAWKESBURY

2015 WATERWORKS SUMMARY REPORT

(January 1, 2015 to December 31, 2015)

1. REQUIREMENTS OF THE SAFE DRINKING WATER ACT, 2002

Under the new Drinking Water Systems Regulation 170/03, the Town of Hawkesbury's water system has been classified as a *Municipal Large Residential System*. This category is based on the fact that the Hawkesbury's water system serves a major residential development and serves more than 100 private residences.

There are 3867 water services in the Town of Hawkesbury. Furthermore, the Town of Hawkesbury's water system serves three wards in the Township of Champlain, being the Town of Vankleek Hill with 765 water services, the Village of l'Orignal with 560 water services and Laurentian Park with 40 water services for a total of 1,365 water services.

2. REQUIREMENTS OF THE DRINKING WATER SYSTEMS REGULATION (ONTARIO REGULATION 170/03)

The new Drinking Water Systems Regulation 170/03, made under the Safe Drinking Water Act, 2002, provides more detailed regulatory requirements in conjunction with the Safe Drinking Water Act, 2002.

3. REQUIREMENTS OF THE SYSTEM'S APPROVAL

The Town of Hawkesbury's drinking water system operates under the new program for Municipal Drinking Water Licensing (MDWL) OAP 177. We have been assessed by NSF-ISR and found to be in conformity with Ontario's Drinking Water Quality Management Standard. The scope of registration for the DWQMS is Entire Full Scope Accreditation. We had renew our MDWL on 2016-02-12 and the Licence Expiry Date is 2021-02-10.

We also have a Permit to Take Water # 6624-9KBRAJ, Reference Number: 0288-9GHSSQ, issued on May 22, 2015 in accordance with Section 34 of the Ontario Water Resources Act. This permit is valid until May 21, 2024.

4. RATED CAPACITY AND FLOW RATES

- a) Under Schedule C section 1 of the Municipal Drinking Water License #177-101, the rated capacity at the Hawkesbury Water Filtration Plant is as follows:

Maximum Daily Volume of Treated water = 27,275 m³/day as per the 1996 design.

Based on the 2015 Total water production data, the maximum daily water production was in March 01, 2015 at 8,081 m³/day. This is well under the Maximum Daily Volume rate allowed.

See Appendix "A" for Waterworks Data 2015.

- b) Under the Permit to Take Water no. 6624-9KBRAJ, the rate of taking for the Town of Hawkesbury is as follows:

Maximum Rate of Taking = 25,003 L/min = 25 m³/min
Maximum Rate of Taking = 20,000,000 L/day = 20 000 m³/day

Based on the 2015 raw water consumption data, the highest rate of taking water (peak) was August 22, 2015 at 16,615.85 m³/day for about 3 minute. The total water production for that day was 6,988 m³.

See Appendix "A" for Waterworks Data 2015.

5. AVAILABILITY OF REPORT

The Town of Hawkesbury will be advising the users of water from the system, through local newspapers, that the Summary Report will be available for review and inspection, free of charge, at the following locations:

1. *Technical Services Department*

Town of Hawkesbury
600 Higginson Street
Hawkesbury, Ontario
K6A 1H1
Tel. (613) 632-0106, ext. 2020

2. *Hawkesbury Public Library*

550 Higginson Street
Hawkesbury, Ontario
K6A 1H1

3. *Town's website* www.hawkesbury.ca

Furthermore, a copy of the Summary Report will also be forwarded to the Township of Champlain.

This 2015 Summary Report has been prepared on March 03, 2015 and will be submitted to the Municipal Council of the Corporation of the Town of Hawkesbury within the next three months.



Prepared by Martin Perron
Approved by Richard Guertin
600 Higginson Street
Hawkesbury, Ontario K6A 1H1
Tel. (613) 632-0106 x 2020

APPENDIX “A”

WATERWORKS DATA 2015

Raw Water (M3)	City Consumption (M3)	WATER PRODUCTION			Total Production (M3/d)	Town Flow (M3/d)
		Back Wash (M3)	Plant Use (M3)	Plant Production (M3/d)		
				6,951	6,879	
				7,250	7,244	
226,161	211,605	3,869	9,073	6,412	6,287	
				215,474	213,254	
				7,379	7,310	
				7,998	7,947	
				7,004	6,832	
217,740	203,127	3,484	8,182	206,611	204,693	
				7,044	6,969	
				8,081	7,928	
				6,428	6,402	
229,176	214,479	3,882	9,013	218,361	216,024	
				6,752	6,670	
				7,763	8,092	
				6,481	6,400	
213,290	198,534	3,317	8,732	202,551	200,110	
				6,707	6,633	
				7,406	7,409	
				3,864	5,910	
222,798	204,150	3,756	9,098	207,906	205,632	
				6,384	6,298	
				6,772	6,690	
				5,801	5,654	
202,894	187,682	3,823	8,971	191,505	188,932	
				6,865	6,784	
				7,513	7,537	
				5,617	5,627	
224,091	208,926	3,896	7,750	212,822	210,312	
				6,759	6,680	
				7,285	7,155	
				6,186	6,020	
221,680	205,821	3,701	7,357	209,522	207,080	
				6,809	6,725	
				7,333	7,241	
				6,267	6,195	
216,920	200,547	3,721	7,537	204,268	201,749	
				6,587	6,507	
				7,243	7,174	
				5,816	5,690	
216,466	200,328	3,659	8,766	204,187	201,722	
				6,353	6,268	
				7,042	7,046	
				5,931	5,819	
201,906	186,869	3,726	8,200	190,594	188,054	
				6,398	6,325	
				6,920	6,839	
				5,458	5,387	
208,902	194,733	3,600	8,968	198,333	196,063	
				6,748	6,671	
				8,081	8,092	
2,601,025	2,416,901	45,234	101,847	2,462,135	2,433,624	

MONTH	CHLORINE			SILICA			LIME			ALUM			FLUOR		
	Avg Max Min Total	Monthly Dosage (mg/l)	Chlorine (kg)	Avg Max Min Total	Silica (g) Alum (g)	Dosage (mg/l)	Lime (g) Dosage (mg/l)	Avg Max Min Total	Alum (time)	Dosage (mg/l)	Fluor (g) Fluor (kg)	Avg Max Min Total	Fluor (mg/l)		
JAN	2.25 2.93 1.29 510.0	2.25 2.93 1.29	6.4	0.39 0.71 0.16	748 389	1.32 1.53 1.08	3,028.4	14.31 15.12 13.75	17,750.9	41.76 43.32 36.88	618.2 135.6	0.60 0.66 0.56			
FEB	2.27 3.09 1.29 485.0	2.27 3.09 1.29	5.2	0.32 0.53 0.16	735 367	1.35 1.83 0.80	2,833.6	13.95 14.38 13.58	15,985.1	37.95 41.33 34.07	587.7 129.3	0.59 0.64 0.51			
MARS	2.38 3.09 1.45 545.0	2.38 3.09 1.45	5.7	0.35 0.66 0.11	787 396	1.37 1.77 0.94	2,939.6	13.71 15.10 12.63	16,159.0	36.45 41.81 29.54	623.4 137.2	0.60 0.64 0.56			
APRIL	2.85 3.69 1.74 695.0	2.85 3.69 1.74	4.1	0.26 0.44 0.07	721 358	1.35 1.48 1.23	3,298.4	16.61 18.87 14.00	20,594.8	49.90 54.65 36.22	577.1 127.0	0.60 0.63 0.56			
MAY	2.28 3.72 0.83 595.0	2.28 3.72 0.83	7.0	0.37 0.74 0.12	744 388	1.33 1.44 1.12	3,201.8	15.65 17.51 13.59	18,112.3	42.00 49.85 31.11	552.2 121.5	0.55 0.63 0.14			
JUNE	2.91 5.10 1.52 590.0	2.91 5.10 1.52	9.2	0.57 0.97 0.05	668 332	1.31 1.48 1.12	2,567.1	13.68 15.59 12.94	15,961.7	40.85 51.89 28.84	484.4 106.6	0.53 0.63 0.16			
JULY	2.60 3.75 1.34 590.0	2.60 3.75 1.34	14.2	0.74 1.27 0.27	634 314	1.13 1.29 0.89	3,021.7	14.44 15.75 11.31	18,809.2	43.38 45.91 39.31	190.8 42.0	0.19 0.61 0.00			
AUGUST	2.50 3.72 0.65 590.0	2.50 3.72 0.65	16.7	0.98 3.01 0.32	610 300	1.10 1.84 0.96	3,566.2	17.38 21.71 12.61	17,623.6	41.11 44.92 34.58	87.5 21.5	0.10 0.63 0.00			
SEPT.	2.38 4.45 1.31 510.0	2.38 4.45 1.31	16.0	0.99 1.45 0.56	578 286	1.07 1.21 0.92	2,756.0	13.77 15.27 12.61	17,953.0	43.04 59.66 32.60	227.7 50.1	0.24 0.61 0.00			
OCTO.	2.45 2.97 2.05 590.0	2.45 2.97 2.05	15.6	1.02 1.72 0.48	599 302	1.10 1.21 1.00	3,281.5	16.28 18.66 15.08	18,579.0	44.35 55.58 39.54	515.3 113.4	0.52 0.67 0.07			
NOV	2.40 3.07 1.50 485.0	2.40 3.07 1.50	9.7	0.75 1.05 0.37	637 320	1.26 1.37 1.13	3,125.9	16.76 18.06 15.08	19,126.4	48.02 63.61 37.24	414.2 91.1	0.45 0.63 0.00			
DEC	2.10 3.02 1.41 440.0	2.10 3.02 1.41	5.8	0.44 1.06 0.06	701 349	1.34 1.66 1.09	3,125.8	16.09 20.19 13.98	20,155.9	49.90 56.01 42.36	564.5 124.2	0.59 0.63 0.55			
	2.45 5.10 0.63 6,345.0	2.45 5.10 0.63	115.6	0.60 5.01 0.05	8,161 4,061	1.25 1.83 0.80	36,726	15.22 21.71 11.31	216,791	43.29 65.58 28.84	5,451 1,199	0.46 0.67 0.00			

MONTH	Date	GAS		HYDRO		Peak Demand
		(m3)	(kwhm)			
2016						
JAN	Avg. Max Min Total	11,070	91,500	485	580	460
FEB	Avg. Max Min Total	10,183	85,500	478	590	465
MAR	Avg. Max Min Total	9,164	94,000	488	590	460
APRIL	Avg. Max Min Total	8,145	88,000	477	523	440
MAY	Avg. Max Min Total	976	86,505	499	535	355
JUNE	Avg. Max Min Total	0	82,500	489	555	450
JULY	Avg. Max Min Total	0	88,500	488	555	240
AUGUST	Avg. Max Min Total	0	90,500	467	480	460
SEPT	Avg. Max Min Total	0	85,000	470	470	470
OCTO.	Avg. Max Min Total	332	88,500	450	460	270
NOV	Avg. Max Min Total	4,480	86,500	462	465	445
DEC.	Avg. Max Min Total	6,018	90,000	451	500	275
	Avg. Max Min Total	48,368	1,057,005	474.52	590.00	240.00

SOMMAIRE / SUMMARY

	2014	2015	2014	2015
	Production d'eau (Gallons)		Water production (m ³)	
Total de l'année	563,743,724	541,669,639	2,562,471	2,462,135
Total for year				
Moy. par jour Daily ave.	1,544,503	1,484,026	7,020	6,746
Moy. par min. Ave. per min.	1.073	1.031	4.88	4.68
Consumption max	2,206,460	1,777,747	10,029	8,081
Max. consumption				
Consumption min.	947,964	1,200,816	4,309	5,458
Min. consumption				
	Produits chimiques (lbs)		Chemical products (kg)	
Aurkum	465,146	478,940	211,430	216,791
Chlorine	89,098	80,787	40,494	36,726
Chlor/Chlorine	16,197	14,213	6,908	6,461
Fluor/Fluoride	2,828	2,638	1,331	1,189
Silicate	15,889	17,954	7,222	8,161
Aluminate	7,910	8,934	3,596	4,081

Surintendant/Superintendent
SERVICE DE L'ENVIRONNEMENT/ENVIRONMENT SERVICE