

**Laurentian Valley Township
Laurentian Valley Water Works
2008 Annual Report**

Description

Laurentian Valley Waterworks is a distribution system that purchases treated water from the City of Pembroke and distributes it to 613 homes and businesses through out 14 kilometers of distribution piping. There are no storage tanks, chlorine or pressure booster stations. Laurentian Valley Water Works received it's **Certificate** as a Water Distribution Plant, Level 1 (WD1) in November of 2000, # **2893**. On July 15, 2005 the system was reclassified as Water Distribution Subsystem Class 1 by the Ministry of Environment. The Drinking Water System Information number for Laurentian Valley Water Works is W260007465. This is the Annual and Summary Report as required by O.Reg 170/03 as amended.

Laurentian Valley Township has a water servicing agreement with the City of Pembroke. The water is purchased from the city and distributed in the Stafford Village area, part of Pembroke Street East and part of Pembroke Street West. The City treats and tests the water at the Pembroke Filtration Plant on Riverside Drive and tests the water in their distribution system. The Municipality tests the water in its distribution system. The City provides an Annual & Summary Report to the Municipality as required by O.Reg 170/03.

This report and the Certificates of Analysis are available to the general public at the front counter of the Municipal Office at 460 Witt Road during office hours. The quarterly and annual reports are also available on the internet at www.laurentianvalleytwsp.on.ca Information on the City Water Works can be accessed at www.pembrokeontario.com

Ownership

Laurentian Valley Water Works is owned by the Corporation of the Township of Laurentian Valley.

Operating Authority

Laurentian Valley Water Works is operated by the Corporation of the Township of Laurentian Valley.

Sampling & Testing

Water sampling was conducted by Claus Trost, Water Quality Analyst, Certificate number 12228 and Mark Zadow, Operator, Certificate number 13145. The water samples were sent to Caduceon Laboratories Inc. in Ottawa for analysis. Caduceon is an ODWS Accredited laboratory. The results of the analysis are faxed or emailed back to the Municipality. The following chart is a summary of those test results.

In 2008 the Municipality paid Caduceon Laboratories \$2,868.10 for water analysis services.

Analysis

For the period of January 1, 2008 - December 31, 2008

Parameter Tested	MAC, IMAC or Standard	# of Samples	# of Adverse Results	Normal Range	Note #
E, Coli	Nil	112	0	Absent	
Heterotrophic Plate Count	500 CFU/ ml	54	2	<2/ml - >500 CFU/ ml	# 1
Total Coliforms	Nil	112	0	< 2/100ml	
Residual Chlorine	.05 mg/ml	488	0	0.05 - 1.14 mg/l	
Trihalomethanes	.10 mg/liter	4	0	.07125 mg/liter	4/4 ave
Lead - residential	.01 mg/l	52	0	<.00002 mg/l - 0.00221 mg/l	
Lead - distribution	.01 mg/l	10	1	<.00052 mg/l - 0.015 mg/l	# 2
Lead - commercial	.01 mg/l	4	0	<.00002 mg/l - 0.00118 mg/l	

Notes

- #1** Of the 54 samples taken, two tested greater than 500 counts/ml on a Heterotrophic Plate Count, January 8, 2008 at Brum's Dairy and Home Depot on October 14, 2008 the rest were in the permitted range.
- #2** On April 7, 2008 the first distribution sample drawn for lead sampling was adverse. A resample was taken on April 22, 2008 which was not adverse. Either the hydrant was not flushed long enough or the fire hose used to direct the flush to proper drainage was contaminated.

Complaints

There were no complaints filed in 2008.

Staffing & Training

Laurentian Valley Waterworks has 1 Water Quality Analyst, 3 operators certified Water Distribution - Class 1 and 1 Operator in Training.

Two Applications for Operator License renewals were submitted to the OETC (agent of MOE), on July 23, 2008 and August 5, 2008 they returned 6 month license extensions with letters stating that the annual "Director Approved" CEU's have not been completed. On August 14, 2008 the Water Works responded with a letter and photo copies of the training certificates, neither the OETC and/or the MOE responded to that letter.

On December 11, 2008 we sent out another letter to which the MOE responded on December 29, 2008. We followed up with another letter hoping to clarify some misconceptions by the MOE, however they refuse to acknowledge the classroom training that our Operators took for Confined Space Entry, WHIMIS, First Aid & CPR.

In October, six water works staff attended the Eastern Ontario Water Workers Association Annual Meeting and training sessions in Belleville.

Construction

Reconstruction of the Indian Court water main began in the third quarter. Work began with the installation of new valves at Roy Street and Joe Street to shut down the water supply to Indian Court. Temporary service pipes were installed to the residences in the construction zone. Work was completed in September and service restored on October 9, 2008. The reconstruction costs assessed to Laurentian Valley Water Works was \$180,566.20

Maintenance

Flow Metrix was up to flow test the water meters on January 31, 2008. Problems with the valves delayed the testing and calibration until the valves at the Elgin Street, Willow Street, Karen Street and Bruham Avenue Meters were replaced and/or repaired. The meters on Pembroke Street West were tested on January 31, 2008. On February 25 they tried to test the water meter at MacGregors Hill, however the small meter malfunctioned and the testing was delayed until this meter was replaced. On April 21st and 23rd ball valves were installed to facilitate calibration of the meters in the Elgin Street, Willow Street, Karen Street and Bruham Avenue Meter chambers. On June 12, 2008 the small meter was replaced on the MacGregors Hill Meter and the balance of the meters were tested. Flowmetrix Technical Services Inc. supplied the Flow Meter Calibration Summary Report for the water meter testing in the third quarter.

The interior parts of Hydrant #66 were replaced on April 16, 2008 and on May 7th the seals were replaced. The fire hydrants were flushed and inspected and the hydrant valves exercised in the spring and again in the fall, the main valves were exercised in early June. The hydrants were painted, color coded for pressure and renumbered this summer by the student workers.

On May 5, 2008 a service connection was repaired at 521 Lark Street and on November 12, 2008 another service connection for 639 Hamilton Street was repaired.

16 new residential services and 3 commercial services were turned on in 2008, one residential service was removed (demolition).

Ministry of the Environment

The Municipality has completed a draft of the Drinking Water Quality Management System. This document requires completion in early 2009 so that it may be submitted for a peer review to provide feedback. This document is required to be completed December of 2009.

On June 20, 2009 the Laboratory Services Notification were updated and faxed to the Ministry.

On July 22, 2008 Shannon Hamilton-Browne, Drinking Water Inspector for MOE did the annual audit of Laurentian Valley Water Works. Her Inspection Report was received on November 6, 2008. The Policies & Procedures Manual was amended and submitted to Shannon for review at years end. An extension was granted to complete the required actions by January 31, 2009.

On August 8, 2008 Laurentian Valley Water Works received Relief from Regulatory Requirements with regards to the Community Lead Sampling program as required by O.Reg 170/03 as amended.

Summary

In 2008, the water works purchased 52,870,979 gallons of water from the City of Pembroke and distributed it to 611 homes and businesses. This was an eight percent decrease in water usage over the previous year. Water quality analysis revealed 1 incident of adverse water quality related to the community lead sampling program, the first distribution sample was adverse, followup sampling showed that it must have been a sampling error. There were no major expenditures for unplanned maintenance in 2008.

Claus Trost WQA