

**Ministry of the
Environment,
Conservation and Parks**

Eastern Region
Ottawa District Office
2430 Don Reid Drive, Suite 103
Ottawa ON K1H 1E1
Phone: 613-521-3450
or 800-860-2195
Fax: 613-521-5437

**Ministère de l'Environnement,
de la Protection de la nature
et des Parcs**

Région de l'Est
Bureau du district d'Ottawa
2430, promenade Don Reid unité 103
Ottawa (Ontario) K1H 1E1
Tél: 61- 521-3450
ou 800-860-2195
Télé: 613-521-5437



October 3, 2018

The Corporation of the Township of Laurentian Valley
460 Witt Rd
Laurentian Valley, Ontario
K8A 6W5

Dear: Mr. Sauriol
Chief Administrative Officer

Re: 2018-2019 Laurentian Valley Distribution System Inspection Report

Please find enclosed a copy of the final inspection report for the Laurentian Valley Distribution System.

Section 19 of the Safe Drinking Water Act (Standard of Care) creates a number of obligations for individuals who exercise decision-making authority over municipal drinking water systems. Please be aware that the Ministry has encouraged such individuals, particularly municipal councillors, to take steps to be better informed about the drinking water systems over which they have decision-making authority. These steps could include asking for a copy of this inspection report and a review of its findings. Further information about Section 19 can be found in "Taking Care of Your Drinking Water: A guide for members of municipal council" found under on the Ontario website at www.ontario.ca/environment-and-energy/taking-care-your-drinking-water-guide-members-municipal-councils.

Two sections of the report, namely "Non-compliance with Regulatory Requirements and Actions Required" and "Summary of Recommendations and Best Practice Issues", if found, will cite due dates for the submission of information or plans to my attention.

The items found within the section entitled "Non-compliance with Regulatory Requirements and Actions Required" outline non-compliance with regulatory requirements contained within an Act, a Regulation, or site-specific approvals, licenses, permits, orders, or guidelines. Such violations may result in the issuance of mandatory abatement instruments which could include orders, tickets, penalties, or referrals to the ministry's Environmental Enforcement and Compliance Office. Please ensure that the required actions are completed within the prescribed timeframe. **There was one (1) issue of Non-compliance with Regulatory Requirements; please refer to that section in the inspection report for the Actions Required.**

The items found within the section entitled "Summary of Best Practice Issues and Recommendations" provide information to the owner or operating authority outlining practices or standards established through existing and emerging industry standards that should be considered in order to advance current efforts. These items do not, in themselves, constitute violations. More recommendations are also provided within the body of the report. **There were no Best Practice Issues identified during the inspection.**

In order to measure individual inspection results, the Ministry has established an inspection compliance risk framework based on the principles of the Inspection, Investigation & Enforcement (II&E) Secretariat and advice of internal/external risk experts. The Inspection Summary Rating Record (IRR), included as an Appendix of the inspection report, provides the Ministry, the system owner and the local Public Health Units with a summarized quantitative measure of the drinking water system's annual inspection and regulated water quality testing performance. Please note the attached IRR methodology memo

describing how the risk rating model has improved to better reflect the health related and administrative non-compliance found in an inspection report. IRR ratings are published (for the previous inspection year) in the Ministry's Chief Drinking Water Inspectors' Annual Report. If you have any questions or concerns regarding the rating, please contact James Mahoney, Water Compliance Supervisor, at (613) 548-6902.

Please note that as of June 29, 2018 the Ministry of the Environment and Climate Change's name has changed to the Ministry of the Environment, Conservation and Parks (MECP). This name change will take some time to be reflected in all ministry materials and systems.

Thank you for the assistance during the inspection. Please do not hesitate to contact me if you have any questions or concerns about the attached report.

Sincerely,

Brenda Beaudoin

Brenda Beaudoin
Water Inspector/Provincial Officer, Badge #1001
Drinking Water and Environmental Compliance Division
Ministry of the Environment, Conservation and Parks (MECP)
Ottawa District Office
Phone: (613) 521-3450 ext. 255
E-mail: brenda.beaudoin@ontario.ca

Ec:

Mark Behm, Public Works Manager, Township of Laurentian Valley
Claus Trost, Water Quality Analyst, Township of Laurentian Valley
Heather Riddell, District Manager, Ministry of Natural Resources and Forestry
Dan Tantalo, Manager, Environmental Health, Renfrew County & District Health Unit
James Mahoney, Water Compliance Supervisor, MECP
District Office File



Ministry of the Environment, Conservation and Parks

LAURENTIAN VALLEY DISTRIBUTION SYSTEM

Inspection Report

Site Number:	260007465
Inspection Number:	1-18XBA
Date of Inspection:	Sep 26, 2018
Inspected By:	Brenda Beaudoin

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REQUIREMENTS AND ACTIONS REQUIRED****SUMMARY OF BEST PRACTICE ISSUES
AND RECOMMENDED ACTIONS****SIGNATURES****APPENDICES:****APPENDIX A STAKEHOLDER APPENDIX****APPENDIX B INSPECTION RATING RECORD (IRR)**

OWNER INFORMATION:

Company Name: LAURENTIAN VALLEY, THE TOWNSHIP OF
Street Number: 460 **Unit Identifier:**
Street Name: WITT Rd
City: PEMBROKE
Province: ON **Postal Code:** K8A 6W5

CONTACT INFORMATION

Type:	Owner	Name:	Dean Sauriol
Phone:	(613) 735-6291 xx206	Fax:	(613) 735-5820
Email:	dsauriol@lvtownship.ca		
Title:	Chief Administrative Officer, Township of Laurentian Valley		

Type:	Owner	Name:	Mark Behm
Phone:	(613) 735-6291 x216	Fax:	(613) 735-5820
Email:	mbehm@lvtownship.ca		
Title:	Public Works Manager		

Type:	Main Contact	Name:	Claus Trost
Phone:	(613) 735-6291 x210	Fax:	(613) 735-5820 xx210
Email:	ctrost@lvtownship.ca		
Title:	Water Quality Analyst, Township of Laurentian Valley		

INSPECTION DETAILS:

Site Name: LAURENTIAN VALLEY DISTRIBUTION SYSTEM
Site Address: 460 WITT RD LAURENTIAN VALLEY K8A 6W5
County/District: Laurentian Valley
MECP District/Area Office: Ottawa District
Health Unit: RENFREW COUNTY AND DISTRICT HEALTH UNIT
Conservation Authority:
MNR Office:
Category: Large Municipal Residential
Site Number: 260007465
Inspection Type: Announced
Inspection Number: 1-18XBA
Date of Inspection: Sep 26, 2018
Date of Previous Inspection: Nov 08, 2017

COMPONENTS DESCRIPTION

Site (Name):	MOE DWS Mapping	Sub Type:	
Type:	DWS Mapping Point		

Site (Name): Distribution System Information - General

Type: Other**Sub Type:** Other**Comments:**

The Laurentian Valley Distribution System is categorized as a Class 1 Water Distribution Subsystem (Certificate No. 2893, issued July 15, 2005) and serves a population of approximately 1,550 in 645 homes and businesses. The areas served are Stafford Village, part of Pembroke Street East and part of Pembroke Street West.

The Township of Laurentian Valley obtains treated water from the City of Pembroke. A Water Service Agreement dated October 31, 1996 provides the details of the contract. The water supplied by the City originates from the Ottawa River, is treated with chemically-assisted filtration and chlorination, and is distributed to the City of Pembroke, the Township of Laurentian Valley, and the Town of Petawawa.

Distribution samples are collected by the Township of Laurentian Valley within its own distribution subsystem. The Laurentian Valley Distribution Subsystem consists of approximately 14 kilometres of water mains, branch lines, and appurtenances located to west, east and south-west of the City of Pembroke. Water mains are reported to consist mainly (90%) of PVC material with some cast steel ductile water mains ranging in diameter from 150 millimeter (mm), 250 mm and 300 mm diameter piping, with shorter sections of 400 mm, 200 mm and 100 mm water mains (reference: Certificate of Approval (C of A) No. 7-0659-87-006). The distribution system also consists of approximately 81 hydrants, 75 hydrant valves and 96 main valves.

There are no storage structures and no chlorine, flow, or pressure boosting stations as part of the Laurentian Valley Distribution System. There are 7 water meters equipped with backflow preventers installed within the distribution system to measure the drinking-water supplied by the City of Pembroke. There are 36 water meters used to measure the drinking-water consumed by Industrial, Commercial and Institutional (ICI) users.

The Township of Laurentian Valley measures the water that they purchase from the City of Pembroke on a quarterly basis.

The distribution system can be considered to be comprized of three zones:

1. The East Zone, starts approximately at Rankin Street and goes East up to the Home Depot.
2. The South West Zone (Stafford Village), is bordered on the North by Boundary Rd E., on the East by Elgin St. on the South by the CNR rail line and to the west by Jean Avenue.
3. The West Zone is bordered on the East by Lloyd Drive, then along Pembroke Street West then up Irene Street to the Ottawa River. Laurentian Valley ends at the Township of Petawawa border. This section has commercial and institutional buildings connected to the distribution system.

INSPECTION SUMMARY:

Introduction

- The primary focus of this inspection is to confirm compliance with Ministry of the Environment, Conservation and Parks (MECP) legislation as well as evaluating conformance with ministry drinking water policies and guidelines during the inspection period.

This drinking water system is subject to the legislative requirements of the Safe Drinking Water Act, 2002 (SDWA) and regulations made therein, including Ontario Regulation 170/03, "Drinking Water Systems" (O. Reg.170/03). This inspection has been conducted pursuant to Section 81 of the SDWA.

This report is based on an inspection of a "stand alone connected distribution system". This type of system receives treated water from a separately owned "donor" system. This report contains the elements required to assess key compliance and conformance issues associated with a "receiver" system. This report does not contain items associated with the inspection of the donor system, such as source waters, intakes/wells and treatment facilities.

This report is based on a "focused" inspection of the system. Although the inspection involved fewer activities than those normally undertaken in a detailed inspection, it contained critical elements required to assess key compliance issues. This system was chosen for a focused inspection because the system's performance met the ministry's criteria, most importantly that there were no deficiencies as identified in O.Reg. 172/03 over the past 3 years. The undertaking of a focused inspection at this drinking water system does not ensure that a similar type of inspection will be conducted at any point in the future.

This inspection report does not suggest that all applicable legislation and regulations were evaluated. It remains the responsibility of the owner to ensure compliance with all applicable legislative and regulatory requirements.

Data review period was from November 2, 2017 to September 21, 2018. The site visit occurred on September 26, 2018.

Treatment Processes

- The owner/operating authority was in compliance with the requirement to prepare Form 1 documents as required by their Drinking Water Works Permit during the inspection period.

There was one (1) Form 1 completed during this inspection period (Robinson Lane). The form appeared to meet the requirements in the Drinking Water Works Permit (DWWP). The watermain was put into service on July 27, 2018; the Township is reminded that the document or file identified in Table 1, Schedule A of the DWWP is required to be updated to include watermain additions, modifications, replacements and extensions within 12 months of the addition, modification, replacement or extension.

Treatment Process Monitoring

- The secondary disinfectant residual was not measured as required for the distribution system.

Free chlorine residual is monitored in the distribution system utilizing the 4/3 option as allowed under section 7-2(4) of O. Reg. 170/03. All required samples were taken however they were not taken in accordance with section 7-2(4)2 which states "at least three of the samples must be taken on a second day of the week, at least 48 hours after the last sample was taken on the day referred to in paragraph 1". Upon review of the chlorine data it was determined that there were three (3) occasions during the inspection period where samples were taken less than 48 hours after the last sample was taken during that week.

Treatment Process Monitoring

Distribution System

- Existing parts of the distribution system that are taken out of service for inspection, repair or other activities that may lead to contamination, and all new parts of the distribution system that come in contact with drinking water, were disinfected in accordance with Schedule B, Condition 2.3 of the Drinking Water Works Permit, or an equivalent procedure (i.e. the Watermain Disinfection Procedure).

Operations Manuals

- The operations and maintenance manuals contained plans, drawings and process descriptions sufficient for the safe and efficient operation of the system.
- The operations and maintenance manuals met the requirements of the Drinking Water Works Permit and Municipal Drinking Water Licence issued under Part V of the SDWA.

Logbooks

- Logbooks were properly maintained and contained the required information.
- Records or other record keeping mechanisms confirmed that operational testing not performed by continuous monitoring equipment was being done by a certified operator, water quality analyst, or person who suffices the requirements of O. Reg. 170/03 7-5.

Certification and Training

- The overall responsible operator had been designated for each subsystem.
- Operators in charge had been designated for all subsystems which comprised the drinking-water system.

Water Quality Monitoring

- All microbiological water quality monitoring requirements for distribution samples were being met.
- All haloacetic acid water quality monitoring requirements prescribed by legislation are being conducted within the required frequency and at the required location.
- All trihalomethane water quality monitoring requirements prescribed by legislation were conducted within the required frequency and at the required location.
- Records confirmed that chlorine residual tests were being conducted at the same time and at the same location that microbiological samples were obtained.

Water Quality Assessment

- Records showed that all water sample results taken during the inspection review period did not exceed the values of tables 1, 2 and 3 of the Ontario Drinking Water Quality Standards (O.Reg. 169/03).

Reporting & Corrective Actions

- All changes to the system registration information were provided within ten (10) days of the change.

NON-COMPLIANCE WITH REGULATORY REQUIREMENTS AND ACTIONS REQUIRED

This section provides a summary of all non-compliance with regulatory requirements identified during the inspection period, as well as actions required to address these issues. Further details pertaining to these items can be found in the body of the inspection report.

1. The secondary disinfectant residual was not measured as required for the distribution system.

Free chlorine residual is monitored in the distribution system utilizing the 4/3 option as allowed under section 7-2(4) of O. Reg. 170/03. All required samples were taken however they were not taken in accordance with section 7-2(4)2 which states "at least three of the samples must be taken on a second day of the week, at least 48 hours after the last sample was taken on the day referred to in paragraph 1". Upon review of the chlorine data it was determined that there were three (3) occasions during the inspection period where samples were taken less than 48 hours after the last sample was taken during that week.

Action(s) Required:

By November 15, 2018 the Owner shall submit to the undersigned Provincial Officer a plan or procedure to ensure all future residuals taken, are taken in accordance with subsection 7-2(4) of O. Reg. 170/03.

SUMMARY OF RECOMMENDATIONS AND BEST PRACTICE ISSUES

This section provides a summary of all recommendations and best practice issues identified during the inspection period. Details pertaining to these items can be found in the body of the inspection report. In the interest of continuous improvement in the interim, it is recommended that owners and operators develop an awareness of the following issues and consider measures to address them.

Not Applicable

SIGNATURES

Inspected By:

Brenda Beaudoin

Signature: (Provincial Officer)

Brenda Beaudoin

Reviewed & Approved By:

James Mahoney

Signature: (Supervisor)

Review & Approval Date: 03/10/2018

Note: This inspection does not in any way suggest that there is or has been compliance with applicable legislation and regulations as they apply or may apply to this facility. It is, and remains, the responsibility of the owner and/or operating authority to ensure compliance with all applicable legislative and regulatory requirements.

APPENDIX A

STAKEHOLDER APPENDIX

Key Reference and Guidance Material for Municipal Residential Drinking Water Systems

Many useful materials are available to help you operate your drinking water system. Below is a list of key materials owners and operators of municipal residential drinking water systems frequently use.

To access these materials online click on their titles in the table below or use your web browser to search for their titles. Contact the Public Information Centre if you need assistance or have questions at 1-800-565-4923/416-325-4000 or picemail.moe@ontario.ca.

For more information on Ontario's drinking water visit www.ontario.ca/drinkingwater and email drinking.water@ontario.ca to subscribe to drinking water news.



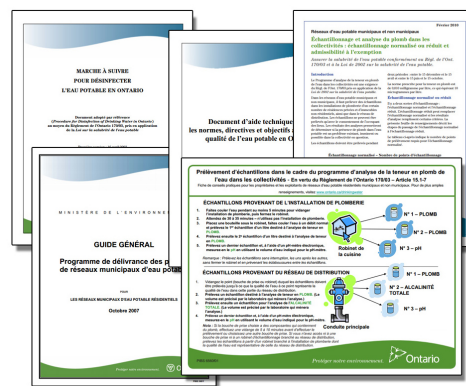
PUBLICATION TITLE	PUBLICATION NUMBER
Taking Care of Your Drinking Water: A Guide for Members of Municipal Councils	7889e01
FORMS: Drinking Water System Profile Information, Laboratory Services Notification, Adverse Test Result Notification Form	7419e, 5387e, 4444e
Procedure for Disinfection of Drinking Water in Ontario	4448e01
Strategies for Minimizing the Disinfection Products Trihalomethanes and Haloacetic Acids	7152e
Total Trihalomethane (TTHM) Reporting Requirements Technical Bulletin (February 2011)	8215e
Filtration Processes Technical Bulletin	7467
Ultraviolet Disinfection Technical Bulletin	7685
Guide for Applying for Drinking Water Works Permit Amendments, Licence Amendments, Licence Renewals and New System Applications	7014e01
Certification Guide for Operators and Water Quality Analysts	
Guide to Drinking Water Operator Training Requirements	9802e
Taking Samples for the Community Lead Testing Program	6560e01
Community Sampling and Testing for Lead: Standard and Reduced Sampling and Eligibility for Exemption	7423e
Guide: Requesting Regulatory Relief from Lead Sampling Requirements	6610
Drinking Water System Contact List	7128e
Technical Support Document for Ontario Drinking Water Quality Standards	4449e01

ontario.ca/drinkingwater

Principaux guides et documents de référence sur les réseaux résidentiels municipaux d'eau potable

De nombreux documents utiles peuvent vous aider à exploiter votre réseau d'eau potable. Vous trouverez ci-après une liste de documents que les propriétaires et exploitants de réseaux résidentiels municipaux d'eau potable utilisent fréquemment.

Pour accéder à ces documents en ligne, cliquez sur leur titre dans le tableau ci-dessous ou faites une recherche à l'aide de votre navigateur Web. Communiquez avec le Centre d'information au public au 1 800 565-4923 ou au 416 325-4000, ou encore à picemail.moe@ontario.ca si vous avez des questions ou besoin d'aide.



Pour plus de renseignements sur l'eau potable en Ontario, consultez le site www.ontario.ca/eaupotable ou envoyez un courriel à drinking.water@ontario.ca pour suivre l'information sur l'eau potable.

TITRE DE LA PUBLICATION	NUMÉRO DE PUBLICATION
Prendre soin de votre eau potable – Un guide destiné aux membres des conseils municipaux	7889f01
Renseignements sur le profil du réseau d'eau potable, Avis de demande de services de laboratoire, Formulaire de communication de résultats d'analyse insatisfaisants et du règlement des problèmes	7419f, 5387f, 4444f
Marche à suivre pour désinfecter l'eau potable en Ontario	4448f01
Strategies for Minimizing the Disinfection Products Trihalomethanes and Haloacetic Acids (en anglais seulement)	7152e
Total Trihalomethane (TTHM) Reporting Requirements: Technical Bulletin (février 2011) (en anglais seulement)	8215e
Filtration Processes Technical Bulletin (en anglais seulement)	7467
Ultraviolet Disinfection Technical Bulletin (en anglais seulement)	7685
Guide de présentation d'une demande de modification du permis d'aménagement de station de production d'eau potable, de modification du permis de réseau municipal d'eau potable, de renouvellement du permis de réseau municipal d'eau potable et de permis pour un nouveau réseau	7014f01
Guide sur l'accréditation des exploitants de réseaux d'eau potable et des analystes de la qualité de l'eau de réseaux d'eau potable	
Guide sur les exigences relatives à la formation des exploitants de réseaux d'eau potable	9802f
Prélèvement d'échantillons dans le cadre du programme d'analyse de la teneur en plomb de l'eau dans les collectivités	6560f01
Échantillonnage et analyse du plomb dans les collectivités : échantillonnage normalisé ou réduit et admissibilité à l'exemption	7423f
Guide: Requesting Regulatory Relief from Lead Sampling Requirements (en anglais seulement)	6610
Liste des personnes-ressources du réseau d'eau potable	7128f
Document d'aide technique pour les normes, directives et objectifs associés à la qualité de l'eau potable en Ontario	4449f01

ontario.ca/eaupotable

APPENDIX B

INSPECTION RATING RECORD (IRR)

APPLICATION OF THE RISK METHODOLOGY USED FOR MEASURING MUNICIPAL RESIDENTIAL DRINKING WATER SYSTEM INSPECTION RESULTS



The Ministry of the Environment (MOE) has a rigorous and comprehensive inspection program for municipal residential drinking water systems (MRDWS). Its objective is to determine the compliance of MRDWS with requirements under the Safe Drinking Water Act and associated regulations. It is the responsibility of the municipal residential drinking water system owner to ensure their drinking water systems are in compliance with all applicable legal requirements.

This document describes the risk rating methodology, which has been applied to the findings of the Ministry's MRDWS inspection

results since fiscal year 2008-09. The primary goals of this assessment are to encourage ongoing improvement of these systems and to establish a way to measure this progress.

MOE reviews the risk rating methodology every three years.

The Ministry's Municipal Residential Drinking Water Inspection Protocol contains 15 inspection modules consisting of approximately 100 regulatory questions. Those protocol questions are also linked to definitive guidance that ministry inspectors use when conducting MRDWS inspections.

ontario.ca/drinkingwater

The questions address a wide range of regulatory issues, from administrative procedures to drinking water quality monitoring. The inspection protocol also contains a number of non-regulatory questions.

A team of drinking water specialists in the ministry assessed each of the inspection protocol regulatory questions to determine the risk (not complying with the regulation) to the delivery of safe drinking water. This assessment was based on established provincial risk assessment principles, with each question receiving a risk rating referred to as the Question Risk Rating. Based on the number of areas where a system is deemed to be non-compliant during the inspection, and the significance of these areas to administrative, environmental, and health consequences, a risk-based inspection rating is calculated by the ministry for each drinking water system.

It is important to be aware that an inspection rating less than 100 per cent does not mean the drinking water from the system is unsafe. It shows areas where a system's operation can improve. The ministry works with owners and operators of systems to make sure they know what they need to do to achieve full compliance.

The inspection rating reflects the inspection results of the specific drinking water system for the reporting year. Since the methodology is applied consistently over a period of years, it serves as a comparative measure both provincially and in relation to the individual system. Both the drinking water system and the public are able to track the performance over time, which encourages continuous improvement and allows systems to identify specific areas requiring attention.

The ministry's annual inspection program is an important aspect of our drinking water safety net. The ministry and its partners share a common commitment to excellence and we continue to work toward the goal of 100 per cent regulatory compliance.

Determining Potential to Compromise the Delivery of Safe Water

The risk management approach used for MRDWS is aligned with the Government of Ontario's Risk Management Framework. Risk management is a systematic approach to identifying potential hazards, understanding the likelihood and consequences of the hazards, and taking steps to reduce their risk if necessary and as appropriate.

The Risk Management Framework provides a formula to be used in the determination of risk:

$$\text{RISK} = \text{LIKELIHOOD} \times \text{CONSEQUENCE}$$

(of the consequence)

Every regulatory question in the inspection protocol possesses a likelihood value (L) for an assigned consequence value (C) as described in **Table 1** and **Table 2**.

TABLE 1:	
Likelihood of Consequence Occurring	Likelihood Value
0% - 0.99% (Possible but Highly Unlikely)	L = 0
1 - 10% (Unlikely)	L = 1
11 - 49% (Possible)	L = 2
50 - 89% (Likely)	L = 3
90 - 100% (Almost Certain)	L = 4

TABLE 2:	
Consequence	Consequence Value
Medium Administrative Consequence	C = 1
Major Administrative Consequence	C = 2
Minor Environmental Consequence	C = 3
Minor Health Consequence	C = 4
Medium Environmental Consequence	C = 5
Major Environmental Consequence	C = 6
Medium Health Consequence	C = 7
Major Health Consequence	C = 8

The consequence values (0 through 8) are selected to align with other risk-based programs and projects currently under development or in use within the ministry as outlined in **Table 2**.

The Question Risk Rating for each regulatory inspection question is derived from an evaluation of every identified consequence and its corresponding likelihood of occurrence:

- All levels of consequence are evaluated for their potential to occur
- Greatest of all the combinations is selected.

The Question Risk Rating quantifies the risk of non-compliance of each question relative to the others. Questions with higher values are those with a potentially more significant impact on drinking water safety and a higher likelihood of occurrence. The highest possible value would be 32 (4×8) and the lowest would be 0 (0×1).

Table 3 presents a sample question showing the risk rating determination process.

TABLE 3:							
Does the Operator in Charge ensure that the equipment and processes are monitored, inspected and evaluated?							
Risk = Likelihood × Consequence							
C=1	C=2	C=3	C=4	C=5	C=6	C=7	C=8
Medium Administrative Consequence	Major Administrative Consequence	Minor Environmental Consequence	Minor Health Consequence	Medium Environmental Consequence	Major Environmental Consequence	Medium Health Consequence	Major Health Consequence
L=4 (Almost Certain)	L=1 (Unlikely)	L=2 (Possible)	L=3 (Likely)	L=3 (Likely)	L=1 (Unlikely)	L=3 (Likely)	L=2 (Possible)
R=4	R=2	R=6	R=12	R=15	R=6	R=21	R=16

Application of the Methodology to Inspection Results

Based on the results of a MRDWS inspection, an overall inspection risk rating is calculated. During an inspection, inspectors answer the questions related to regulatory compliance and input their “yes”, “no” or “not applicable” responses into the Ministry’s Laboratory and Waterworks Inspection System (LWIS) database. A “no” response indicates non-compliance. The maximum number of regulatory questions asked by an inspector varies by: system (i.e., distribution, stand-alone); type of inspection (i.e., focused, detailed); and source type (i.e., groundwater, surface water).

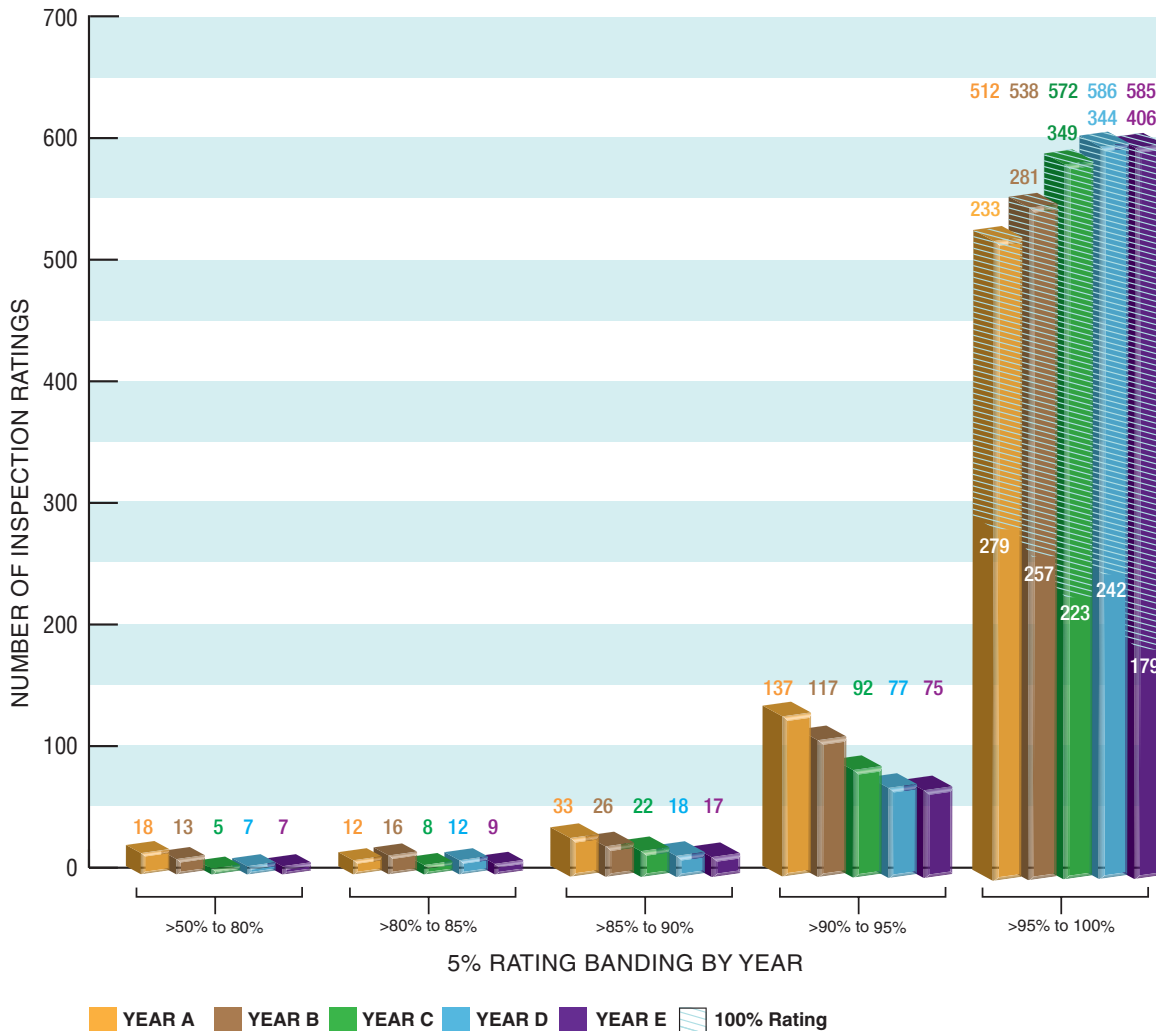
The risk ratings of all non-compliant answers are summed and divided by the sum of the risk ratings of all questions asked (maximum question rating). The resulting inspection risk rating (as a percentage) is subtracted from 100 per cent to arrive at the final inspection rating.

Application of the Methodology for Public Reporting

The individual MRDWS Total Inspection Ratings are published with the ministry's Chief Drinking Water Inspector's Annual Report.

Figure 1 presents the distribution of MRDWS ratings for a sample of annual inspections. Individual drinking water systems can compare against all the other inspected facilities over a period of inspection years.

Figure 1: Year Over Year Distribution of MRDWS Ratings



Reporting Results to MRDWS Owners/Operators

A summary of inspection findings for each system is generated in the form of an Inspection Rating Record (IRR). The findings are grouped into the 15 possible modules of the inspection protocol,

which would provide the system owner/operator with information on the areas where they need to improve. The 15 modules are:

- | | | | |
|-------------------------|---------------------------------|--|--|
| 1. Source | 5. Treatment Process Monitoring | 9. Logbooks | 13. Water Quality Monitoring |
| 2. Permit to Take Water | 6. Process Wastewater | 10. Contingency and Emergency Planning | 14. Reporting, Notification and Corrective Actions |
| 3. Capacity Assessment | 7. Distribution System | 11. Consumer Relations | 15. Other Inspection Findings |
| 4. Treatment Processes | 8. Operations Manuals | 12. Certification and Training | |

For further information, please visit www.ontario.ca/drinkingwater

Ministry of the Environment - Inspection Summary Rating Record (Reporting Year - 2018-2019)

DWS Name:	LAURENTIAN VALLEY DISTRIBUTION SYSTEM
DWS Number:	260007465
DWS Owner:	Laurentian Valley, The Township Of
Municipal Location:	Laurentian Valley

Regulation: O.REG 170/03
Category: Large Municipal Residential System
Type Of Inspection: Adhoc
Inspection Date: September 26, 2018
Ministry Office: Ottawa District

Maximum Question Rating: 161

Inspection Module	Non-Compliance Rating
Treatment Processes	0 / 4
Distribution System	0 / 21
Operations Manuals	0 / 28
Logbooks	0 / 18
Certification and Training	0 / 14
Water Quality Monitoring	0 / 51
Reporting & Corrective Actions	0 / 4
Treatment Process Monitoring	21 / 21
TOTAL	21 / 161

Inspection Risk Rating	13.04%
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FINAL INSPECTION RATING:	86.96%
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Ministry of the Environment - Detailed Inspection Rating Record (Reporting Year - 2018-2019)

DWS Name: LAURENTIAN VALLEY DISTRIBUTION SYSTEM
DWS Number: 260007465
DWS Owner: Laurentian Valley, The Township Of
Municipal Location: Laurentian Valley
Regulation: O.REG 170/03
Category: Large Municipal Residential System
Type Of Inspection: Adhoc
Inspection Date: September 26, 2018
Ministry Office: Ottawa District

Non-compliant Question(s)	Question Rating
Treatment Process Monitoring	
Is the secondary disinfectant residual measured as required for the distribution system?	21
TOTAL QUESTION RATING	21

Maximum Question Rating: 161

Inspection Risk Rating	13.04%
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FINAL INSPECTION RATING:	86.96%
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