

<b>Township of Horton Policy and Procedures</b>			
<b>SECTION:</b> Transportation			<b>POLICY #:</b> T-06
<b>POLICY:</b> Winter Maintenance and Salt Management			
<b>DATE:</b> January 2023 By-law 2023-08	<b>REV. DATE:</b>	<b>COVERAGE:</b> All Employees	<b>PAGE #:</b> Page 1 of 33

**Purpose**

This Winter Maintenance policy sets out procedural framework for ensuring that the Township of Horton continuously improves on the safe and sustainable delivery of winter maintenance services and the effective and efficient use of road salt in our winter maintenance operations. This plan supersedes all previous plans for the Township of Horton.

The plan is meant to be dynamic, to allow the municipality to evaluate and phase-in any changes, new approaches and technologies in winter maintenance activities in a fiscally sound manner. At the same time, any modifications to municipal winter maintenance activities must ensure that roadway safety is not compromised.

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## Definitions

**AVL** is an Automatic Vehicle Locating (AVL) system that the Township utilizes to track vehicle locations, direction of travel, speed, plow functions, and material application rates. The Township utilizes ACE AVL systems.

**Continuous Winter Event Response** is a response to a winter event with full deployment of manpower and equipment that plow/salt/sand the entire system.

**De-icing** means the application of solids, liquids, pre-treated material to the road surface after the on-set of the winter event.

**Highway** means a common and public highway, street, avenue, parkway, driveway, square, place, bridge, viaduct or trestle, any part of which is intended for or used by the general public for the passage of vehicles and includes the area between the lateral property lines thereof.

**MMS** is the Minimum Maintenance Standards for Municipal Highways of Ontario, O. Reg 366/18 as amended.

**MTO** means the Ministry of Transportation of Ontario.

**MOU** means Memorandum of Understanding.

**Paved Road** means a road with an asphalt surface, concrete surface, composite pavement, or Portland cement.

**Pre-treat** means the application of liquids (sodium chloride, calcium chloride, etc.) to dry salt or sand prior to being loaded for storage or applied to the road surface.

**Roads Superintendent** is the person who is on duty at the time directing the snow/ice removal operations of the Township of Horton.

**Route** is another term used for patrol routes.

**Plow Route** is a collection of road segments which during a winter storm will have the snow removed and receive applications of a salt and sand mixture to provide a temporary increase in grip. The level of service on such routes may or may not have a bare road platform as a service goal.

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**Significant Weather Event** as per the Ontario Municipal Act, a municipality may declare a significant weather event when a weather hazard, either forecasted or occurring, has the potential to pose a significant danger to users of the highways (roadways) in which they have authority over.

**S.O.P** means Standard Operating Procedure.

**Spot Winter Event Response** is a response to a winter event with only a partial deployment of manpower and equipment or with full deployment to only part of the system.

**Surface Treated Road** is road with bituminous surface treatment comprised of one or two applications of asphalt emulsion and stone chips over a gravel road.

**Unpaved Road** is a graded road with a gravel, stone or other loose traveling surface.

**Winter Event** is a weather condition affecting roads such as snowfall, windblown snow, freezing rain, frost or ice to which, a winter event response is required.

**Winter Event Response** is a series of winter control activities performed in response to a winter event.

**Winter Event Response Hours** are the total number of person-hours per year (plowing, salting/sanding, winging back, etc.) to respond to winter events.

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## 1. Objective of Winter Maintenance and Salt Management

The Township of Horton is committed to providing safe and sustainable winter maintenance operations while continuing to improve those operations to provide safety and mobility for the traveling public. As an integral part of this effort the Township of Horton will strive to optimize the use of all winter maintenance materials as they pursue the goal of a safe and sustainable transportation system.

The Township of Horton’s Public Works staff will strive, as reasonably practicable, to provide safe winter road conditions for vehicular and pedestrian traffic as set out in the level of service policies and within the resources established by the Council of the Township of Horton.

## 2. Policy Statement

The Township of Horton will conduct safe and sustainable snow removal to ensure the safety and mobility of users of the municipal road network, as reasonably practicable, in keeping with applicable Provincial legislation and accepted standards while striving to minimize adverse impacts to the environment. These commitments will be met by:

- a) Adhering to the procedures contained within the Winter Maintenance Policy.
- b) Reviewing and upgrading the Winter Maintenance Policy on an as needed basis to incorporate new technologies and new developments.
- c) Committing to ongoing winter maintenance staff training and education
- d) Monitoring on an annual basis, the present conditions of the winter maintenance program, as well as the effectiveness of the Winter Maintenance Policy.

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### 3. Overview of the Township of Horton

**Type of Organization:** Municipal - Lower Tier

**Estimated Population (2022 Consensus):** 3182 Total Area: 158.0 Square kilometers

**Street Address:** Municipal Office

2253 Johnston Road, RR5

Renfrew, Ontario K7V 3Z8 Canada

**Telephone:** 613-432-6271

**Website:** <https://www.hortontownship.ca/>

**CAO/Clerk:** Hope Dillabough

**Public Works Manager:** Adam Knapp

**Roads Superintendent:** Rod Eady

**Main Contact #:** 613-432-6271

**Emergency After Hours Contact #:** 613-433-2527

**By-Law:** 613-281-3773 or e-mail [bylaw.mles@gmail.com](mailto:bylaw.mles@gmail.com)

**Law Enforcement Agency:** OPP -Renfrew Detachment

**Contact Information:** Central Operations Center 613-432-3211 or 911

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## 4. Winter Maintenance Program

The major activities related to winter maintenance are:

- a) Snow plowing (Per MMS)
- b) Salt /sand application (Per MMS)
- c) Snow removal (As needed)
- d) Drift-control Snow fencing (Optional)
- e) Landfill snow removal (Per operational needs)
- f) Parking lot clearing at Municipal owned properties (Per operational needs)

The Township of Horton is responsible for winter maintenance on:

Road Class	Surface Type	Type Length (Lane Kilometers)	Total Length (Lane Kilometers)
Class 3 through 6	Paved	69.2	180.4
	Surface Treated	9.8	
	Gravel	101.4	
Millennium Trail	Gravel	5.7	Sno Goers maintain per MOU

## 5. Road Category and Priority Index

Road Category	Priority	Color
Class 3	1	
Class 4	1	
Class 5	2	
Class 6	3	



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## 6. Level of Service

The Township of Horton provides the following level of service during the winter maintenance season in response to a winter event.

The standards listed below define the Townships procedure for addressing the applicable winter event.

**1. Snow Accumulation**

- a) after becoming aware of the fact that the snow accumulation on a roadway is greater than the depth set out in the table below this section, to deploy resources as soon as practicable to address the snow accumulation; and
- b) after the snow accumulation has ended, to address the snow accumulation so as to reduce the snow to a depth less than or equal to the depth set out in the table below this section.
- c) to provide a minimum lane width of the lesser of three meters for each lane or the actual lane width, or
- d) on a Class 4 or Class 5 highway with two lanes, to provide a total width of at least five meters. O. Reg. 47/13, s. 4.

If the depth of snow accumulation on a roadway is less than or equal to the depth set out in the table below the roadway is deemed to be in a state of repair with respect to snow accumulation. O. Reg. 47/13, s. 4.

For the purposes of this section, the depth of snow accumulation on a roadway may be determined in by a municipal employee whose duties or responsibilities include one or more of the following:

- a) Patrolling highways.
- b) Performing highway maintenance activities.
- c) Supervising staff who perform activities described in paragraph a) or b). O. Reg. 47/13, s. 4.

The depth of snow accumulation on a roadway and lane width may be determined by:

- a) Performing an actual measurement;
- b) Monitoring the weather; or
- c) Performing a visual estimate. O. Reg. 47/13, s. 4.

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For the purposes of this section, addressing snow accumulation on a roadway includes, but is not limited to:

- a) Plowing the roadway;
- b) Salting the roadway;
- c) The application of other chemical or organic agents to the roadway;
- d) Applying abrasive materials to the roadway; or
- e) Any combination of the methods described in clauses (a), (b), (b.1) and (c). O. Reg. 47/13, s. 4.

This section does not apply to that portion of the roadway designated for parking. O. Reg. 47/13, s. 4.

If at any time a municipality declares a significant weather event, then all roadways within the municipality are deemed to be in a state of repair in respect of any snow accumulation present, until the applicable time under the table to this section expires following the end of the declaration.

**2. Ice Formation**

The standard for attempting the prevention of ice formation on roadways is doing the following in the 24-hour period preceding an alleged formation of ice on a roadway:

- a) Monitor the weather in accordance with the MMS.
- b) Patrol in accordance with the MMS.

If the municipality determines during weather monitoring and patrolling that there is a substantial probability of ice forming on a roadway:

- a) Treat the roadway to attempt to prevent ice formation within the time set out in the table below this section, starting from the time that the municipality determines is the appropriate time to deploy resources for that purpose. O. Reg. 47/13, s. 5.

If the municipality meets the standard set out in this policy, despite such compliance, ice forms on a roadway, the roadway is deemed to be in a state of repair until the earlier of:

- a) The time that the municipality becomes aware of the fact that the roadway is icy and can mobilize in a practicably timely manner; or
- b) The applicable time set out in the table below this section for treating the roadway to prevent ice formation expires. O. Reg. 47/13, s. 5.

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The standard for treating icy roadways after the municipality becomes aware of the fact that a roadway is icy is to treat the icy roadway within the time set out in the table below this section, and an icy roadway is deemed to be in a state of repair until the applicable time set out in the table for treating the icy roadway expires. O. Reg. 47/13, s. 5.

For the purposes of this section, treating a roadway means applying material to the roadway, including but not limited to, salt, sand or any combination of salt and sand. O. Reg. 47/13, s. 5.

If at any time a municipality declares a significant weather event, then all roadways within the municipality are deemed to be in a state of repair in respect of any ice present, until the applicable time under the table below this section expires following the end of the declared weather emergency.

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## 7. Accumulation Tables

### Snow

Class of Highway	Depth	Time
1	N/A	N/A
2	N/A	N/A
3	8 cm	12 hours
4	8 cm	16 hours
5	10 cm	24 hours
6	10 cm	24 Hours

### Ice

Class of Highway	Time
1	N/A
2	N/A
3	8 hours
4	12 hours
5	16 hours
6	24 Hours

## 8. Sidewalk Responsibility

The Township of Horton has no sidewalks within its boundaries and does not maintain or accept responsibility for any privately owned walkways.

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## 9. Winter Maintenance of Private Property

Private properties are the responsibility of the respective owners.

## 10. Winter Maintenance Season

For winter maintenance purposes, the Township of Horton assumes the winter season commences on October 1<sup>st</sup> and is completed by April 30<sup>th</sup>, while acknowledging that winter events may occur outside of this timeframe.

## 11. Winter Patrolling

During the winter maintenance season, the Township of Horton shall carry out winter patrols as per the MMS. Between winter events, a patrol of representative roads will occur during daylight hours and a second night patrol may also be scheduled, if practicable. The purpose of the patrol is to monitor and record weather and road conditions and mobilize winter maintenance operators and equipment should a winter event be observed, and a winter event response is required. On the approach of a winter event or during a winter event the patrol and plow routes of representative roads may be modified per priority of class as listed in this policy, or as reasonably practicable, depending on the type and severity of winter event or the direction from which the storm approaches. The patrol person will be familiar with local conditions in their patrol area and may prepare a condition log of road and weather conditions as well as any actions taken during the shift. The winter patrol schedule parallels the designated winter season.

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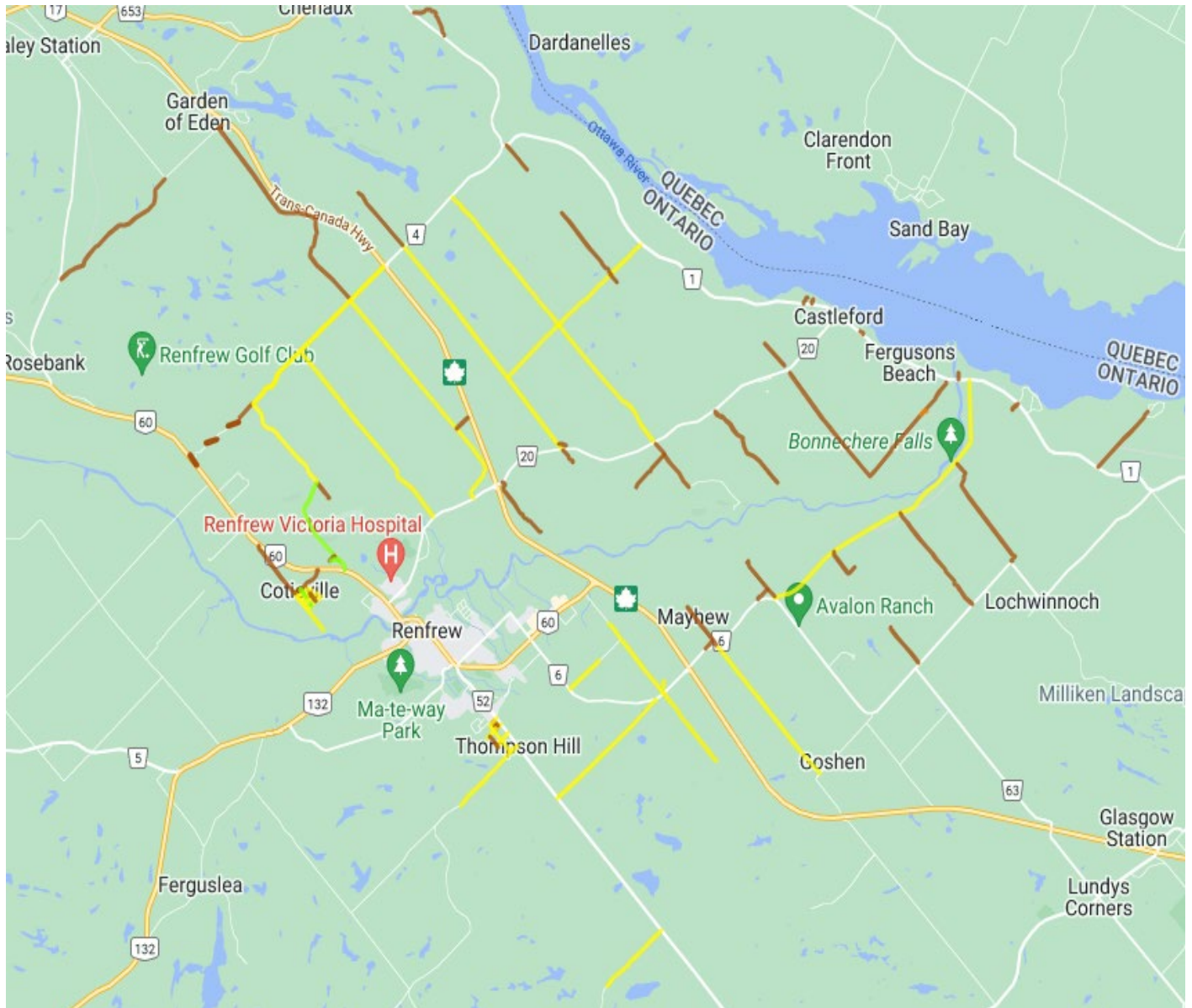
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### 12. Patrolled Roads Map



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### 13. Winter Preparations

In the months prior to the start of the winter maintenance season, as identified in this policy, the Township of Horton undertakes the following tasks to prepare for the upcoming winter season.

Prior to the winter season, the Township shall prepare and call tenders for the supply of materials (salt, sand) wear parts (for plowing equipment) calibrate and document rates of spread for all material spreading equipment.

At a practicable time prior to the beginning of the winter season the Township of Horton shall:

- a) Conduct a training session for staff and contract operators where all policies, procedures, schedules, reporting procedures for callout, route maps, equipment training and safety precautions will be discussed. Any issues resulting from the meeting with regard to the policies, procedures, schedules, reporting procedures for callout, route maps, equipment training and safety precautions shall be resolved either at the meeting or prior to the winter season.
- b) Train winter patrollers (or staff whose duties also include patrolling) on the route of representative roads to be patrolled, their duties during a winter event, record keeping requirements, callout procedures and specific material application rates and types for individual weather conditions.
- c) Inspect equipment to ensure proper working order. Schedule and complete any and all equipment repairs.
- d) Arrange for the delivery of materials (salt, sand) and begin filling storage facilities, a minimum of 500 tonnes of premixed sand and 30 tonnes of salt should be in storage by October 1<sup>st</sup>.
- e) A minimum of 3000 tonnes of premixed sand and 30 tonnes of salt should be in storage by November 1<sup>st</sup>.
- f) Confirm that all guiderails, catch basin, hazard and fire hydrant markers, steep hill, sharp curve ahead warning signs, bridges ices sign, if any, are in place. Any missing markers should be replaced prior to the winter season.

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#### 14. One Month Prior to the Winter Season

One month prior to the winter season the Township of Horton shall:

- a) Assign equipment to staff.
- b) Allow operators time to familiarize themselves with any new equipment, material application rates, and their route (driving the route and noting obstacles along the route, if necessary).
- c) commission all winter maintenance equipment. Test and calibrate equipment if practicable.
- d) Upon the forecast of an approaching winter event have sufficient staff available to operate the fleet if conditions warrant a winter event response.

#### 15. Two Weeks Prior to the Winter Season

Two weeks prior to the winter season the Township of Horton shall:

- a) Have 100 % of the fleet ready, tested and calibrated to respond to a winter event.
- b) Have staff available to operate the required complement of the fleet if conditions warrant a winter event response.

#### 16. Two Weeks After the Winter Season Ends

Two weeks after the winter season ends:

- a) Continue monitoring and recording weather forecasts.
- b) Do not decommission any equipment.

#### 17. One Month After the Winter Season Ends

One month after the winter season ends and no weather events for 2 weeks:

- a) Cease all winter highway maintenance operations.
- b) Decommission all winter maintenance equipment.
- c) Begin preparations for construction season



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**18. Staffing and Hours of Work**

The Township of Horton has full-time employee assigned to each vehicle used for winter operations. Each vehicle is assigned a route for sanding/salting and/or plowing.

The Township of Horton adheres to the hours of service as dictated by Highway Traffic Safety Act, Reg. 555/06 (Ontario, Canada).

<b>Employee</b>	<b>Job Title</b>	<b>Reports to Facility</b>	<b>Assigned Equipment</b>
<b>Adam Knapp</b>	<b>Public Works Manager</b>	<b>Horton Public Works Yard</b>	<b>Administrative Response</b>
<b>Rod Eady</b>	<b>Public Works Superintendent</b>	<b>Horton Public Works Yard</b>	<b>One tonne GMC Plow and Patrol Vehicle</b>
<b>Dustin Howard</b>	<b>Lead Hand</b>	<b>Horton Public Works Yard</b>	<b>3 tonne CV 515 Plow and Sanding Unit</b>
<b>Dave Radke</b>	<b>Technician / Operator</b>	<b>Horton Public Works Yard</b>	<b>Freightliner Tandem Plow Truck</b>
<b>Peter Storie</b>	<b>Operator</b>	<b>Horton Public Works Yard</b>	<b>Western Star Tandem Plow Truck</b>

*In the event of staffing modifications this table may be revised by the CAO/Clerk or Public Works Manager without bringing the policy back to Council for consideration.*

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## 19. Key Responsibilities

Some of the key responsibilities associated with the management and overseeing of winter operations for this winter season are as below:

- a) The Public Works Manager will receive issues and concerns of the citizens regarding snow and ice control efforts.
- b) The Public Works Manager will ensure media releases are sent to local news and radio stations advising of road closures and significant weather events.
- c) The Public Works Manager shall be the AVL system administrator.
- d) The Public Works Superintendent shall observe and document the weather and actions taken in compliance with the MMS.
- e) The Public Works Superintendent shall be responsible for making operational decisions pertaining to weather event responses.
- f) The Public Works Superintendent shall be the authority to which the field staff communicate the field conditions too.
- g) The Public Works Superintendent shall communicate the severity of those conditions to the Public Works Manager to evaluate the need to declare a significant weather event.
- h) The Public Works Superintendent shall be responsible for call-ins, as necessary.
- i) The Public Works Superintendent shall (when physically possible) be responsible or delegate responsibility for providing appropriate signage and/or barricades in case a road has to be closed due to a severe winter storm.
- j) The Lead Hand shall be second in command of the Public Works Superintendent and shall perform all duties assigned to the Public Works Superintendent in his absence or inability.
- k) The Lead Hand shall communicate all critical decisions necessary to the Public Works Manager when performing the Public Works Superintendents duties.
- l) The Operator/ Technician shall perform all AVL equipment installations, calibrations and maintenance and shall work with the Public Works Manager to ensure that all AVL systems are operating as designed for the winter maintenance season.

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## 20. Training

The Township of Horton provides winter operations training for all staff involved in the delivery of winter services.

Staff is trained through numerous organizations including but not limited to:

- a) Association of Ontario Road Supervisors
- b) Ontario Good Roads Association
- c) Renfrew County Roads Supervisors Association
- d) Public Services Health and Safety Association
- e) Advanced Consulting
- f) Infrastructure Health and Safety Association
- g) Safety Hub
- h) The County of Renfrew
- i) Canadian Red Cross
- j) Ground Force

Current winter operations training for staff include but is not limited to:

- a) Equipment Circle Check
- b) Equipment Calibration
- c) Record Keeping
- d) Health and Safety
- e) Level of Service – policies, practices and procedures
- f) Identification of Plow Routes – including variations from year to year and issues identified along the route
- g) Equipment Operation and Maintenance
- h) WHMIS
- i) First Aid and CPR
- j) Spreader Usage, Application Rates, and Material Mixing
- k) Tire Chaining

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### 21.AVL Equipment and Application Settings

Vehicle List									
Vehicle #	Description	Sreader Port	GPS #	Input O On	Input O Off	Input 1 On	Input 1 Off	Input 2 On	Input 2 Off
TR 11	2013 3/4 Tonne Truck GM	None	0013A20040B10325						
TR 24	2020 Freightliner Tandem	GPS ACE	0013A20040B102C5	Plow Down	Plow Up				
TR 22	2020 CV 515 3 Tonne	None	0013A20040B102B5			Plow Up	Plow Down	Sander On	Sander Off
TR 14	2018 International Tandem	GPS ACE	0013A20040B1030A	Plow UP	Plow Down				
G5	2008 Grader	None	0013A20040B10331			Mould Board Up	Mould Board Down		
B8	2017 JCB Backhoe	None	None						
EW180	Volvo Excavator	None	None						
TR 21	2021 GMC 1 Tonne	None	0013A20040B10309						

**Report Options**

---

**Material**

Name	Alias	Salt %	Abrasive %
Salt	<input type="text" value="Pure Salt"/>		
Abrasive	<input type="text" value="Pure Sand"/>	0 % <input type="button" value="▲"/> <input type="button" value="▼"/>	
Mix A	<input type="text" value="3-5% Salt Mix"/>	5 % <input type="button" value="▲"/> <input type="button" value="▼"/>	95 % <input type="button" value="▲"/> <input type="button" value="▼"/>
Mix B	<input type="text" value="6-10% Salt Mix"/>	10 % <input type="button" value="▲"/> <input type="button" value="▼"/>	90 % <input type="button" value="▲"/> <input type="button" value="▼"/>
Liquid	<input type="text"/>		

---

**Liquid weight (kg) to Volume (liter) conversion**

1 kg =  liter

---

**Others**

First day of the week

Show Spreader Operators

Oscar Road Patrol Report Enabled

Show overlapped points on map

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**22. Average Winter Material Used Annually**

Primary Solid Material	Supplier	Minimum Stocked Piled Quantity per Season	Stockpiled Premixed Salt %
Winter Sand per OPSS 1004	Yearly Tender	3000 to 3300 tonnes	3% to 5%

The mixture of salt to sand is by the bucket method where a senior staff member adds a specified amount of excavator bucket scoops, to attain the premixed salt percentages aforementioned, on top of the sand while in the transport vehicle prior to being dumped, stacked, and piled into the sand dome.

**23. Application Rates for 3% to 5% Salt to Sand Mixture**

Weather Type	Min and Max Ranges (KGS per lane Kilometer)		Min and Max Ranges (KGS per lane Kilometer)		Min and Max Ranges (KGS per lane Kilometer)	
	0 celcius	Minus 5 Celcius	Minus 5 Celcius	Minus 10 Celcius	Minus 10 Celcius	Minus 18 Celcius
Frost	300	350	400	450	450	650
Light Snow	300	350	400	450	400	450
Heavy Snow	300	350	400	450	400	450
Freezing Rain	450	650	800	850	800	850

**24. Application Rates for 6% to 10% Salt to Sand Mixture “Sweet Mix”**

This mixture is typically applied only to hard top roads and is only applied to gravel roads and vulnerable areas when significant freezing rain events occur.

Weather Type	Min and Max Ranges (KGS per lane Kilometer)		Min and Max Ranges (KGS per lane Kilometer)		Min and Max Ranges (KGS per lane Kilometer)	
	0 celcius	Minus 5 Celcius	Minus 5 Celcius	Minus 10 Celcius	Minus 10 Celcius	Minus 18 Celcius
Frost	300	350	400	450	450	650
Freezing Rain	450	650	800	850	800	850

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**25. Equipment - Winter Maintenance Routes**

VEHICLE NAME and UNIT NUMBER	VEHICLE TYPE	ASSOCIATED ROUTES	OPERATOR
International Unit #22	Single Axle	Plow Route A	Dustin Howard
Freightliner Unit #24	Tandem Axle	Plow Route B	Dave Radke
Western Star Unit # 24	Tandem Axle	Plow Route C	Peter Storie
GMC Unit #21	Single Axle	Parking lots and intersections clearing as needed	Rod Eady

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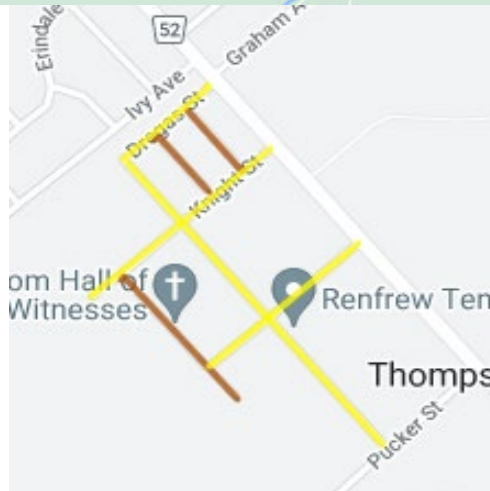
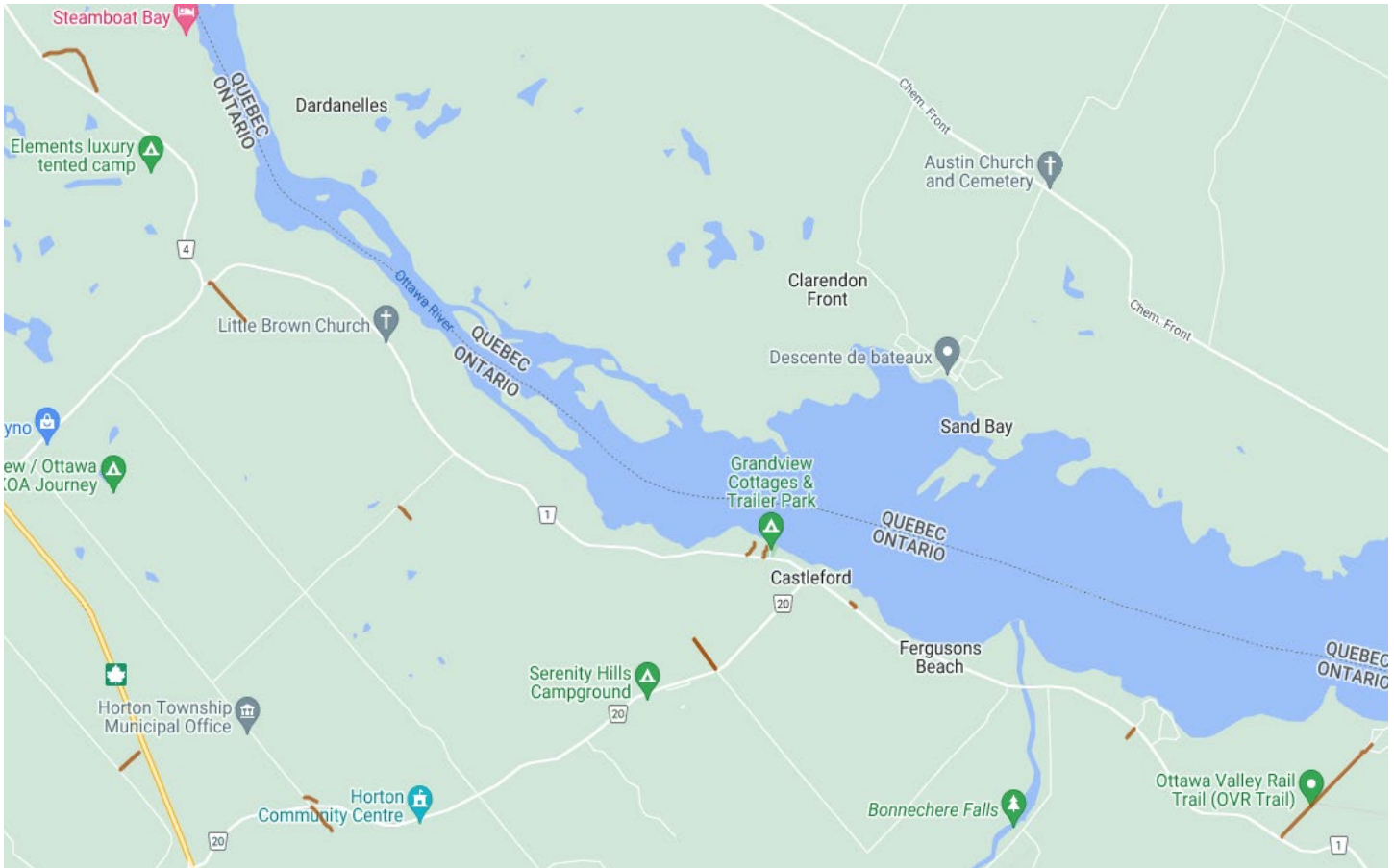
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## 26. Plow Route A Map – CV 515



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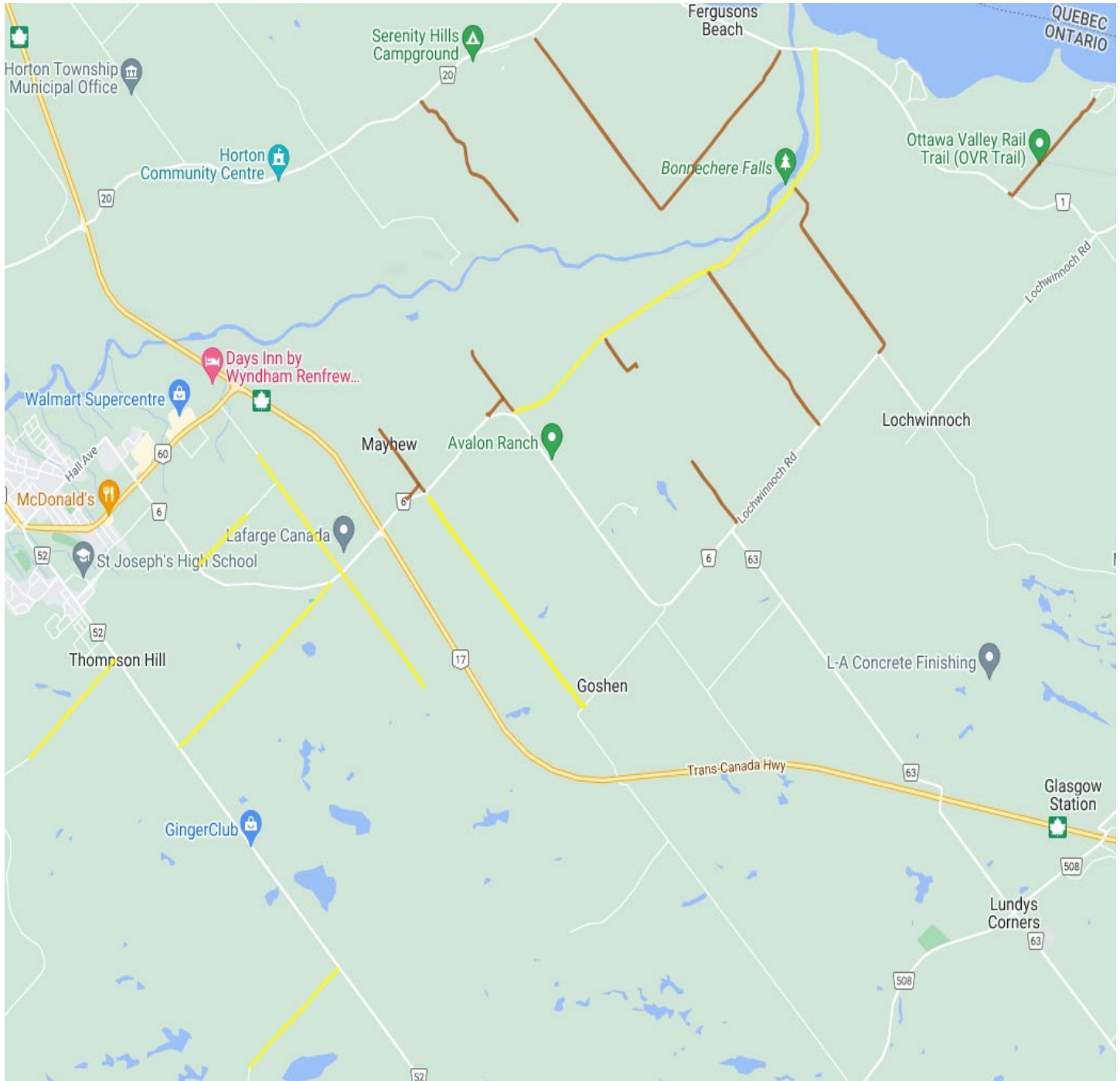
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## 27. Plow Route B Map - Freightliner





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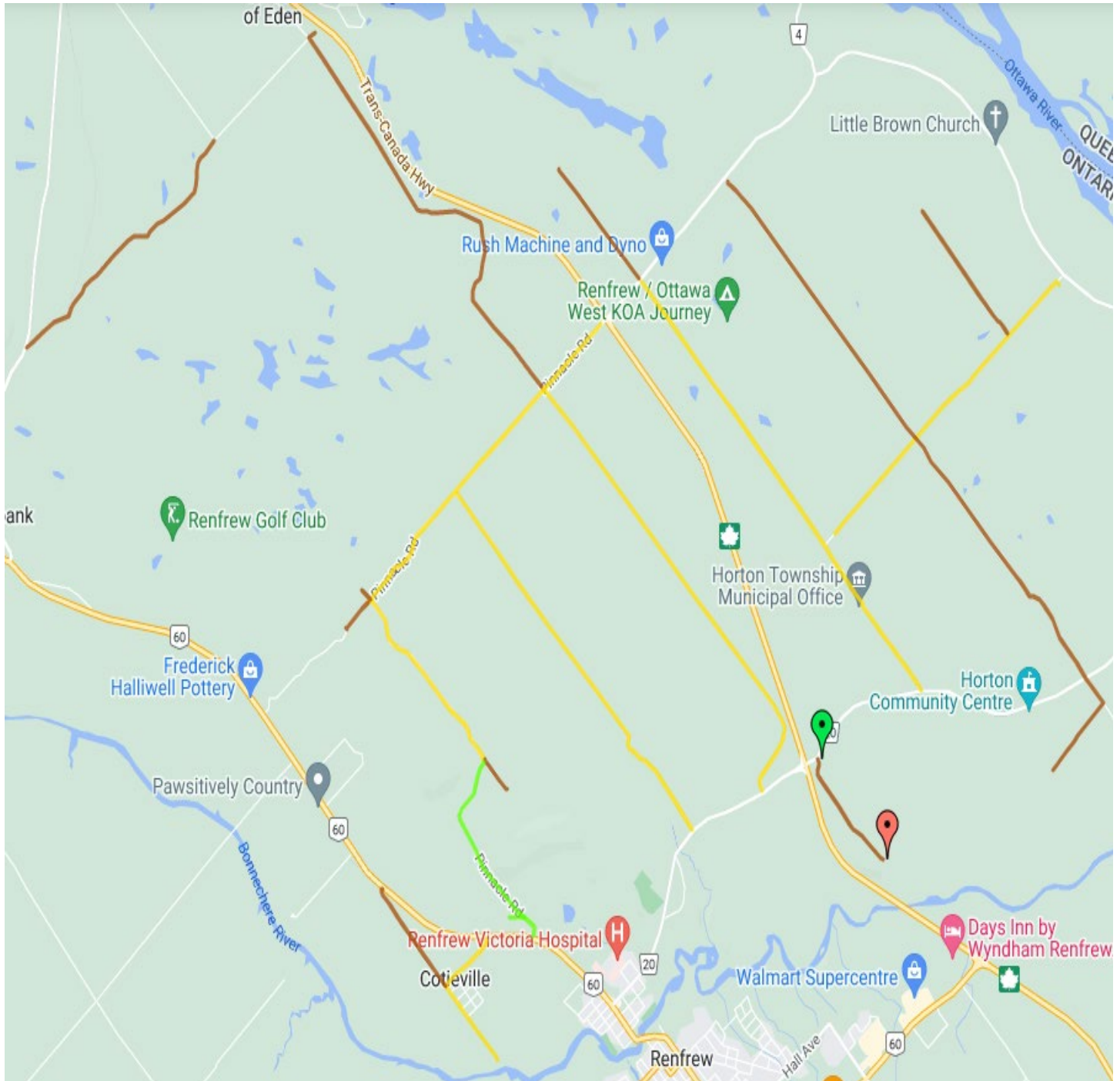
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**28. Plow Route C Map – Western Star**



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## 29. Parking Lots

The Township of Horton provides winter maintenance services to the listed parking lots below

### Municipal Office and Fire Hall

**Facility Address:** 2253 Johnston Road,  
RR5, Renfrew, Ontario  
K7V 3Z8

**Number of Parking Spots:** 15

### Horton Community Center

**Facility Address:** 1005 Castleford Road  
Renfrew, Ontario  
K7V 3Z8

**Number of Parking Spots:** Approximately 100

### Horton Municipal Boat Launch

**Facility Address:** 3746 River Road  
Renfrew Ontario  
K7V 3Z8

**Number of Parking Spots:** Approximately 15

During operational hours of the facilities equipment will be dispatched to parking lots upon the accumulation of five (5) centimeters of new snow. All efforts shall be made to remove accumulation of five (5) cm of new snow prior to the beginning of operational hours when practicable. Plowing operations will remove snow down to a smooth snow packed surface. Sand/salt mix will be added at the same time to increase traction for pedestrians on icy/slippery areas and pure salt or a sand/salt mix shall be applied by hand at the access', egress', and walkways of the facilities.

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### 30. Technicians

The Township of Horton has:

- a) One (1) unlicensed technician on staff.
- b) All Public Works staff are trained on basic vehicle maintenance in house.
- c) Multiple external contracted mechanic(s) available upon request.
- d) Staff take all reasonable efforts to perform repairs in house to mitigate cost and down time.

### 31. Winter Maintenance Facilities

**Horton Public Works Yard**

**Facility Type:** Patrol Yard

**Facility Address:** Public Works Garage

2253 Johnston Road

RR5, Renfrew Ontario

K7V 3Z8

**Facility Phone:** 613-432-6271

**Number of Front-end Loaders at facility:** One (1) 2017 JCB Backhoe

**Facility Built in** 1976

### 32. Facility Design and Logistics

- a) All materials are not handled in a designated area characterized by an impermeable surface.
- b) Equipment is not in place to prevent overloading of trucks.
- c) Systems are in place for collection and/or treatment of wastewater from cleaning of trucks.
- d) Control and diversion of external waters (not impacted by salt) is in place.
- e) Ongoing clean-up of the site surfaces and spilled material are cleaned up as quickly as practicable.
- f) Risk management and emergency measures plans are in place.

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### 33. Material Storage Details

- a) The storage of winter sand is in a MTO type sand dome with and approximate 3000 tonne capacity and an impermeable floor.
- b) The storage of salt is in a covered lean too with an approximate storage capacity of 120 tonnes and does not have an impermeable floor.
- c) Both buildings are located adjacent to one another to localize any potential contamination into the ground and are equipped with lockable gates to inhibit public entry.
- d) On occasion materials are stored outside these facilities and all practicable efforts are made to cover them with a tarp.

### 34. Equipment Storage Details

All plowing equipment is stored indoors during the winter season. Outside storage is utilized for seasonal construction equipment. The Township has a lean to and sand dome storage area for construction supplies, stock signage, and wear parts, as well as an up stairs storage area in the main garage for electronics and miscellaneous parts.

### 35. Equipment Washing Details

Equipment is washed on an as needed basis after material applications. Equipment is washed with an industrial grade pressure sprayer with a diesel-powered water heating system. Every spring all fleet vehicles and equipment are washed thoroughly with the Townships slip in water tank equipped with a 2" fire hose sprayer and are then krown undercoated to prevent rusting and equipment damage. During this thorough spring cleaning all equipment is inspected for damage and necessary repairs to prepare for the upcoming construction season.

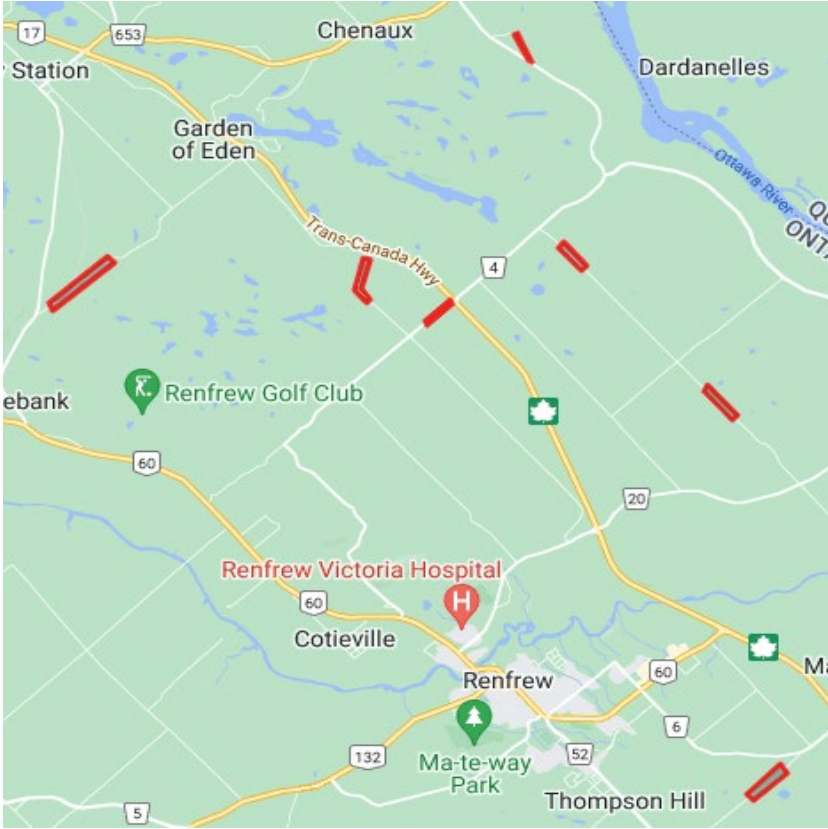
### 36. Snow Removal and Disposal

The Township of Horton does not have dedicated disposal site(s) in its jurisdiction and utilizes dead end turn around areas if/when necessary. The Township only performs snow removal when high banking techniques are not adequate to remove the snowbanks to a safe height at intersections to improve line of sight and safety.

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### 37. Salt Vulnerable Areas

Certain locations within the area of jurisdiction of the Township of Horton have been identified as being potentially vulnerable to the over-application of road salt. These areas are shown map below. Accordingly, salt storage, snow disposal and material application in these areas will be strictly monitored and, in some cases, may be restricted in a variety of ways.



The areas noted as vulnerable areas are known wetland areas that encroach into the Municipal Right-of-Way. The Township makes all reasonable efforts to mitigate excess usage of salt in these areas.

#### Mitigation Measures

The Township applies the minimum materials specified to the roadways in these areas while limiting the salt percentage in the material. Increased salt / sand ratio material "sweet mix" is only applied to these areas in extreme freezing rain events.

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### 38. Weather Monitoring

In order to determine an effective winter event response and allocate the appropriate resources the Township of Horton supplements their general observations with weather information from various sources which includes:

**Meteorological Services:** Environment Canada - <https://weather.gc.ca>

**Observations Techniques:** Weather Monitoring per the MMS, M511 Stationary Cameras System, Visual by Municipal Staff, Communication with staff of adjacent municipalities.

**Weather Documentation per MMS:** MESH Operational Management System by Go Evo.

### 39. Communications

Maintaining reliable internal communications is a critical component of winter operations. The Township of Horton uses the following:

- a) All winter maintenance vehicles are equipped with two-way communications radios.
- b) All citizen issues concerning snow and ice control efforts will be routed to the Public Works Manager.
- c) The Public Works Manager shall determine the follow-up responses to citizen inquiries.

The municipality provides external communication with the general public via:

- a) Information posted on the municipality's web site <https://www.hortontownship.ca>
- b) The Township's Social Media Platforms
- c) Municipal 511
- d) Verbal Communication
- e) Email

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#### 40. Declaring a Road Closure or Significant Weather Event S.O.P.

In the event a road must be closed, or a significant weather event declared due to a severe winter storm:

- a) The Public Works Superintendent shall communicate the requirement to the Public Works Manager.
- b) The Public Works Manager shall evaluate the need and make the final decision to close road(s) or declare a significant weather event and communicate that decision to the Superintendent.
- c) The Public Works Manager shall release the road closure notice or significant weather event notice utilizing the templates provided in this policy.
- d) The decision shall be communicated to the CAO/ Clerk prior to closure and allowed time to review and approve the release documents if practicable and they choose to do so.
- e) The CAO/Clerk shall inform Council of the decision in a timely manner or assign a designate to inform Council.
- f) The notice shall be posted on M511 and include all members on the Horton Township closure notification list.
- g) The Townships secretary or designate shall post the release verbatim on the Townships website and social media platforms.

#### 41. Ending a Road Closure or Significant Weather Event S.O.P.

The procedure for ending a road closure or significant weather event is:

- a) The Public Works Superintendent shall communicate that the closure or declaration is no longer needed to the Public Works Manager.
- b) The Public Works Manager shall evaluate and make the final decision to end the closure or declaration and communicate that decision to the Superintendent.
- c) The Public Works Manager shall end the road closure notice or significant weather event on the Township's M511 platform.
- d) The decision shall be communicated to the CAO/ Clerk and include all members on the Horton Township closure notification list.
- e) The CAO/Clerk shall inform Council of the decision in a timely manner or assign a designate to inform Council.
- f) The Townships secretary or designate shall post end notification on the Townships website and social media platforms in as simple of wording as possible.

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**42. Significant Weather Event Declaration Template**

**The Township of Horton**

**Declaration of Significant Weather Event**

Date: \_\_\_\_\_

Time: \_\_\_\_\_

After reviewing weather reports that the Township of Horton subscribes to and observing the current weather conditions, the Township is declaring a significant weather event in the municipality, as defined within the Minimum Maintenance Standards Regulation O.Reg..239/02.

A “significant weather event” means an approaching or occurring weather hazard with the potential to pose a significant danger to users of the highways (roadways) within a municipality.

During the significant weather event, the Township of Horton is advising motorists and residents to use extra caution as the municipality may not be able to meet its maintenance standards due to the extreme weather conditions expected.

This declaration will not change how or when the municipality performs its winter maintenance operations. However, it may take the municipality longer than usual to bring the roads back to a state of repair. Public safety is the Municipality’s top priority. The Township will continue to diligently monitor weather conditions and notify the public when the significant weather event has ended

Please contact the Township office during regular business hours at 613-432-6271 or the Public Works Superintendent at 613-433-2527 if you have serious concerns during this significant weather event.



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### 43. Termination of Significant Weather Event Template

#### The Township of Horton

#### Termination of Significant Weather Event

Date: \_\_\_\_\_

Time: \_\_\_\_\_

After reviewing weather reports that the Township of Horton subscribes to and observing the current weather conditions, the Township has declared the significant weather over within the municipality, as defined within the Minimum Maintenance Standards O.Reg.239/02.

The Township is still advising its residents to use extreme caution when traveling as this declaration does not imply the roads are in a full state of repair as per the minimum maintenance standards

Please contact the Township office during regular business hours at 613-432-6271 or the Public Works Superintendent at 613-433-2527 if you have any concerns regarding this declaration.