

MEMORANDUM

Grand Niagara Co-Owners To: Date: December 21, 2016

From: Jeffrey Swartz, MMM Group Ltd.

Environmental Assessment Subject: Cc.:

Requirements

Grand Niagara Development

Niagara Falls, ON

Job No.:

Elizabeth Gillin, MMM

We provide the following assessment of the requirements for Municipal Class Environmental Assessments in support of the Grand Niagara Development in Niagara Falls, ON. This assessment is based on the 2015 Amendments to the Environmental Assessment Act, approved October 7, 2015.

Municipal Class EA requirements – Municipal Water and Wastewater Projects

Wastewater Upgrades:

- The existing Grassy Brook Pumping Sanitary Pumping Station and forcemain will be required to be upgraded to support the Secondary Plan development. It is expected that the upgrades to the sanitary pumping station will be able to be completed within the existing building and the upgrades to the forcemain will occur within the same general alignment.
- The Grassy Brook SPS, the discharge forcemain, the remainder of the conveyance system to the Sanitary Treatment Plant and the plant itself are the responsibility of the Region of Niagara, including any required upgrades. Increasing pumping station capacity located in an existing building and enlarging a sewage collection in an existing utility corridor are both Schedule A+ activities in the Class EA document (pre-approved activities). This would be undertaken at the time upgrades are required and would be undertaken by the Region.
- It is also noted that the Region of Niagara's wastewater conveyance system is currently under review as part of the Water and Wastewater Master Servicing Plan Review. The Master Plan would identify EA requirements to be conducted by the Region / City if the cumulative impacts of Grand Niagara Secondary Plan and other future development considerations necessitated required upgrades. The Master Plan will complete Phases 1 and 2 of the Municipal Class EA process.
- Based on the evaluation of the Secondary Plan area completed to date, it is expected that the wastewater flow from the Secondary Plan area will be able to drain to the Grassy Brook Pumping Station by gravity, with no additional pumping required. However, should a new pumping station be required, the Construction of a new pumping station in a new building would be considered Schedule B Activities. With respect to these works, under O.Reg 345/93 Designation & Exemption – Private Sector Developers, works undertaken by private sector developers are exempt from the EA Act, with an exemption that there are three criteria that all must be met in order for a private sector developer to undertake an EA:
 - The Proponent for the EA is a private sector developer and there is no coproponency with the municipality;
 - If the project is listed as a Schedule C activity; and
 - If the project involves the provision of roads, water or wastewater facilities for the residents of a municipality.

We do not believe that an EA is required because, while 2 out of the 3 criteria would apply, the works would be considered a Schedule B undertaking.



Water Upgrades:

- Based on the evaluation of the Secondary Plan area completed to date, it is expected that
 the existing City of Niagara watermains that are located within the site are sufficient to
 service the development.
- The water treatment system, storage, pumping and transmission watermains larger than 300mm are under the responsibility of the Region of Niagara. The Region of Niagara's water distribution system is currently under review as part of the Water and Wastewater Master Servicing Plan Review. The Master Plan would identify EA requirements to be conducted by the Region / City if the cumulative impacts of Grand Niagara Secondary Plan and other future development considerations necessitated required upgrade to the water distribution system. The Master Plan will complete Phases 1 and 2 of the Municipal Class EA process.

Municipal Class EA requirements – Linear Paved Facilities

Local Roads:

- The following is the definition of a Local Road in the Municipal Class EA Act:
 - "Roads which provide for low volumes of traffic and access to private properties; local roads are designed for low speeds, have capacity for 2 undivided lanes of traffic, through traffic is discouraged and parking is usually permitted though often controlled."
- Construction of local roads which are required as condition of approval on a site plan, consent, plan of subdivision or plan of condominium which will come into effect under the Planning Act prior to the construction of the road are considered Schedule A undertakings (a Pre-approved activity) and as such an EA is not required.

Collector Roads - New Construction:

- The following is the definition of a Collector Road in the Municipal Class EA Act:
 - "Roads which move low to moderate traffic volumes within specific areas of a Municipality and collect local traffic for distribution to the arterial or Provincial highway system; collector roads are generally design for medium speed, have capacity for 2-4 lanes, are usually undivided, with direct access from adjacent development permitted but usually controlled, and with controlled on-street parking usually permitted."
- The Construction of collector roads would be either considered a Schedule B or Schedule C undertaking, dependent on the cost. Construction of collector roads where the cost is less than \$2.4 million would be considered a Schedule B undertaking, otherwise it is considered a Schedule C undertaking.
- Per the Municipal Class EA document, the costs shall include the costs of the project to solve the problem and if separate components of a project are independent of each other but are being constructed together as a single project for purposes of cost effectiveness then the costs shall be considered to be separate. The costs presented in this assessment



are based on an average cost of \$800 per metre (2016 costs) for road which applies to the construction of the road only and does not include the costs of the municipal infrastructure, since this is a requirement of servicing the development.

 The following are considered to be the new Collector Roads by the definition in the Municipal Class EA (connecting the development to the arterial roads) that are being constructed as part of the development and their approximate costs:

Road Segments	Proposed Length	Cost (\$800/m)
Street A (From Grassy Brook Road to Biggar Road)	1,280 m	\$1,024,000
Street B	1,310 m	\$1,048,000
(From Street A to Montrose Road)		,

- Since the cost of the collector roads are each less than \$2.4 million, the Collector Roads would be considered Schedule B undertakings.
- With respect to these works, under O.Reg 345/93 Designation & Exemption Private Sector Developers, works undertaken by private sector developers are exempt from the EA Act, with an exemption there are three criteria that all must be met in order for a private sector developer to undertake an EA:
 - The Proponent for the EA is a private sector developer and there is no coproponency with the municipality;
 - If the project is listed as a Schedule C activity; and
 - If the project involves the provision of roads, water or wastewater facilities for the residents of a municipality.

We do not believe that an EA is required because, while 2 out of the 3 criteria would apply, the works are considered a Schedule B undertaking.

Collector Roads - Reconstruction:

- The reconstruction or widening of a Collector Road where the reconstructed road or other linear paved facilities will not be for the same purpose, use, capacity or at the same location would be either considered a Schedule B or Schedule C undertaking, dependent on the cost. Construction of collector roads where the cost is less than \$2.4 million would be considered a Schedule B undertaking, otherwise it is considered a Schedule C undertaking.
- Per the Municipal Class EA document, the costs shall include the costs of the project to solve the problem and if separate components of a project are independent of each other but are being constructed together as a single project for purposes of cost effectiveness then the costs shall be considered to be separate. The costs presented in this assessment are based on an average cost of \$1,000 per metre (2016 costs) for reconstruction of road which applies to the construction of the road only and does not include the costs of the municipal infrastructure, since this is a requirement of servicing the development.



• The following are considered to be the Collector Roads that are being reconstructed as part of the development and their approximate costs:

Road Segments	Proposed Length	Cost (\$1,000/m)
Existing Grassy Brook Road	1,660 m	\$1,660,000

- Since the cost of the Collector Road reconstruction is less than \$2.4 million, the Collector Road reconstruction would be considered Schedule B undertakings.
- With respect to these works, under O.Reg 345/93 Designation & Exemption Private Sector Developers, works undertaken by private sector developers are exempt from the EA Act, with an exemption there are three criteria that all must be met in order for a private sector developer to undertake an EA:
 - The Proponent for the EA is a private sector developer and there is no coproponency with the municipality;
 - If the project is listed as a Schedule C activity; and
 - If the project involves the provision of roads, water or wastewater facilities for the residents of a municipality.

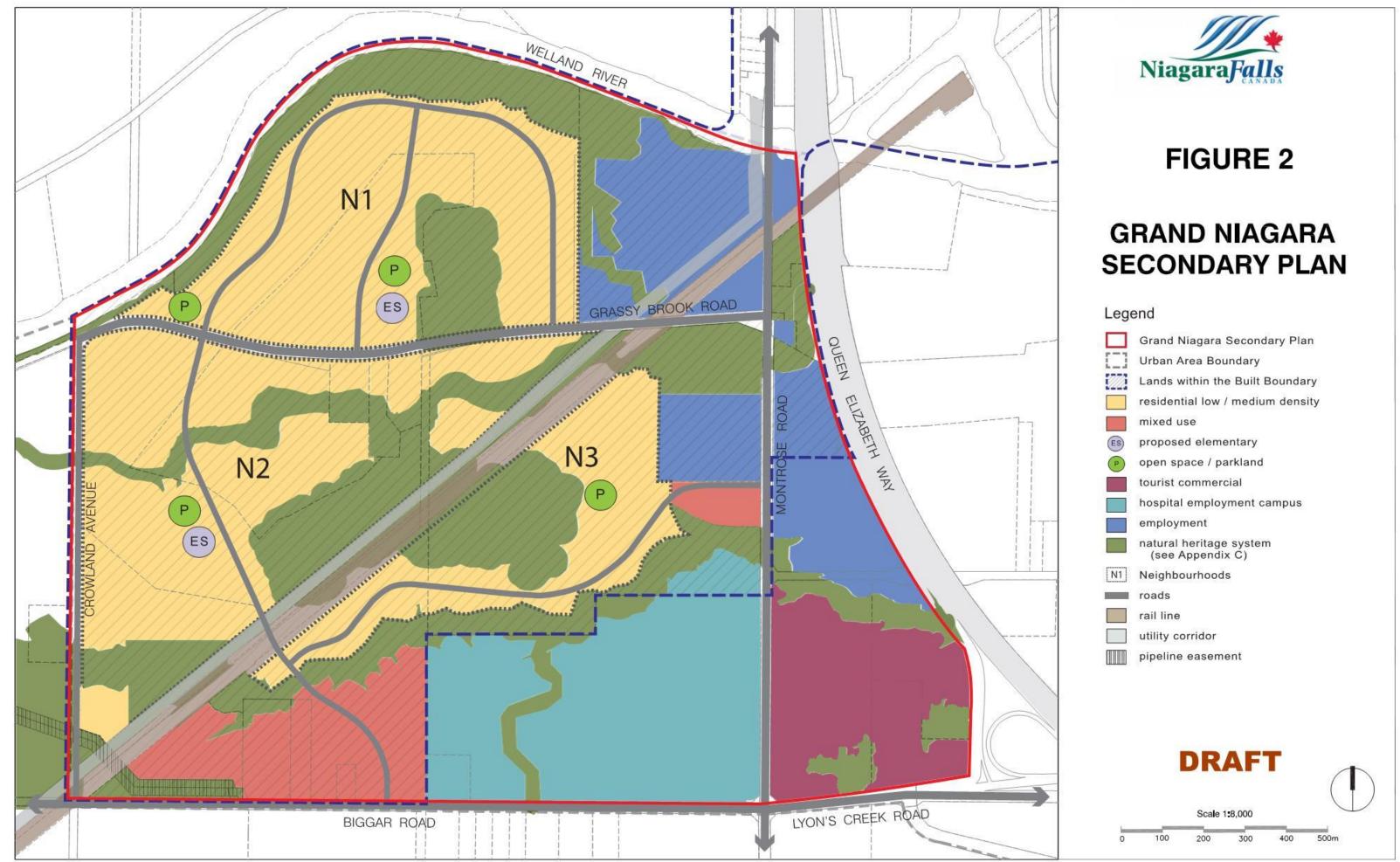
We do not believe that an EA is required because, while 2 out of the 3 criteria would apply, the works are considered a Schedule B undertaking.

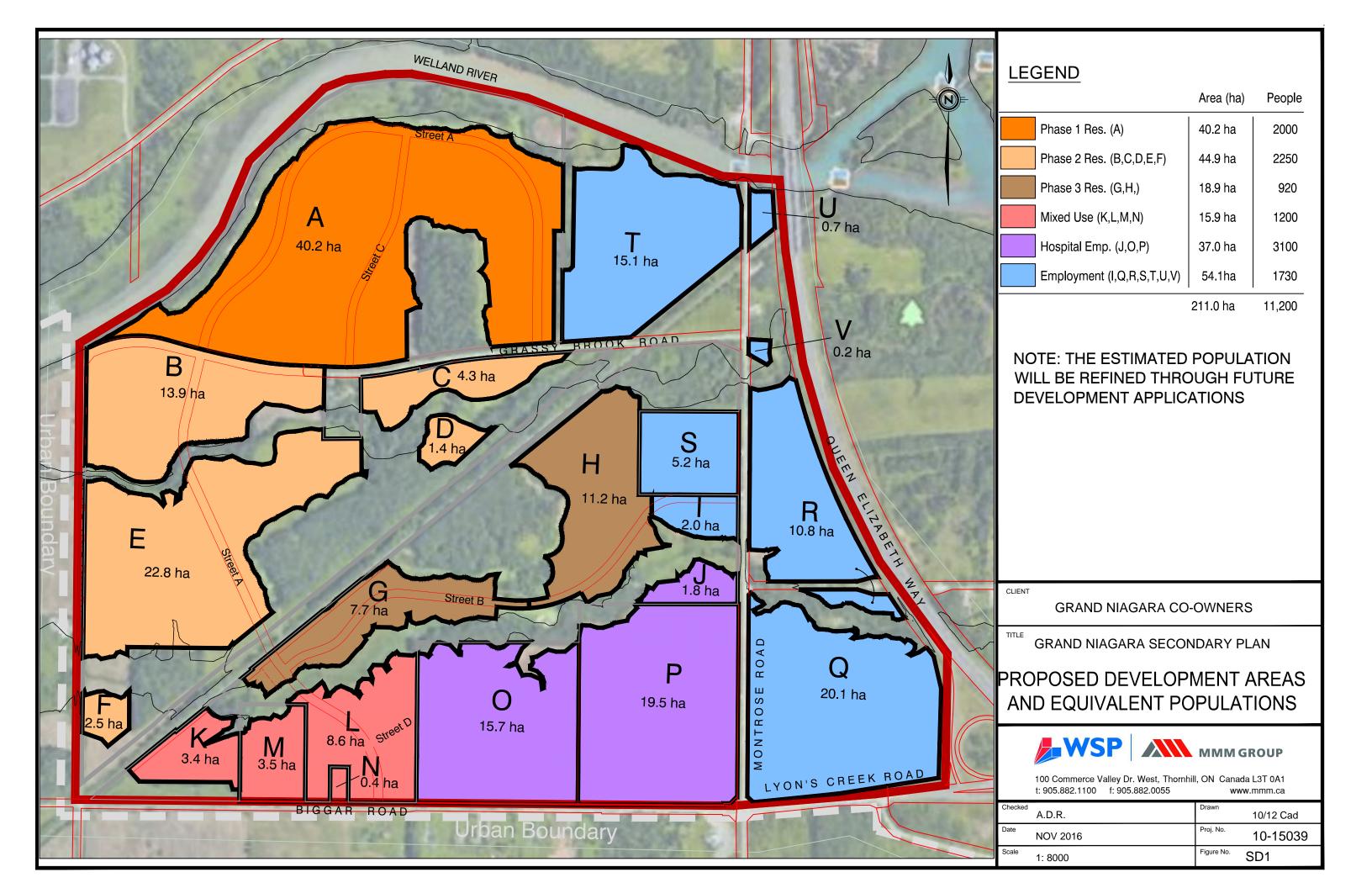
Arterial Roads:

• Montrose and Biggar are arterial roads. The Arterial Road system is currently under review by the Region of Niagara as part of the Transportation Master Plan Review. The transportation master plan would identify EA requirements to be conducted by the Region / City if the cumulative impacts of the hospital, Grand Niagara and other traffic indicated that widening was needed. In accordance with the previous versions, it is also anticipated that the Transportation Master Plan would be conducted in a manner that will follow Phases 1 and 2 of the Class EA process.

Regards, MMM Group Ltd

Jeffrey Swartz, P.Eng. Senior Project Manager Urban Development





and documentation under the Municipal Class EA can be considered to have addressed the requirements of the other proponent's Class EA process.

Private Sector Development:

Private sector

Development of municipal servicing infrastructure is undertaken by municipalities acting in their own behalf or on behalf of private sector developers, or by private sector developers acting in their own behalf. Works undertaken by municipalities are subject to the EA Act, and to this Class EA, but works undertaken by private sector developers, with the exceptions noted in Ontario Regulation 345/93 (see discussion below), continue to be exempt from the EA Act and are therefore not subject to this Class EA.

The requirements for the private sector under the Ontario EA Act are defined by Ontario Regulation 345/93. For the private sector to meet their obligations under the Ontario EA Act, they can use the Municipal Class EA process rather than undertaking an Individual EA.

Since certain infrastructure works can have significant impacts on the environment, the basis of this Class EA is that such projects shall be planned under the planning and documentation procedures set out under Schedule C and shall be subject to review by the public.

Therefore it is appropriate that such projects, whether undertaken by municipalities or by private sector developers, should be subject to review prior to implementation, regardless of who undertakes the planning and construction and regardless of who is ultimately responsible for control and maintenance of the works.

Accordingly, those projects undertaken by private sector developers which are designated as an undertaking to which the Ontario EA Act applies (i.e. Schedule C projects that are servicing residential developments - see Ontario Regulation 345/93) are subject to all of the requirements of this Class EA. Section A.2.9 of this document provides a means for integrating the requirements of the EA Act and the Planning Act, where a proponent wishes to do so.

In addition, municipalities are encouraged to consider requiring developers to fully consider appropriate alternatives even if the project is exempt under Ontario Regulation 345/93.

A.1.4 PHASE-IN

Phase-in provisions.

For roads, water and wastewater projects, the following phase-in provisions

MUNICIPAL WATER AND WASTEWATER PROJECTS

SCHEDULE A+ - PRE-APPROVED ACTIVITIES

(Note: The schedules shall be reviewed inclusively to ensure that the correct schedule is selected.)

The following Schedule A+ activities are pre-approved, however, the public is to be advised prior to project implementation. The manner in which the public is advised is to be determined by the proponent.

Wastewater Management Projects:

- Establish, extend, or enlarge a sewage collection system and all necessary works to connect the system to an existing sewage or natural drainage outlet, provided all such facilities are in either an existing road allowance or an existing utility corridor, including the use of Trenchless Technology for water crossings.
- 2 Retire a facility which would have been planned under Schedule A or Schedule A+ of the Municipal Class EA for its establishment (see Glossary definition of Retirement).
- Increase pumping station capacity by adding or replacing equipment and appurtenances, where new equipment is located in an existing building or structure and where its existing rated capacity is exceeded.
- 4 Installation or replacement of standby power equipment where new equipment is located in an existing building or structure.
- 5 Modify, retrofit, or improve a retention/detention facility including outfall or infiltration system for the purpose of stormwater quality control. Biological treatment through the establishment of constructed wetlands is permitted.
- 6 Retire a facility which would have been subject to either Schedule B or C of the Municipal Class EA for its establishment (see Glossary definition of Retirement).

Water Projects:

- Establish, extend or enlarge a water distribution system and all works necessary to connect the system to an existing system or water source, provided all such facilities are in either an existing road allowance or an existing utility corridor, including the use of Trenchless Technology for water crossings.
- 2 Retire a water facility which would have been planned under Schedule A or Schedule A+ of the Municipal Class EA for its establishment (See Glossary definition of Retirement).
- 3 Installation of new standby power equipment to an existing building or structure
- 4 Expand / refurbish / upgrade water treatment plant up to existing rated capacity where no land acquisition is required.

5 Retire a water facility which would have been planned under Schedule B or C of the Municipal Class EA for its establishment (See Glossary definition of Retirement).

MUNICIPAL WATER AND WASTEWATER PROJECTS

SCHEDULE B: ACTIVITIES SUBJECT TO THE SCREENING PROCESS

(Note: The schedules shall be reviewed inclusively to ensure that the correct schedule is selected.)

The following Schedule B activities, having completed Phases 1 and 2 of the planning process, are approved subject to Screening. If the screening process, through Phases 1 and 2, results in other requirements of this Class EA being applicable, then those requirements must also be fulfilled.

For the following activities the proponent shall contact specific agencies and potentially affected members of the public (see Screening Criteria under Appendix 3). For example, if it is determined when planning to modify the intake to an existing water system, that the project will directly affect a permanent watercourse, then the proponent shall contact the Local District of the Ministry of Natural Resources and the Federal Department of Fisheries and Oceans - Habitat Management and Enhancement.

Agreements made or commitments given by the proponent to affected agencies or members of the public during the course of the screening process must be followed through and implemented or else the conditions of the EA approval will be deemed to be unfulfilled. If a party has a concern that cannot be resolved by discussion and negotiation between that party and the proponent, then the procedure to request an order may be invoked (see Section A.2.8). By the nature of Schedule B activities, however, it is anticipated that this will not occur frequently.

Two points of contact with the public are mandatory under the screening process. The proponent may select the method of public notification which best suits the circumstances of the specific project under consideration (see Exhibit A.2 - Flow Chart and Section A.3.5 - Public Consultation).

Proponents are encouraged to review section A.2.9 for opportunities to integrate Class EA projects with the Planning Act.

Wastewater Management Projects:

- 1 Establish, extend or enlarge a sewage collection system and all works necessary to connect the system to an existing sewage outlet where such facilities are not in an existing road allowance or an existing utility corridor.
- 2 Establish new stormwater retention/detention ponds and appurtenances or infiltration systems including outfall to receiving water body where additional property is required.
- 3 Enlarge stormwater retention/detention ponds/ tanks or sanitary or combined sewage detention tanks by addition or replacement, at substantially the same location where additional property is required.
- 4 Establish sewage flow equalization tankage in existing sewer system or at existing sewage treatment plants, or at existing pumping stations for influent and/or effluent control.

SCHEDULE B - Continued

- Add additional lagoon cells or establish new lagoons, or install new or additional sewage storage tanks at an existing sewage system, where land acquisition is required but existing rated capacity will not be exceeded.
- 6 Establish biosolids management facilities at:
 - a) A sewage treatment plant where the biosolids were not generated.
 - b) An existing landfill site, incinerator or organic soil conditioning site where the biosolids are not to be disposed of nor utilized.
- Construct new pumping station or increase pumping station capacity by adding or replacing equipment and appurtenances, where new equipment is located in a new building or structure.
- 8. Expand sewage treatment plant, including relocation or replacement of outfall to receiving water body, up to existing rated capacity where new land acquisition is required.
- 9. Increase sewage treatment plant capacity beyond existing rated capacity through improvements to operations and maintenance activities only but without construction of works to expand, modify or retrofit the plant or the outfall to the receiving water body where there is an increase to total mass loading to the receiving water body as identified in the Certificate of Approval.
- 10. Expand, improve or modify existing patrol yards, equipment or material storage facilities and maintenance facilities where additional land acquisition is required.
- 11. Communal sewage systems (new or expanded) with subsurface effluent disposal subject to approval under Section 53 of the Ontario Water Resources Act.
- 12. New service facilities (e.g. patrol yards, storage and maintenance facilities, parking lots for service vehicles).
- 13. Expansion of the buffer zone between a lagoon facility or land treatment area and adjacent uses, where the buffer zone extends onto lands not owned by the proponent.
- 14. Water crossing by a new or replacement sewage facility except for the use of Trenchless Technology for water crossings.
- 15. Construct berms along a watercourse for purposes of flood control in areas subject to damage by flooding.
- 16. Modify existing water crossings for the purposes of flood control.
- 17. Works undertaken in a watercourse for the purposes of flood control or erosion control, which may include:
- bank or slope regrading
- deepening the watercourse
- relocation, realignment or channelization of watercourse

matters affected or potentially affected by projects planned under this Class EA. This includes municipalities other than the proponent.

ROAD ALLOWANCE:

Means a surveyed allowance of land for roadway purposes. A road allowance can be either "opened" with an existing road surface or "unopened" in which case no travelled surface is provided.

In this document, "existing road allowance" means an existing opened road allowance with an existing road surface, or road right-of-way. It does not include an unopened or shore road allowance.

ROAD CAPACITY:

Means capacity defined in terms of travelled lanes and does not differentiate between various lane widths to accommodate differing volumes of traffic.

ROAD WIDENING:

Means increasing the number of lanes of an existing road and may include the widening of the right-of-way but does not include localized operational improvements.

ROADS:

Arterial Roads:

Means roads which move moderate to high traffic volumes over moderate distances within a municipality between principal areas of traffic generation and which gather traffic from collector roads and local roads and move it to the Provincial highway system; arterial roads are generally designed for medium speed, have capacity for 2 - 6 lanes, may be divided, with limited or controlled direct access from adjacent developments and with on-street parking discouraged.

Collector Roads:

Means roads which move low to moderate traffic volumes within specific areas of a municipality and collect local traffic for distribution to the arterial or Provincial highway system; collector roads are generally designed for medium speed, have capacity for 2 - 4 lanes, are usually undivided, with direct access from adjacent development permitted but usually controlled, and with controlled on-street parking usually permitted.

Local Roads:

Means roads which provide for low volumes of traffic and access to private properties; local roads are designed for low speeds, have capacity for 2 undivided lanes of traffic; through traffic is discouraged and parking is usually permitted though often controlled.

SAME PURPOSE, USE, CAPACITY AND LOCATION: See Operation.

stockpiling has previously taken place			NL	_	
9. Initial stockpiling of de-icing material at existing service facility Description of the Project (Note: The Schedules shall be reviewed inclusively to ensure that the correct schedule is selected)	Cost Lin	ait for Pro		l Under	
	Cost Lin	Cost Limit for Project Approved Under Schedule			
	Pro Ann	Pre Approved			
	A	A+	В	C	
				Parameter in the parame	
GENERAL OPERATION AND MAINTENANCE OF LINEAR PAVI	EDFACILIIE	SANDK	LLAILD		
ACILITIES		Hilliogenia († 1818)			
0. Snow and de-icing operations that comply with MOE's Guideline B-	4 NL	-	-	-	
"Snow Disposal and De-icing Operations in Ontario"					
1. Streetscaping (e.g. decorative lighting, sidewalk improvements,		NL		_	
benches, landscaping not part of another project).	·				
2. a) Construction of localized operational improvements at specific		3.77			
locations		NL		-	
b) Installation of guide rails					
3. Installation, construction or reconstruction of traffic control devices	<9.5 m	_	>9.5 m	_	
(e.g. signing, signalization)					
4. Construction of new parking lots not associated with a building	<9.5 m		>9.5 m		
5. Installation of safety projects (e.g. lighting including "high mast",	<2.4 m	_	>2.4 m	_	
grooving, glare screens, safety barriers, energy attenuators)	-2.4 III		- 2. 4 III		
6. Establishment of a roadside park or picnic area		NL		-	
7. Culvert repair and replacement where the capacity of the culvert is not	t				
increased beyond the minimum municipal standard or the capacity	NL	_	_	_	
required to adequately drain the area, whichever is greater, and where	NL -	_	_	_	
there is no change in drainage area					
8. Construction of a new culvert or increase culvert size due to change in	1	NL		_	
the drainage area		INL		_	
9. Reconstruction where the reconstructed road or other linear paved					
facilities (e.g. HOV lanes) will be for the same purpose, use, capacity					
and at the same location (e.g. addition or reduction of cycling	-	NL	-	-	
lanes/facilities or parking lanes, provided no change in the number of					
motor vehicle lanes)					
0. Reconstruction or widening where the reconstructed road or other					
linear paved facilities (e.g. HOV lanes will not be for the same	_	_	<2.4 m	>2.4 m	
purpose, use, capacity or at the same location (e.g. additional motoe	_		72.4 111	2.7111	
vehicle lanes, continuous centre turn lane)					
1. Construction of new roads or other linear paved facilities (e.g. HOV	_	_	<2.4 m	>2.4 m	
lanes)			\2.4 III	~2. 4 III	
2. Redesignation of a Linear Paved Facility through signage or pavemen					
marking modifications (i.e. not requiring physical construction beyond	d				
localized operational improvements described in activity No.12				1	
above):					
 addition or removal of parking or turning lane markings on an 					
existing roadway	NL	NL	-	_	
conversion of one-way or two-way streets					
• redesignation of existing General Purpose Lane (GPL) or on-street					
parking to High Occupancy Vehicle (HOV) or cycling lanes/facilities	<u>.</u>				
vice versa:	"				
addition or removal of cycling lanes/facilities					
	_		3.5 m –	-	
New Construction or removal of sidewalks, multi-purpose paths or cycling	⁵ -	-	9.5 m		
facilities including water crossings outside existing right-of-way	al		9.5 M	1	
 Construction of local roads which are required as condition of approve on a site plan, consent, plan of subdivision or plan of condominium 	ai NL				
	i INII			1 -	