

ENVIRONMENTAL COMPLIANCE APPROVAL

NUMBER A-500-7142400403 Version: 1.0 Issue Date: August 10, 2022

Pursuant to section 20.3 of the Environmental Protection Act, Revised Statutes of Ontario (R.S.O.) 1990, c. E. 19 and subject to all other applicable Acts or regulations this Environmental Compliance Approval is issued to:

SOCIÉTÉ EN COMMANDITE HIGHWAY 417 CASSELMAN / HIGHWAY 417 CASSELMAN LIMITED PARTNERSHIP

1285 HODGE 200 ST. LAURENT QUEBEC H4N 2B6

For the following site:

626 Principale Street Municipality of Casselman, ON K0A 1M0

You have applied under section 20.2 of Part II.1 of the Environmental Protection Act, R.S.O. 1990, c. E. 19 (Environmental Protection Act) for approval of:

the establishment of stormwater management works servicing a distribution warehouse, for the collection, transmission, treatment and disposal of storm water runoff from a total catchment area of approximately 14.1 hectares, to provide erosion control and to control pre-development peak flows to post-development peak flows for all storms up to the 100-year event, discharging to existing municipal ditches, as well as the establishment usage and operation of new non-municipal sewage Works, for the treatment of sanitary sewage from a proposed warehouse facility located at the above site address and year-round subsurface disposal of Final Effluent consisting of the following:

Stormwater Management Works:

- rooftop storage (catchment area 4.95 hectares), provided on top of the proposed warehouse, having a minimum available storage volume of approximately 2,516 cubic metres and a corresponding required ponding depth of approximately 15 centimetres, discharging via eighty-five (85) roof drains (Accutrol Weir Flow Control or approved Equivalent), allowing a maximum combined discharge of approximately 161 litres per second during the 100-year storm event, discharging to dry pond DP-01 described below via private on-site storm sewer system and pumping stations;
- stormwater management facility "DP-01": (catchment area 11.5 hectares): one (1) dry pond with two (2) sediment forebays, located at the north-west property limit, receiving roof and surface runoff via private on-site storm sewer system, requiring an active storage volume of approximately 3,786 cubic meters during the 100-year storm event compared to an available storage volume of approximately of 4,695 cubic meters, lined with waterproof membrane, discharging to the Oil and Grit Separator "TU-01" described below via one (1) 750 mm diameter outlet pipe, controlled by one (1) 145 mm diameter inlet control device as well as one (1) 1800 mm wide weir located within a downstream control structure;
- oil and grit separator "TU-01" (catchment area 11.5 hectares): one (1) oil and grit separator, Imbrium Stormceptor Model EFO12 (or Equivalent Equipment), located downstream of the dry pond DP-01 regulation chamber, having a sediment storage capacity of 31,220 L and an oil storage capacity of 2,475 litres, a maximum treatment flow rate of 93.7 litres per second, discharging via 600 mm diameter outlet pipe to a ditch along Principal Street;

- stormwater management facility "DP-02": (catchment area 2.5 hectares): one (1) dry pond with one (1) sediment forebay, located at the southern property limit, receiving roof and surface runoff via private on-site storm sewer system, requiring an active storage volume of approximately 966 cubic meters during the 100-year storm event compared to an available storage volume of approximately of 1,115 cubic meters, discharging to the Oil and Grit Separator "TU-02" described below via one (1) 300 mm diameter outlet pipe, controlled by one (1) inlet control device (Vortex Flow Regulator 150_VHV-2 or equivalent) as well as one (1) 1800 mm wide weir located within a downstream control structure;
- oil and grit separator "TU-02" (catchment area 2.5 hectares): one (1) oil and grit separator, Imbrium Stormceptor Model EF06 (or Equivalent Equipment), located downstream of the dry pond DP-02 regulation chamber, having a sediment storage capacity of 3,470 L and an oil storage capacity of 610 litres, a maximum treatment flow rate of 23.4 litres per second, discharging via 300 mm diameter outlet pipe to a ditch along Road 700;

including erosion/sedimentation control measures during construction and all other controls and appurtenances essential for the proper operation of the aforementioned Works;

all in accordance with the submitted application and supporting documents listed in Schedule 1 forming part of this Approval.

Sanitary Sewage Works:

Classification of Sewage Treatment Plant: Secondary

Details of Service Area:

- Type of Occupancy: Commercial
- **Type and Number of Units:** Warehouse building including 868 m² of office space, 45 warehouse loading bays, four water closets;

Design Capacity of Sewage Treatment Plant

Design Capacity with All Treatment Trains in Operation	Proposed Works
Maximum Daily Flow:	17.55 m ³ /d

Proposed Works:

BNA (Bergmann North American Inc.) Tertiary Treatment Sewage System (WWTP)

Preliminary Treatment System (tank 1) and Influent Sampling Point

One (1) 13,650 L precast concrete equalization tank providing flow equalization up to the maximum daily flow, receiving
domestic sewage from the warehouse and guard house via private on-site collection system and sewage pumping
station, equipped with duplex pumps discharging at a timed dose rate of 730 L/hr into primary treatment system, with
influent samples to be taken from the equalization tank;

Primary Treatment System (tank 2)

• One (1) 6000 gallon precast concrete tank, comprised of one (1) 20,000 L sludge storage compartment as well as one (1) 9,600 L primary clarifier compartment discharging to bioreactor #1 described below;

Secondary Treatment System (tank 3)

- One (1) moving bed biofilm reactor (iQ MBBR) system, consisting of two anaerobic bioreactors, bioreactor #1 and bioreactor #2 connected in series with a working volume of 5,800 L and 5,600 L respectively, equipped with approximately 4.2 m3 of carrier media having a specific surface area 500 m2/m3, complete with six (6) linear air blowers discharging to the secondary clarifier described below;
- One (1) secondary clarifier within tank 3 with a working volume of 3,900 L, complete with one (1) surface skimmer and one (1) sludge return pump, returning settled sludge to the sludge storage tank described above as well as discharging clarified effluent to the effluent pump tank described below (initial scenario) or alternatively to a future tank#4 as contingency plan depending on effluent monitoring results;

Tier 3 Contingency Nitrate Treatment System (tank 4)

- One (1) recirculation pump to be added to bioreactor #2 described above to facilitate pre-anoxic denitrification via mixed liquor return to the sludge storage tank described above;
- One (1) precast concrete tank consisting of anoxic bioreactor (2,900 L), bioreactor #3 (2,700 L) and tertiary clarifier (1,800 L), receiving influent from the secondary clarifier described above, with the anoxic bioreactor containing approximately 1.3 m3 of carrier media having a specific surface area 500 m2/m3, complete with two (2) linear air blowers to facilitate periodical mixing, discharging via bioreactor #3 and the tertiary clarifier within tank #4 to the effluent pump tank described below;

Final Effluent Disposal Facilities (Type A Dispersal Bed) and Effluent Sampling Point

- One (1) 7,000 L precast concrete effluent pump tank, equipped with duplex effluent pumps, alternately discharging 1,460 L/dose towards four (4) distribution valves via 63 mm diameter forcemain and ultimately via four (4) 50 mm diameter forcemains towards the dispersal bed described below, with effluent samples to be taken from the effluent pump tank;
- One (1) type A dispersal bed consisting of four (4) cells ("pods") with a minimum total stone area of approximately 393.6 m2 at 300 mm depth, each cell consisting of 8 runs of perforated 75 mm diameter distribution pipe spaced at 1 metre, each 10.8 metres long, providing a minimum sand contact area of 2,194 m2 at 1.3 m to 1.45 m depth, complete with 20 metre mantle for pod 1 and 15 metre mantle for pod 3 with the entire bed finished with 200/300 mm of topsoil and sod;

including all other mechanical system, electrical system, instrumentation and control system, standby power system, piping, pumps, valves and appurtenances essential for the proper, safe and reliable operation of the Works in accordance with this Approval, in the context of process performance and general principles of wastewater engineering only, all in accordance with the submitted supporting documents listed in Schedule 1.

DEFINITIONS

For the purpose of this environmental compliance approval, the following definitions apply:

- 1. "Annual Maximum Daily Influent Flow" means the maximum Influent collected in a single day during a calendar year;
- 2. "Approval" means this entire Environmental Compliance Approval and any Schedules attached to it;
- 3. "BOD5" (also known as TBOD5) means five day biochemical oxygen demand measured in an unfiltered sample and includes carbonaceous and nitrogenous oxygen demands;
- 4. "CBOD5" means five day carbonaceous (nitrification inhibited) biochemical oxygen demand measured in an unfiltered sample;

- 5. "Director" means a person appointed by the Minister pursuant to section 5 of the EPA for the purposes of Part II.1 of the EPA;
- 6. "District Manager" means the District Manager of the appropriate local district office of the Ministry, where the Works is geographically located;
- 7. "EPA" means the Environmental Protection Act, R.S.O. 1990, c.E.19, as amended;
- 8. "Equivalent Equipment" means alternate piece(s) of equipment that meets the design requirements and performance specifications of the piece(s) of equipment to be substituted;
- "Final Effluent" means effluent that is discharged to the environment through the approved effluent disposal facilities, including all Bypasses, that are required to meet the compliance limits stipulated in the Approval for the Sewage Treatment Plant at the Final Effluent sampling point(s);
- 10. "Grab Sample" means an individual sample of at least 1000 millilitres collected in an appropriate container at a randomly selected time over a period of time not exceeding 15 minutes;
- 11. "Influent" means flows to the Sewage Treatment Plant from the private collection system;
- 12. "Licensed Engineering Practitioner" means a person who holds a licence, limited licence or temporary licence under the Professional Engineers Act, R.S.O. 1990, c. P.28;
- 13. "Ministry" means the ministry of the government of Ontario responsible for the EPA and OWRA and includes all officials, employees or other persons acting on its behalf;
- 14. "Normal Operating Condition" means the condition when all unit process(es), excluding Preliminary Treatment System, in a treatment train is operating within its design capacity;
- 15. "Operating Agency" means the Owner, person or the entity that is authorized by the Owner for the management, operation, maintenance, or alteration of the Works in accordance with this Approval;
- 16. "Owner" means SOCIÉTÉ EN COMMANDITE HIGHWAY 417 CASSELMAN / HIGHWAY 417 CASSELMAN LIMITED PARTNERSHIP and its successors and assigns;
- 17. "OWRA" means the Ontario Water Resources Act, R.S.O. 1990, c. O.40, as amended;
- 18. "Peak Daily Flow Rate" (also referred to as maximum daily flow or maximum day flow) means the largest volume of flow to be received during a one-day period for which the sewage treatment process unit or equipment is designed to handle;
- 19. "Preliminary Treatment System" means all facilities in the Sewage Treatment Plant associated with screening and grit removal;
- 20. "Primary Treatment System" means all facilities in the Sewage Treatment Plant associated with the primary sedimentation unit process;
- 21. "Proposed Works" means those portions of the Works included in the Approval that are under construction or to be constructed;
- 22. "Secondary Treatment System" means all facilities in the Sewage Treatment Plant associated with biological treatment, secondary sedimentation and phosphorus removal unit processes if applicable;
- 23. "Single Sample Result" means the test result of a parameter in the effluent discharged on any day, as measured by a probe, analyzer or in a composite or grab sample, as required;
- 24. "Works" means the approved sewage works, and includes Proposed Works.

TERMS AND CONDITIONS

You are hereby notified that this environmental compliance approval is issued to you subject to the terms and conditions outlined below:

1. GENERAL CONDITION

- 1. The Owner shall ensure that any person authorized to carry out work on or operate any aspect of the Works is notified of this Approval and the terms and conditions herein and shall take all reasonable measures to ensure any such person complies with the same.
- 2. The Owner shall design, construct, operate and maintain the Works in accordance with the conditions of this Approval.
- 3. Where there is a conflict between a provision of any document referred to in this Approval and the conditions of this Approval, the conditions in this Approval shall take precedence.
- 4. The issuance of, and compliance with the conditions of, this Approval does not:
 - a. relieve any person of any obligation to comply with any provision of any applicable statute, regulation or other legal requirement, including, but not limited to, the obligation to obtain approval from the local conservation authority necessary to construct or operate the sewage works; or
 - b. limit in any way the authority of the Ministry to require certain steps be taken to require the Owner to furnish any further information related to compliance with this Approval.

2. EXPIRY OF APPROVAL

- 1. In the event that completion and commissioning of any portion of the Works is anticipated to be more than five (5) years, the Owner shall submit an application for extension at least twelve (12) months prior to the end of the five (5) years from the day of issuance of this Approval. The application shall include the reason(s) for the delay, whether there is any design change(s) and a review of whether the standards applicable at the time of Approval of the Works are still applicable at the time of request for extension, to ensure the ongoing protection of the environment.
- 2. Condition 2.1 shall not apply to the contingency nitrate treatment system (tank 4) and associated modifications to the works.

3. CHANGE OF OWNER AND OPERATING AGENCY

- 1. The Owner shall notify the District Manager and the Director, in writing, of any of the following changes within thirty (30) days of the change occurring:
 - a. change of address of Owner;
 - b. change of Owner, including address of new owner;
 - c. change of partners where the Owner is or at any time becomes a partnership, and a copy of the most recent declaration filed under the *Business Names Act,* R.S.O. 1990, c. B.17, as amended, shall be included in the notification;
 - d. change of name of the corporation where the Owner is or at any time becomes a corporation, and a copy of the most current information filed under the *Corporations Information Act,* R.S.O. 1990, c. C.39, as amended, shall be included in the notification.
- 2. The Owner shall notify the District Manager, in writing, of any of the following changes within thirty (30) days of the change occurring:
 - a. change of address of the Operating Agency;
 - b. change of the Operating Agency, including address of the new Operating Agency.

- 3. In the event of any change in ownership of the Works, the Owner shall notify the succeeding owner in writing, of the existence of this Approval, and a copy of such notice shall be forwarded to the District Manager and the Director.
- 4. The Owner shall ensure that all communications made pursuant to this condition refer to the number of this approval.

4. CONSTRUCTION OF THE WORKS

- 1. Upon the construction of the Works, the Owner shall prepare and submit a written statement , certified by a Licensed Engineering Practitioner, that the Works are constructed in accordance with this Approval, and upon request, shall make written statement available for inspection by Ministry personnel.
- 2. Upon completion of construction of the Proposed Works, the Owner shall prepare and submit a written statement to the District Manager, certified by a Licensed Engineering Practitioner, that the Proposed Works is constructed in accordance with this Approval.
- 3. One (1) week prior to the commencement of the operation of the Proposed Works, the Owner shall notify the District Manager (in writing) of the pending start-up date.
- 4. Within six (6) months of the construction of the Works, a set of record drawings of the Works shall be prepared or updated. These drawings shall be kept up to date through revisions undertaken from time to time and a copy shall be readily accessible for reference at the Works.
- 5. The Owner shall ensure that the treatment technologies are installed and operated in accordance with the manufacturer's installation manual.
- 6. The Owner shall ensure that the Works are constructed such that minimum horizontal clearance distances as specified in the OBC are satisfied.
- 7. The Owner shall ensure that an imported soil that is required for construction of any subsurface disposal bed as per this Approval is tested and verified by the Licensed Engineering Practitioner for the percolation time (T) prior to delivering to the site location and the written records are kept at the site.

5. TEMPORARY EROSION AND SEDIMENT CONTROL

- 1. The Owner shall install and maintain temporary sediment and erosion control measures during construction and conduct inspections once every two (2) weeks and after each significant storm event (a significant storm event is defined as a minimum of 25 millimetres of rain in any 24 hours period). The inspections and maintenance of the temporary sediment and erosion control measures shall continue until they are no longer required and at which time they shall be removed and all disturbed areas reinstated properly.
- 2. The Owner shall maintain records of inspections and maintenance which shall be made available for inspection by the Ministry, upon request. The record shall include the name of the inspector, date of inspection, and the remedial measures, if any, undertaken to maintain the temporary sediment and erosion control measures.

6. DESIGN OBJECTIVES (Sanitary Sewage Works)

- 1. The Owner shall design and undertake everything practicable to operate the Sewage Treatment Plant in accordance with the following objectives:
 - a. Final Effluent parameters design objectives listed in the table(s) included in Schedule 2.

7. MONITORING AND RECORDING (Sanitary Sewage Works)

1. The Owner shall, upon commencement of operation of the Works, carry out a scheduled monitoring program of collecting samples at the required sampling points, at the frequency specified or higher, by means of the specified sample type and analyzed for each parameter listed in the tables under the monitoring program included in Schedule 3 and record all results, as follows:

- a. all samples and measurements are to be taken at a time and in a location characteristic of the quality and quantity of the sewage stream over the time period being monitored.
- b. definitions and preparation requirements for each sample type are included in the document referenced in Paragraph 2.b;
- c. definitions for frequency:
 - i. Daily means once every day;
 - ii. Monthly means once every month;
 - iii. Quarterly means once every three months;
 - iv. Annually means once every year;
- 2. The Owner shall, upon commencement of operation of the sewage works, carry out a scheduled groundwater monitoring program at the required sampling points, at the frequency specified or higher, by means of the specified sample type and analyzed for each parameter listed in the tables under the monitoring program included in Schedule 3.
 - a. The Owner shall compare analytical monitoring results obtained pursuant to Subsection (2) with the trigger level concentration of nitrate of 2.9 mg/L.
 - b. The trigger level program shall be implemented using the following three (3) tiers to verify the results an direct potential contingency implementation:
 - i. Tier 1 Routine Monitoring Program (RMP) involves sampling of the monitoring wells at the frequency identified in schedule 3. All groundwater monitoring activities completed will be considered Tier 1 RMP unless the average of nitrate concentrations in groundwater samples from MW21-9 and MW21-10 during a single event exceeds the trigger concentration of 2.9 mg/L.
 - ii. If the nitrate trigger concentration is exceeded, the Tier 2 Confirmation Monitoring Program (CMP) shall be implemented. The Tier 2 CMP consists of collecting groundwater samples for three consecutive months. If the results of the monthly sampling indicate a return of average nitrate concentrations to below the trigger concentration, or a trend of decreasing nitrate concentrations, then Tier 1 RMP will resume.

If the Tier 1 exceedance is confirmed and nitrate concentrations are observed to be increasing, the next step shall be a re-evaluation of the degree, nature and potential source(s) of the nitrate impact identified in Tier 1 including the implication of the exceedance in terms of the potential for impacts to downgradient off-site water users.

If the Tier 2 CMP and the subsequent evaluation indicate that operation of the Works is having a detrimental effect on water quality migrating off-site, then Tier 3 Contingency Measures and Compliance Monitoring Program shall be implemented.

iii. The Tier 3 Contingency Measures and Compliance Monitoring Program (CMCMP) involves assessment and implementation of contingency measures in the event of imminent off-site groundwater quality impairment. Contingency measures to be evaluated should include implementation of an advanced nitrate treatment in the Works for the purpose of meeting the site-specific Reasonable Use Guideline concentration for nitrate (3.2 mg/L) at the downgradient property boundary.

Tier 3 CMCMP should also include on-going monitoring to continually assess the effectiveness of the contingency measures that have been implemented. The compliance monitoring parameters, locations and monitoring frequency should be determined at the time of implementation of contingency measures.

- c. The Owner shall notify the District Manager orally, or as soon as possible, and in writing within seven (7) days in the event a trigger exceedance occurs.
- 3. The methods and protocols for sampling, analysis and recording shall conform, in order of precedence, to the methods and protocols specified in the following documents and all analysis shall be conducted by a laboratory accredited to the ISO/IEC:17025 standard or as directed by the District Manager :
 - a. the Ministry's Procedure F-10-1, "Procedures for Sampling and Analysis Requirements for Municipal and Private Sewage Treatment Works (Liquid Waste Streams Only), as amended;
 - b. the Ministry's publication "Protocol for the Sampling and Analysis of Industrial/Municipal Wastewater Version 2.0" (January 2016), PIBS 2724e02, as amended;
 - c. the publication "Standard Methods for the Examination of Water and Wastewater", as amended; and
 - d. for any parameters not mentioned in the documents referenced in Paragraphs 2.a, 2.b and 2.c, the written approval of the District Manager shall be obtained prior to sampling.
- 4. The Owner shall monitor and record the flow rate and daily quantity using flow measuring devices or other methods of measurement as approved below calibrated to an accuracy within plus or minus 15 per cent (+/- 15%) of the actual flowrate of the following:
 - a. Influent flow to the Sewage Treatment Plant by continuous flow measuring devices and instrumentations/pumping rates;
 - b. Final Effluent discharged from the Sewage Treatment Plant by continuous flow measuring devices and instrumentations/pumping rates;
- 5. The Owner shall retain for a minimum of five (5) years from the date of their creation, all records and information related to or resulting from the monitoring activities required by this Approval.
- 6. The measurement frequencies specified in Schedule 3 in respect to any parameter may, after three (3) year of monitoring in accordance with this condition, be modified by the Director in writing.

8. OPERATION AND MAINTENANCE (Stormwater Management Works)

- 1. The Owner shall make all necessary investigations, take all necessary steps and obtain all necessary approvals so as to ensure that the physical structure, siting and operations of the Works do not constitute a safety, health or flooding hazard to the general public.
- 2. The Owner shall undertake an inspection of the condition of the Works, at least once a year, and undertake any necessary cleaning and maintenance to ensure that sediment, debris and excessive decaying vegetation are removed from the Works to prevent the excessive build-up of sediment, oil/grit, debris and/or decaying vegetation, to avoid reduction of the capacity and/or permeability of the Works, as applicable. The Owner shall also regularly inspect and clean out the inlet to and outlet from the Works to ensure that these are not obstructed.
- 3. The Owner shall construct, operate and maintain the Works with the objective that the effluent from the Works is essentially free of floating and settleable solids and does not contain oil or any other substance in amounts sufficient to create a visible film, sheen, foam or discoloration on the receiving waters.
- 4. The Owner shall ensure the immediate clean-out of the Works after a fuel or oil spill capture.
- 5. The Owner shall ensure that equipment and material for the containment, clean-up and disposal of fuel and oil and materials contaminated with such, is on hand and in good repair for immediate use in the event of:
 - a. loss of fuel or oil to the Works; or
 - b. a spill within the meaning of Part X of the EPA.

- 6. The Owner shall prepare an operations manual prior to the commencement of operation of the Works that includes, but is not necessarily limited to, the following information:
 - a. operating and maintenance procedures for routine operation of the Works;
 - b. inspection programs, including frequency of inspection, for the Works and the methods or tests employed to detect when maintenance is necessary;
 - c. repair and maintenance programs, including the frequency of repair and maintenance for the Works;
 - d. contingency plans and procedures for dealing with potential abnormal situations and for notifying the District Manager; and
 - e. procedures for receiving, responding and recording public complaints, including recording any follow-up actions taken.
- 7. The Owner shall maintain an up to date operations manual and make the manual readily accessible for reference at the Works for the operational life of the Works. Upon request, the Owner shall make the manual available to Ministry staff.
- 8. The Owner shall maintain a logbook to record the results of these inspections and any cleaning and maintenance operations undertaken, and shall keep the logbook at the Works for inspection by the Ministry. The logbook shall include the following:
 - a. the name of the Works;
 - b. the date and results of each inspection, maintenance and cleaning, including an estimate of the quantity of any materials removed and method of clean-out of the Works; and
 - c. the date of each spill within the catchment area, including follow-up actions and remedial measures undertaken.
- 9. The Owner shall retain for a minimum of five (5) years from the date of their creation, all records and information related to or resulting from the operation and maintenance activities required by this Approval.

9. OPERATION AND MAINTENANCE (Sanitary Sewage Works)

- The Owner shall ensure that, at all times, the Works and the related equipment and appurtenances used to achieve compliance with this Approval are properly operated and maintained. Proper operation and maintenance shall include effective performance, adequate funding, adequate staffing and training, including training in all procedures and other requirements of this Approval and the OWRA and regulations, process controls and alarms and the use of process chemicals and other substances used in the Works.
- 2. The Owner shall prepare the operations manual for the Works within six (6) months of completion of construction of the Proposed Works, that includes, but not necessarily limited to, the following information:
 - a. operating procedures for the Works under Normal Operating Conditions;
 - b. inspection programs, including frequency of inspection, for the Works and the methods or tests employed to detect when maintenance is necessary;
 - c. repair and maintenance programs, including the frequency of repair and maintenance for the Works;
 - d. procedures for the inspection and calibration of monitoring equipment;
 - e. operating procedures for the Works to handle situations outside Normal Operating Conditions and emergency situations such as a structural, mechanical or electrical failure, or an unforeseen flow condition;
 - f. a spill prevention and contingency plan, consisting of procedures and contingency plans, including notification to the District Manager, to reduce the risk of spills of pollutants and prevent, eliminate or ameliorate any adverse effects that result or may result from spills of pollutants;

- g. procedures for receiving, responding and recording public complaints, including recording any followup actions taken.
- 3. The Owner shall maintain an up to date operations manual, make the manual readily accessible for reference at the Works for the operational life of the Works and upon request make the manual available to Ministry staff.
- 4. The Owner shall maintain a logbook to record the results of all inspections, repair and maintenance undertaken, calibrations, monitoring and spill response or contingency measures undertaken and shall make the logbook available for inspection by Ministry staff. The logbook shall include the following:
 - a. the name of the operator making the entry; and
 - b. the date and results of each inspection, repair, maintenance, calibration, monitoring, spill response and contingency measure.
- 5. The Owner shall, upon the construction, prepare and make available for inspection by Ministry staff, a maintenance agreement with the manufacturer for the treatment process/technology. The maintenance agreement must be retained at the site and kept current for the operational life of the Works.
- 6. The Owner shall ensure that grass-cutting is maintained regularly over the subsurface disposal bed(s), and that adequate steps are taken to ensure that the area of the underground works is protected from vehicle traffic.
- 7. The Owner shall visually inspect the general area where sewage works are located for break-out once every month during the operating season.
- 8. In the event a break-out is observed from a subsurface disposal bed, the Owner shall do the following:
 - a. sewage discharge to that subsurface disposal system shall be discontinued;
 - b. the incident shall be immediately reported verbally to the Spills Action Centre (SAC) at (416) 325-3000 or 1-800-268-6060;
 - c. submit a written report to the District Manager within one (1) week of the break-out;
 - d. access to the break-out area shall be restricted until remedial actions are complete;
 - e. during the time remedial actions are taking place the sewage generated at the site shall not be allowed to discharge to the environment; and
 - f. sewage generated at the site shall be safely collected and disposed of through a licensed waste hauler to an approved sewage disposal site.
- 9. The Owner shall ensure that the septic tanks be inspected at least twice per year by a qualified person, and the sewage sludge accumulated in the septic tanks be periodically withdrawn at the frequency required to maintain efficiency of the treatment system. The effluent filters in septic tanks shall be cleaned out at least once every six (6) months, when the tank is pumped out, or as determined by the Operating Authority, whichever comes first.
- 10. The Owner shall employ for the overall operation of the Works a person who possesses the level of training and experience sufficient to allow safe and environmentally sound operation of the Works.
- 11. The owner shall collect samples from the two (2) on-site groundwater monitoring wells MW21-9 and MW21-10 at the frequency specified in Schedule 3, by means of the specified sample type, analyze for each parameter listed and record all results;
- 12. The Owner shall have a valid written agreement with a hauler who is in possession of a Waste Management Systems Approval, for the treatment and disposal of the sludge generated from the Works, at all times during operation of the Works.
- 13. The Owner shall ensure that the Annual Maximum Daily Influent Flow and flow of treated effluent discharged into the subsurface sewage system does not exceed 17,550 litres per day.
- 14. The Owner shall retain for a minimum of five (5) years from the date of their creation, all records and information related to or resulting from the operation and maintenance activities required by this Approval.

10. REPORTING

- 1. One (1) week prior to the start-up of the operation of the Works, the Owner shall notify the District Manager (in writing) of the pending start-up date.
- 2. The Owner shall, upon request, make all reports, manuals, plans, records, data, procedures and supporting documentation available to Ministry staff.
- 3. In addition to the obligations under Part X of the EPA and O. Reg. 675/98 (Classification and Exemption Of Spills and Reporting of Discharges), the Owner shall, within fifteen (15) days of the occurrence of any reportable spill as provided in Part X of the EPA and Ontario Regulation 675/98, submit a full written report of the occurrence to the District Manager describing the cause and discovery of the spill, clean-up and recovery measures taken, preventative measures to be taken and a schedule of implementation.
- 4. The Owner shall prepare performance reports on a calendar year basis and submit to the District Manager in an electronic format by March 31 of the calendar year following the period being reported upon. The reports shall contain, but shall not be limited to, the following information pertaining to the reporting period:
 - a. a summary and interpretation of all Influent monitoring data, and a review of the historical trend of the sanitary sewage characteristics and flow rates;
 - b. a summary and interpretation of all Final Effluent monitoring data, including concentration, flow rates, loading and a comparison to the design objectives in this Approval, including an overview of the success and adequacy of the Works;
 - c. a summary and interpretation of groundwater monitoring data as required by condition 6.2 including shallow groundwater flow direction, interpretation of analytical results and comparison with the trigger level of 2.9 mg/l for Nitrates concentration in accordance with the groundwater monitoring program including recommendations for augmenting monitoring to Tier 2 or implementing the Tier 3 contingency response;
 - d. a description of any operating problems encountered and corrective actions taken;
 - e. a summary of all maintenance carried out on any major structure, equipment, apparatus, mechanism or thing forming part of the Works, including an estimate of the quantity of any materials removed from the Works;
 - f. a summary of the calibration and maintenance carried out on all Influent and Final Effluent monitoring equipment to ensure that the accuracy is within the tolerance of that equipment as required in this Approval or recommended by the manufacturer;
 - g. a summary of efforts made to achieve the design objectives in this Approval, including an assessment of the issues and recommendations for pro-active actions when any of the design objectives is not achieved more than 50% of the time in a year or there is an increasing trend in deterioration of Final Effluent quality;
 - h. a tabulation of the volume of sludge generated, an outline of anticipated volumes to be generated in the next reporting period and a summary of the locations to where the sludge was disposed;
 - i. a summary of any complaints received during the reporting period and any steps taken to address the complaints;
 - j. any changes or updates to the schedule for the completion of construction and commissioning operation of major process(es) / equipment groups in the Proposed Works;
 - k. a summary of all spill or abnormal discharge events; and

I. any other information the District Manager requires from time to time.

11. SPILL CONTINGENCY PLAN

1. Within six (6) months from the issuance of this Approval, the Owner shall implement a spill contingency plan - that is a set of procedures describing how to mitigate the impacts of a spill within the area serviced by the Works.

The Owner shall, upon request, make this plan available to Ministry staff. This plan shall include as a minimum:

- a. the name, job title and location (address) of the Owner, person in charge, management or person(s) in control of the facility;
- b. the name, job title and 24-hour telephone number of the person(s) responsible for activating the spill contingency plan;
- c. a site plan drawn to scale showing the facility, nearby buildings, streets, catch-basins and manholes, drainage patterns (including direction(s) of flow in storm sewers), any receiving body(ies) of water that could potentially be significantly impacted by a spill and any features which need to be taken into account in terms of potential impacts on access and response (including physical obstructions and location of response and clean-up equipment);
- d. steps to be taken to report, contain, clean up and dispose of contaminants following a spill;
- e. a listing of telephone numbers for: local clean-up company(ies) who may be called upon to assist in responding to spills; local emergency responders including health institution(s); and Ministry Spills Action Centre 1-800-268-6060;
- f. Safety Data Sheets (SDS) for each hazardous material which may be transported or stored within the area serviced by the Works;
- g. the means (internal corporate procedures) by which the spill contingency plan is activated;
- h. a description of the spill response training provided to employees assigned to work in the area serviced by the Works, the date(s) on which the training was provided and by whom;
- i. an inventory of response and clean-up equipment available to implement the spill contingency plan, location and, date of maintenance/replacement if warranted; and
- j. the date on which the contingency plan was prepared and subsequently, amended.
- 2. The spill contingency plan shall be kept in a conspicuous, readily accessible location on-site.
- 3. The spill contingency plan shall be amended from time to time as required by changes in the operation of the facility.

REASONS

The reasons for the imposition of these terms and conditions are as follows:

- 1. Condition 1 is imposed to ensure that the Works are constructed and operated in the manner in which they were described and upon which approval was granted. This condition is also included to emphasize the precedence of conditions in the Approval and the practice that the Approval is based on the most current document, if several conflicting documents are submitted for review. Condition 1.4 is included to emphasize that the issuance of this Approval does not diminish any other statutory and regulatory obligations to which the Owner is subject in the construction, maintenance and operation of the Works. The Condition specifically highlights the need to obtain any necessary conservation authority approvals. The Condition also emphasizes the fact that this Approval doesn't limit the authority of the Ministry to require further information.
- 2. Condition 2 is included to ensure that, when the Works are constructed, the Works will meet the standards that apply at the time of construction to ensure the ongoing protection of the environment.
- 3. Condition 3 is included to ensure that the Ministry records are kept accurate and current with respect to the approved Works and to ensure that subsequent owners of the Works are made aware of the Approval and continue to operate the Works in compliance with it.
- 4. Condition 4 is included to ensure that the Works are constructed in accordance with the approval and that record drawings of the Works "as constructed" are maintained for future references.

- 5. Condition 5 is included as installation, regular inspection and maintenance of the temporary sediment and erosion control measures is required to mitigate the impact on the downstream receiving watercourse during construction until they are no longer required.
- 6. Condition 6 regarding design objectives is imposed to establish non-enforceable design objectives to be used as a mechanism to trigger corrective action proactively and voluntarily before environmental impairment occurs.
- 7. Condition 7 regarding monitoring and recording is included to enable the Owner to evaluate and demonstrate the performance of the Works, on a continual basis, so that the Works are properly operated and maintained at a level which is consistent with the design objectives and compliance limits.
- 8. Condition 8 is included as regular inspection and necessary removal of sediment and excessive decaying vegetation from the Works are required to mitigate the impact of sediment, debris and/or decaying vegetation on the treatment capacity of the Works. The Condition also ensures that adequate storage is maintained in the Works at all times as required by the design. Furthermore, this Condition is included to ensure that the Works are operated and maintained to function as designed.
- 9. Condition 9 regarding operation and maintenance is included to require that the Works be properly operated, maintained, funded, staffed and equipped such that the environment is protected and deterioration, loss, injury or damage to any person or property is prevented. As well, the inclusion of a comprehensive operations manual governing all significant areas of operation, maintenance and repair is prepared, implemented and kept up-to-date by the Owner. Such a manual is an integral part of the operation of the Works. Its compilation and use should assist the Owner in staff training, in proper plant operation and in identifying and planning for contingencies during possible abnormal conditions. The manual will also act as a benchmark for Ministry staff when reviewing the Owner's operation of the Works.
- 10. Condition 10 is included to provide a performance record for future references, to ensure that the Ministry is made aware of problems as they arise, and to provide a compliance record for all the terms and conditions outlined in this Approval, so that the Ministry can work with the Owner in resolving any problems in a timely manner.
- 11. Condition 11 is included to ensure that the Owner will implement the Spill Contingency Plan, such that the environment is protected and deterioration, loss, injury or damage to any person(s) or property is prevented.

APPEAL PROVISIONS

In accordance with Section 139 of the *Environmental Protection Act*, you may by written notice served upon me and the Ontario Land Tribunal, within 15 days after the service of this notice, require a hearing by the Tribunal. You must also provide notice to, the Minister of the Environment, Conservation and Parks in accordance with Section 47 of the *Environmental Bill of Rights, 1993* who will place notice of your appeal on the Environmental Registry. Section 142 of the *Environmental Protection Act* provides that the notice requiring the hearing ("the Notice") shall state:

- I. The portions of the environmental compliance approval or each term or condition in the environmental compliance approval in respect of which the hearing is required, and;
- II. The grounds on which you intend to rely at the hearing in relation to each portion appealed.

The Notice should also include:

- I. The name of the appellant;
- II. The address of the appellant;
- III. The environmental compliance approval number;
- IV. The date of the environmental compliance approval;
- V. The name of the Director, and;
- VI. The municipality or municipalities within which the project is to be engaged in.

And the Notice should be signed and dated by the appellant.

This Notice must be served upon:

* Further information on the Ontario Land Tribunal's requirements for an appeal can be obtained directly from the Tribunal at: Tel: (416) 212-6349 or 1 (866) 448-2248, or <u>www.olt.gov.on.ca</u>

This instrument is subject to Section 38 of the *Environmental Bill of Rights, 1993*, that allows residents of Ontario to seek leave to appeal the decision on this instrument. Residents of Ontario may seek leave to appeal within 15 days from the date this decision is placed on the Environmental Registry. By accessing the Environmental Registry at <u>ero.ontario.ca</u>, you can determine when the leave to appeal period ends.

The above noted activity is approved under s.20.3 of Part II.1 of the Environmental Protection Act.

Dated at Toronto this 10th day of August, 2022

Fariha Parnu

Fariha Pannu

Director

appointed for the purposes of Part II.1 of the Environmental Protection Act

c: Louis Bouchard, SOCIÉTÉ EN COMMANDITE HIGHWAY 417 CASSELMAN / HIGHWAY 417 CASSELMAN LIMITED PARTNERSHIP James Peets, MECP District Office

The following schedules are a part of this environmental compliance approval:

SCHEDULE 1

- 1. Application for Environmental Compliance Approval for Industrial Sewage Works submitted and certified by Louis Bouchard (EXP) on behalf of Société En Commandite Highway 417 Casselman / Highway 417 Casselman Limited Partnership, dated and received on November 18, 2021, and all supporting documentation and information.
- 2. Site Servicing and Stormwater Management Report "Ford New Distribution Facility" dated May 12, 2022 including calculations and engineering drawings, prepared by Les services exp inc.
- 3. Addendum to Environmental Compliance Approval Application for Subsurface Sewage Disposal Works submitted by Louis Bouchard (EXP) and signed by Claudio Bertone, Vice President of 4301072 Canada Inc.
- 4. Sewage System Design Report, dated July 2022, including calculations and engineering drawings, prepared by Gunnell Engineering Ltd.

Final Effluent Design Objectives

Concentration Objectives upon completion of construction of all Proposed Works

Final Effluent Parameter	Averaging Calculator	Objective (milligrams per litre unless otherwise indicated)
CBOD5	Single Sample Result	10 mg/L
Total Suspended Solids	Single Sample Result	10 mg/L
Nitrate ^{*1}	Single Sample Result	3.2 mg/L
рН	Single Sample Result	6.5 - 8.5 inclusive

*1 Nitrate objectives shall only apply upon completion of the Tier 3 Nitrate Treatment System (tank 4).

Groundwater Monitoring Trigger Values

	inal Effluent Parameter Averaging Calculator	Trigger
Final Effluent Parameter		(milligrams per litre unless otherwise indicated)
Nitrate	Single Sample Result	2.9 mg/L

Monitoring Program

Influent - Influent sampling point

Parameters	Sample Type	Minimum Frequency
BOD5	Grab	Quarterly
Total Suspended Solids	Grab	Quarterly
Total Phosphorus	Grab	Quarterly
Total Kjeldahl Nitrogen	Grab	Quarterly

Final Effluent - Final Effluent sampling point

Parameters	Sample Type	Minimum Frequency
CBOD5	Grab	Monthly
Total Suspended Solids	Grab	Monthly
Total Phosphorus	Grab	Monthly
Nitrate as Nitrogen	Grab	Monthly

Groundwater - Groundwater monitoring wells

Sample Points: MW21-9, MW21-10

Parameters	Sample Type	Minimum Frequency
Total Kjeldahl Nitrogen	Grab	Quarterly
Nitrate	Grab	Quarterly
Nitrite	Grab	Quarterly
Ammonia as Nitrogen	Grab	Quarterly
Total Phosphorus	Grab	Quarterly