

AMENDED ENVIRONMENTAL COMPLIANCE APPROVAL

NUMBER 1352-6N6LRW
Issue Date: June 24, 2024

De Beers Canada Inc.
1601 Airport Rd NE, No. 300
Calgary, Alberta
T2E 6Z8

Site Location: Victor Diamond Project Site
Unsurveyed Territory (Timmins District Office) Unorganized Area
District of Kenora, P0L 1A0

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:

1. The establishment and use of two landfill cells consisting of:
Cell 1: a 0.98 hectare landfill site within a total area of 2.9 hectares to be used for the landfilling of solid non-hazardous wastes from the Victor Mine Project, which was approved in the original August 29, 2006 ECA and for use primarily during mine operations; and
Cell 2: a 1.44 hectare landfill site with a total capacity of 97,500 cubic metres to be used for the landfilling of demolition waste and minor amounts of organic wastes from the Victor Mine Project during mine closure, which was approved in the July 25, 2019 Notice 1 of the ECA.
2. The extension and alteration of existing industrial Works for the collection, transmission, and discharge of leachate from the existing landfill sites (Cell #1 & Cell #2) and surface water drainage from a total catchment area of approximately 157 ha (as described below) at Victor Diamond Mine at the above site location, consisting of the following:

PROPOSED WORKS

- extension/alteration of the existing leachate collection ditch along the south side of the North Waste Rock Stockpile (NWRS) and extension/alternation of the existing north to south drainage trench along the east side of the NWRS (on the west side of the road to Attawapiskat River), with a minimum trench base width of 1 metre, varied depths, and side slope of 5:1 at road cuts and minimum 3:1 elsewhere, complete with 150 millimetre rip rap at the bottom of the trench where required,

- collecting leachate from landfill Cells #1 and #2;
- collecting surface water drainage from the south and east sides of the NWRS;
- collecting surface water drainage from a portion of the plant site, undeveloped lands to the east of the plant site, and a portion of the Northeast Fen; and
- discharging to the northwest corner of the pit lake;
- removal of all existing water drainage culverts from the site;

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

EXISTING WORKS

- an existing approximately 650 metre long, west to east leachate collection ditch servicing both landfill Cells #1 and #2 (to be extended/altered under Proposed Works above), located south of the NWRS, receiving landfill leachate and surface drainage from the two landfill cells and discharging to the a north to south drainage trench as described below ;
- an existing approximately 550 metre long, north to south drainage trench (to be extended/altered under Proposed Works above), located east of the NWRS on the west side of the road to Attawapiskat River, to convey landfill leachate and surface water drainage to the Northeast Fen (to be discontinued and altered per Proposed Works above);
- including erosion/sedimentation control measures such as rock check dams, and all other controls and appurtenances essential for the proper operation of the aforementioned Works;

all in accordance with the documents listed in **Schedule A**.

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

1. "Annual Average Effluent Concentration" is the mean of all Single Sample Results of the concentration of a contaminant in the Final Effluent sampled or measured during a calendar year;
2. "Cell 1" means the 0.98 hectare landfill site within a total area of 2.9 hectares to be used for the landfilling of solid non-hazardous wastes from the Victor Mine Project, which was approved in the original ECA 1352-6N6LRW dated August 29, 2006;
3. "Cell 2" means the 1.44 hectare landfill site with a total capacity of 97,500 cubic metres to be used for the landfilling of demolition waste and minor amounts of organic wastes from the Victor Mine Project, which was approved in Notice 1 of ECA 1352-6N6LRW dated July 25, 2019;
4. "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;

5. "District Manager" means the District Manager of the appropriate local District Office of the Ministry, where the Works are geographically located;
6. "ECA" means this Environmental Compliance Approval, as amended from time to time, and any Schedules attached to it, formerly known as Provisional Certificate of Approval;
7. "EPA" means the *Environmental Protection Act*, R.S.O. 1990, c.E.19, as amended;
8. "Existing Works" means those portions of the Works included in the ECA that have been constructed previously;
9. "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;
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. "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;
12. "Limited Operational Flexibility" (LOF) means any modifications that the Owner is permitted to make to the Works under this ECA;
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. "Owner" means De Beers Canada Inc. and its successors and assignees;
15. "OWRA" means the *Ontario Water Resources Act*, R.S.O. 1990, c. O.40, as amended;
16. "Proposed Works" means those portions of the Works included in the ECA that are under construction or to be constructed;
17. "Reg. 347" means Ontario Regulation 347 - R.R.O. 1990, General - Waste Management, as amended, made under the EPA;
18. "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;
19. "Site" means the entire waste disposal site including the landfilling area, buffer lands and attenuation zones approved by this ECA; and
20. "Works" means the approved sewage works, and includes Proposed Works, Existing Works and

modifications made under Limited Operational Flexibility.

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

TERMS AND CONDITIONS

1. GENERAL

- 1.1 Except as otherwise provided by these conditions, the Site and Works shall be designed, developed, used, maintained and operated, and all facilities, equipment, fixtures and Works shall be built and installed, in accordance with the Applications and supporting documentation, and plans and specifications listed in Schedule "A".
- 1.2 The requirements specified in this ECA are the requirements under the **Environmental Protection Act**, R.S.O. 1990. The issuance of this ECA in no way abrogates the Applicant's legal obligations to take all reasonable steps to avoid violating other applicable provisions of this legislation and other legislation and regulations.
- 1.3 The requirements of this ECA are severable. If any requirement of this ECA, or the application of any requirement of this ECA to any circumstance, is held invalid, the application of such requirement to other circumstances and the remainder of this ECA shall not be affected in any way.
- 1.4 The Applicant shall ensure compliance with all the terms and conditions of this ECA. Any non-compliance constitutes a violation of the **Environmental Protection Act**, R.S.O. 1990 and is grounds for enforcement.
- 1.5
 - a. The Applicant shall, forthwith upon request of the Director, District Manager, or Provincial Officer (as defined in the Act), furnish any information requested by such persons with respect to compliance with this ECA, including but not limited to, any records required to be kept under this ECA; and
 - b. In the event the Applicant provides the Ministry with information, records, documentation or notification in accordance with this ECA (for the purposes of this condition referred to as "Information"),
 - (i) the receipt of Information by the Ministry;
 - (ii) the acceptance by the Ministry of the Information's completeness or accuracy; or
 - (iii) the failure of the Ministry to prosecute the Applicant, or to require the Applicant to take any action, under this ECA or any statute or regulation in relation to the Information;

shall not be construed as an approval, excuse or justification by the Ministry of any act or omission of the Applicant relating to the Information, amounting to non-compliance with this

ECA or any statute or regulation.

1.6 The Applicant shall allow Ministry personnel, or a Ministry authorized representative(s), upon presentation of credentials, to:

- a. carry out any and all inspections authorized by Section 156, 157 or 158 of the **Environmental Protection Act**, R.S.O. 1990, Section 15, 16 or 17 of the **Ontario Water Resources Act**, R.S.O. 1990, or Section 19 or 20 of the **Pesticides Act**, R.S.O. 1990, as amended from time to time, of any place to which this ECA relates; and,

without restricting the generality of the foregoing, to:

- b.
 - (i) enter upon the premises where the records required by the conditions of this ECA are kept;
 - (ii) have access to and copy, at reasonable times, any records required by the conditions of this ECA;
 - (iii) inspect at reasonable times any facilities, equipment (including monitoring and control equipment), practices, or operations required by the conditions of this ECA; and
 - (iv) sample and monitor at reasonable times for the purposes of assuring compliance with the conditions of this ECA.

1.7 a. Where there is a conflict between a provision of any document referred to in Schedule "A", and the conditions of this ECA, the conditions in this ECA shall take precedence; and

b. Where there is a conflict between documents listed in Schedule "A", the document bearing the most recent date shall prevail.

1.8 The Applicant shall ensure that all communications/correspondence made pursuant to this ECA includes reference to the ECA number.

1.9 The Applicant shall notify the Director in writing of any of the following changes within thirty (30) days of the change occurring:

- a. change of Applicant or operator of the Site or both;
- b. change of address or address of the new Applicant;
- c. change of partners where the Applicant or operator is or at any time becomes a partnership, and a copy of the most recent declaration filed under the **Business Names Act**, 1991 shall be included in the notification to the Director;
- d. any change of name of the corporation where the Applicant or operator is or at any time becomes a corporation, and a copy of the most current "Initial Notice or Notice of Change" (form 1 or 2 of O.

Reg. 182, Chapter C-39, R.R.O. 1990 as amended from time to time), filed under the **Corporations Information Act** shall be included in the notification to the Director; and

- e. change in directors or officers of the corporation where the Applicant or operator is or at any time becomes a corporation, and a copy of the most current "Initial Notice or Notice of Change" as referred to in 10(d), supra.
- 1.10 In the event of any change in ownership of the Site and/or Works, the Applicant shall notify, in writing, the succeeding owner of the existence of this ECA, and a copy of such notice shall be forwarded to the Director.
- 1.11 Any information relating to this ECA and contained in Ministry files may be made available to the public in accordance with the provisions of the **Freedom of Information and Protection of Privacy Act**, R.S.O. 1990, C. F-31.
- 1.12 All records and monitoring data required by the conditions of this ECA must be kept on the Owner's premises for a minimum period of two (2) years from the date of their creation.
- 1.13 The Owner shall ensure that any person authorized to carry out work on or operate any aspect of the Site and/or Works is notified of this ECA and the terms and conditions herein and shall take all reasonable measures to ensure any such person complies with the same.

2. LANDFILL - SITE DEVELOPMENT AND OPERATIONS

- 2.1 The portion of the Site associated with Cell 1, as well as Cell 1, shall be developed and operated as generally described in Section 5.0 of the report titled, "Application for Certificates of Approval, Waste Management, Design and Operation, Victor Diamond Project, Attawapiskat, Ontario", prepared by AMEC Earth & Environmental, dated July 2005, which is listed as Item 2 of Schedule "A".

The portion of the Site associated with Cell 2, as well as Cell 2, shall be developed and operated as generally described in Section 5.0 of the report titled, "Amendment to Environmental Compliance Approval #6084-6T6Q4P and #1352-6N6LRW, Addition of Cell #2: A Demolition Landfill, Victor Diamond Mine", prepared by De Beers Canada, dated January 2019, which is listed as Item 5 of Schedule "A".

- a. Cell 1 is approved for the landfilling of solid non-hazardous wastes and Cell 2 is approved for the landfilling of demolition waste and minor amounts of organic wastes from the Victor Diamond Mine as outlined in Items 2 and 5 of Schedule "A".
- b. An ash characterization study shall be completed to assess the suitability of the on-site incinerator ash prior to on-site disposal and to better characterize leachate quality. The TCLP test shall be utilized to assess the suitability of the ash for on-site disposal. If the ash is not confirmed to be non-hazardous, handling and disposal off-site shall be as generally outlined in Section 4.0 of the Cell 1 report listed as Item 2 of Schedule "A".

- c. Where shipping off-site is cost prohibitive or the schedule does not allow shipment due to the limited accessibility afforded the site by the winter road; mining and support equipment may be deposited within Cell 2 as long as the mining and/or support equipment are cleaned of oil and grease and other hazardous materials (e.g., refrigerants, batteries).
 - d. Final cover materials used on the landfilling areas shall be from the open pit or similar native materials from on-site as long as they meet the performance characteristics required for this purpose.
- 2.2 The waste within Cell 1 may be excavated, shredded and redeposited into Cell 1 as described in Item 7 of Schedule "A".
- a. During this process the Owner shall ensure that the integrity of the Cell's engineered base is maintained and that all the recommendations are followed with in the ARKTIS Solutions Inc memorandum, described in Item 8 of Schedule "A".
 - b. Any damage to the Cell's base must be repaired prior to the redeposition of any waste in the cell in that location and must be inspected by landfill experts to ensure that the Cell is able to operate as originally designed.
 - c. The Owner shall document the amount of waste excavated, shredded, removed from the landfill for recycling and the amount redeposited.

3. WORKS

EXPIRY OF ECA

- 3.1 This ECA will cease to apply to those parts of the Works which have not been constructed within **five (5) years** of the date of this ECA.
- 3.2 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 ECA. 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 ECA of the Works are still applicable at the time of request for extension, to ensure the ongoing protection of the environment.

CONSTRUCTION OF PROPOSED WORKS

- 3.3 Upon the construction of the Works, the Owner shall prepare a statement, certified by a Licensed Engineering Practitioner, that the Works are constructed in accordance with this ECA, and upon request, shall make the written statement available for inspection by Ministry personnel.
- 3.4 Within **six (6) months** of the construction of the Proposed Works, a set of as-built drawings showing the Works "as constructed" shall be prepared. These drawings shall be kept up to date through revisions

undertaken from time to time and a copy shall be retained at the Works for the operational life of the Works.

TEMPORARY EROSION AND SEDIMENT CONTROL

- 3.5 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.
- 3.6 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.

CHANGES IN PROCESSES OR PROCESS MATERIALS

- 3.7 The Owner shall give written notice to the District Manager of any plans to change the processes or process materials in the Owner's enterprise serviced by the Works where the change may significantly alter the quantity or quality of the influent to or effluent from the Works, and no such change(s) shall be made unless with the written concurrence or approval of the District Manager.

OPERATION AND MAINTENANCE

- 3.8 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.
- 3.9 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(s) to and outlet(s) from the Works to ensure that these are not obstructed.
- 3.10 The Owner shall ensure the immediate clean-out of the Works after a fuel or oil spill capture.
- 3.11 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.

- 3.12 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 spill, 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.
- 3.13 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.
- 3.14 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.
- 3.15 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 ECA.

EFFLUENT LIMITS

- 3.16 The Owner shall design, construct and operate the Works such that the concentrations of the materials listed as effluent parameters in Table 1 - Effluent Limits in **Schedule B** are not exceeded in the effluent at the LFD-Final station from the Works.
- 3.17 For the purposes of determining compliance with and enforcing Condition 3.16, exceedance of the Annual Average Effluent Concentration is deemed to have occurred when the arithmetic mean concentration of all samples taken in a calendar year analysed for a parameter named in Column 1 of Table 1 - Effluent Limits listed in **Schedule B** exceeds the corresponding maximum concentration set

out in Column 2 of of Table 1.

EFFLUENT - VISUAL OBSERVATIONS

- 3.18 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.
- 3.19 In the event of an occurrence, as per Condition 4.1, the Owner shall inform the District Manager as soon as reasonably possible, and again in writing within seven (7) days of the occurrence. The Owner shall implement appropriate mitigation measures and a sampling program to confirm mitigation measures are adequate.

4. MONITORING

- 4.1 The Owner shall, upon commencement of operation of the Works, carry out a monitoring program, and all samples and measurements taken for the purposes of this ECA are to be taken at a time and in a location characteristic of the quality and quantity of the effluent stream over the time period being monitored.
- 4.2 Samples shall be collected and analyzed at the sampling points listed in Table 2 - Surface Water and Groundwater Sampling Locations in **Schedule C**, at the sampling frequencies and using the sample type specified for each parameter listed in Table 3 - Surface Water and Groundwater Sampling Frequencies in **Schedule C**.
- 4.3 The methods and protocols for sampling, analysis, toxicity testing, and recording shall conform, in order of precedence, to the methods and protocols specified in the following:
- a. the Ministry's publication "Protocol for the Sampling and Analysis of Industrial/Municipal Wastewater Version 2.0" (January 2016), PIBS 2724e02, as amended;
 - b. the publication "Standard Methods for the Examination of Water and Wastewater" (21st edition) as amended from time to time by more recently published editions;
 - c. for any parameters not mentioned in the documents referenced in Conditions 4.3 a. and b., the written approval of the District Manager shall be obtained prior to sampling.
- 4.4 The measurement requirements (e.g., sampling points, parameters, and frequencies) specified in the tables in **Schedule C** in respect of any parameter are minimum requirements which may be modified by the Director in writing from time to time in consultation with the District Manager.
- 4.5 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 ECA.
- 4.6 Any changes to the monitoring programs shall be approved by the Director. Prior to requesting these

changes from the Director, the Owner shall consult and obtain approval from the District Manager.

5. REPORTING

- 5.1 **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.
- 5.2 The Owner shall report to the District Manager orally **as soon as possible** any non-compliance with the compliance limits, and in writing **within fourteen (14) days** of non-compliance.
- 5.3 The Owner shall, upon request, make all reports, manuals, plans, records, data, procedures and supporting documentation available to Ministry staff.
- 5.4 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) made under the EPA, the Owner shall, within **fifteen (15) days** of the occurrence of any reportable spill as provided in Part X of the EPA and O. Reg. 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.

PERFORMANCE REPORT

- 5.5 The Owner shall prepare performance reports on a calendar year basis and submit to the District Manager by **March 31** of the calendar year following the period being reported upon. The first such report shall cover the first annual period following the commencement of operation of the Works and subsequent reports shall be submitted to cover successive annual periods following thereafter. 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 monitoring data and a comparison to the effluent limits outlined in Condition 3.16, including an overview of the success and adequacy of the Works;
 - b. a report outlining the plant operation improvements, potential enhancements, measures identified, and that best efforts to attain and maintain the effluent objectives noted in Condition 4;
 - c. a description of any operating problems encountered and corrective actions taken;
 - d. a summary of all maintenance carried out on and 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;
 - e. a summary of the calibration and maintenance carried out on all effluent monitoring equipment;
 - f. a summary of any effluent quality assurance or control measures undertaken in the reporting period;

- g. a summary of any complaints received during the reporting period and any steps taken to address the complaints;
- h. a summary of all spill or abnormal discharge events;
- i. a summary of all Notice of Modifications to Sewage Works completed in accordance with Condition 6.8, including a report on status of implementation of all modification;
- j. a report summarizing all modifications completed in accordance with section 3 of **Schedule D**; and
- k. any other information the District Manager requires from time to time.

ANNUAL REPORT

- 5.6 The Owner shall submit an annual groundwater monitoring and landfill report prepared by a licensed independent Professional Geoscientist or Licensed Engineering Practitioner qualified in the field of hydrogeology, in both digital and hardcopy formats, to the District Manager on **March 31** of each calendar year. The annual groundwater monitoring report shall include interpretation of the monitoring results including the following minimum information:
- a. a site plan or plans of the entire site illustrating significant site features such as lakes, rivers, seeps, ponds, ditches, collection and treatment facilities, and roadways, as well as all of the sampling locations;
 - b. a cross section of the subsurface soils, stratigraphy, displaying the groundwater elevations;
 - c. tables summarizing all historical and current water level data and analytical results for all parameters for each groundwater monitoring well, and compare the analytical results to the appropriate standards (i.e., Guideline B-7, PWQOs);
 - d. temporal graphs of the leachate indicator parameters for each groundwater monitoring well;
 - e. a copy of the borehole logs for all groundwater monitoring wells (may be provided electronically on CD);
 - f. a summary of the landfill development and operations over the reporting period; and
 - g. a summary of the records as required under Condition 2.2 c.

6. LIMITED OPERATIONAL FLEXIBILITY

- 6.1 The Owner may make modifications to the Works in accordance with the terms and conditions of this ECA and subject to the Ministry's "Limited Operational Flexibility Criteria for Modifications to Works", included under **Schedule D** of this ECA, as amended.

- 6.2 Works under Limited Operational Flexibility shall adhere to the design guidelines contained within the Ministry's publication "Design Guidelines for Sewage Works 2008", as amended.
- 6.3 The Owner shall ensure at all times, that the Works, related equipment and appurtenances which are installed or used to achieve compliance are operated in accordance with all terms and conditions of this ECA.
- 6.4 For greater certainty, the following are **not** permitted as part of Limited Operational Flexibility:
- a. Modifications to the Works that result in an increase of the approved capacity of the Works;
 - b. Modifications to the Works that may adversely affect the approved effluent quality criteria or the location of the discharge/outfall;
 - c. Modifications to the treatment process technology of the Works, or modifications that involve construction of new reactors (tanks) or alter the treatment train process design;
 - d. Modifications to the Works approved under s.9 of the EPA, and
 - e. Modifications to the Works pursuant to an order issued by the Ministry.
- 6.5 Implementation of Limited Operational Flexibility is not intended to be used for piecemeal measures that result in major alterations or expansions.
- 6.6 If the implementation of Limited Operational Flexibility requires changes to be made to the Emergency Response, Spill Reporting and Contingency Plan, the Owner shall, provide a revised copy of this plan to the local fire services authority prior to implementing Limited Operational Flexibility.
- 6.7 For greater certainty, any modification made under the Limited Operational Flexibility may only be carried out after other legal obligations have been complied with, including those arising from the Environmental Protection Act, Niagara Escarpment Planning and Development Act, Oak Ridges Moraine Conservation Act, Lake Simcoe Protection Act and Greenbelt Act.
- 6.8 At least **thirty (30) days** prior to implementing Limited Operational Flexibility, the Owner shall complete a Notice of Modifications describing any proposed modifications to the Works and submit it to the District Manager.
- 6.9 The Owner shall not proceed with implementation of Limited Operational Flexibility until the District Manager has provided written acceptance of the Notice of Modifications or a minimum of **thirty (30) days** have passed since the day the District Manager acknowledged the receipt of the Notice of Modifications.

7. CLOSURE PLAN

- 7.1 The Site shall be closed in accordance with the Closure Plans as outlined in Items 4 and 5 of Schedule

"A".

8. FINANCIAL ASSURANCE

- 8.1 The Ministry of Northern Development and Mines holds Financial Assurance for the Victor Project which provides sufficient funds for the long-term monitoring and maintenance of the Site after closure and also to address any environmental off-site impacts that may occur as a result of improper operations or abandonment.

The Director shall be notified of any request to amend the Financial Assurance held for the Victor Project by Northern Development and Mines. At such time, the Director may amend this ECA to request Financial Assurance as defined in Section 131 of the EPA.

Schedule "A"

1. Application for a Provisional Certificate of Approvals for a Waste Disposal Site, dated September 28, 2005 and all its supporting documents.
2. Report titled, "Application for Certificates of Approval, Waste Management, Design and Operation, Victor Diamond Project, Attawapiskat, Ontario", prepared by AMEC Earth & Environmental, dated July 2005.
3. Letter dated September 29, 2005 to the Ministry of the Environment from AMEC with an attached letter dated September 25, 2005 to Chief Mike Carpenter, Attawapiskat First Nation (AttFN), that enclosed responses to the AttFN comments. These responses are considered an addendum to and part of the above mentioned report.
4. Report titled, "Victor Diamond Project, Closure Plan", prepared by AMEC Earth & Environmental, dated November 2004.
5. Amendment to Environmental Compliance Approval #6084-6T6Q4P and #1352-6N6LRW, Addition of Cell #2: A Demolition Landfill, Victor Diamond Mine, prepared by De Beers Canada, dated January 2019.
6. Environmental Compliance Approval Application - Request for an Amendment to ECA #1352-6N6LRW, Victor Diamond Mine. prepared by De Beers Canada Inc, dated October 8, 2020.
7. Request for an Amendment to ECA #1352-6N6LRW for Shredding and Redeposition of Landfill Wastes, Victor Diamond Mine. prepared by De Beers Canada Inc, dated October 8, 2020.
8. Memorandum to De Beers Canada Inc from Jamie Van Gulck, ARKTIS Solutions Inc. Subject: Victor Diamond Mine, Landfill Cell #1 – Waste Reprocessing. September 21, 2021.
9. Application for Environmental Compliance Approval for Industrial Sewage Works, dated and received on February 28, 2023, submitted by De Beers Canada Inc., including all supporting documentation.
10. Report titled, "Amendment Application for Environmental Compliance Approval #1352-6N6LRW and #5743-BGRHQ3, De Beers Canada Inc. Victor Diamond Mine", prepared by De Beers Canada Inc., dated February 28, 2023.
11. Figure 2 - General Landfill Site Plan, dated January 2023 of Amendment Application for Environmental Compliance Approval #1352-6N6LRW and #5743-BGRHQ3, dated February 2023 and prepared by De Beers Canada Inc., forming part of the supporting documentation in Item 9.
12. Memorandum re. North Waste Rock Stockpile Drainage Trench Design – Response to Reviewer Comments, dated July 28, 2023 and prepared by Arktis Solutions Inc.

Schedule B

Table 1 - Effluent Limits

(Compliance Point: immediately upstream of effluent discharge to the pit lake at Station LFD-Final, as illustrated in Item 11 of **Schedule A)**

Effluent Parameter	Annual Average Effluent Concentration (milligrams per litre unless otherwise indicated)
Column 1	Column 2
Arsenic	0.005
Cadmium	0.0002
Copper	0.005
Lead	0.005
Mercury	0.000026
Nickel	0.025
Zinc	0.02
pH of the effluent maintained between 6.0 to 9.5, inclusive at all times	

Schedule C

Table 2 - Surface Water and Groundwater Sampling Locations

Sampling Points	Locations
Surface Water Locations	
SW-LFD-UP*	Leachate Collection Ditch (new station in extended portion of ditch)
SW-LFD1	Leachate Collection Ditch (upstream section)
SW-LFD2	Leachate Collection Ditch (middle section)
SW-LFD3/LF-3	Leachate Collection Ditch (downstream section)
LF-Final*	Leachate Collection Ditch (new compliance point)
NEF-F	Northeast Fen (previous compliance point)
NGC/DS/NWF	North Granny Creek (upstream)
NGC/DS/NEF	North Granny Creek (downstream)
Pit Lake	Pit Lake - samples at depths: <ul style="list-style-type: none"> ● Near surface ● 5 metres from surface ● either 2 metre below the thermocline when the lake is stratified (confirmed via temp/DO profile work), or at a depth of >25 metres from surface
Groundwater Locations	
LF-4A	Cell 1
LF-5	Cell 1
LF-6	Cell 1
LF-7	Cell 1
V-03-300E	Cell 2
GW-LFD1	Cell 2
GW-LFD2	Cell 2
GW-LFD3	Cell 2
GW-LFD4	Cell 2

* See Item 11 of **Schedule A** for the specific location.

Table 3 - Surface Water and Groundwater Sampling Frequencies
(Sample Type: Grab Sample)

Parameter	Groundwater Wells (LF-4A, LF-5, LF-6, LF-7, V-03-300E, GW-LFD1, GW-LFD2, GW-LFD3 & GW-LFD4)	Leachate Collection Ditch (SW-LFD-UP, SW-LFD1, SW-LFD2, SW-LFD3/LF-3 & LF-Final)	Northeast Fen (NEF-F)	North Granny Creek (NGC/DS/NW F & NGC/DS/NEF)	Pit Lake (Near surface, 5 metres from surface, 2 metre below the thermocline or at a depth of >25 metres from surface)
ICP Metals ¹	Monthly ⁶ , then 3X Annually ⁵	Monthly ⁶ , then 3X Annually ⁷	Quarterly ⁸	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Hardness	Monthly ⁶ , then 3X Annually ⁵	Monthly ⁶ , then 3X Annually ⁷	Quarterly ⁸	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Sulphate	Monthly ⁶ , then 3X Annually ⁵	Monthly ⁶ , then 3X Annually ⁷	Quarterly ⁸	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
DOC	Monthly ⁶ , then 3X Annually ⁵	Monthly ⁶ , then 3X Annually ⁷	Quarterly ⁸	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
pH	Monthly ⁶ , then 3X Annually ⁵	Monthly ⁶ , then 3X Annually ⁷	Quarterly ⁸	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Temperature	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Suspended solids (total)	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Dissolved solids (total)	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Ammonia (total and un-ionized)	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Phosphorus (total)	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Chloride	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
Oil and grease	-	-	-	Quarterly ⁸	3X Annually ¹⁰ , then Annually ¹¹
BTEXs ²	3X Annually ⁹	Monthly ⁶ , then 3X Annually ⁷	-	-	-
PAHs ³	3X Annually ⁹	Monthly ⁶ , then 3X Annually ⁷	-	-	-
Temperature/ Dissolved oxygen profile (end-of-summer)	-	-	-	-	3X Annually ¹⁰ , then Annually ¹¹

¹ ICP Metals list: As, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Hg, Mo, Ni, Ag, Na, Sr, Ti, V, and Zn.

² BTEXs list: benzene, ethylbenzene, toluene, m-xylene, o-xylene, p-xylene.

³ PAHs list: acenaphthene, anthracene, benz[a]anthracene, benzo[k]fluoranthene, benzo[g,h,i]perylene, benzo[a]pyrene, 1-chloronaphthalene, 2-chloronaphthalene, chrysene, dibenz[a,h]anthracene, fluoranthene, fluorene, naphthalene,

1-methylnaphthalene, 2-methylnaphthalene, perylene, phenanthrene, polychlorinated naphthalenes, and pyrene.

⁵ Upon closure of the landfill (post-closure period), during spring, summer and fall. "3X" means three (3) times.

⁶ Upon rerouting of the landfill leachate collection ditch, during the open-water season.

⁷ Upon closure of the landfill (post-closure period), during the open-water season. "3X" means three (3) times.

⁸ For one (1) year following rerouting of the landfill leachate collection ditch, during the open-water season.

⁹ Upon rerouting of the landfill leachate collection ditch, during spring, summer and fall. "3X" means three (3) times.

¹⁰ Upon rerouting of the landfill leachate collection ditch, during the open-water season. "3X" means three (3) times.

¹¹ Upon closure of the landfill (post-closure period), during the open-water season.

Schedule D

Limited Operational Flexibility Criteria for Modifications to Works

1. The modifications to Works approved under an Environmental Compliance Approval (ECA) that are permitted under the Limited Operational Flexibility (LOF), are outlined below and are subject to the LOF conditions in the ECA, and require the submission of the Notice of Modifications. If there is a conflict between the Works listed below and the Terms and Conditions in the ECA, the Terms and Conditions in the ECA shall take precedence.
 - a. Sewage Pumping Stations
 - i. Alter pumping capacity by adding or replacing equipment where new equipment is located within an existing sewage treatment plant site or an existing sewage pumping station site, provided that the modifications do not result in an increase of the sewage treatment plant Rated Capacity and the existing flow process and/or treatment train are maintained, as applicable.
 - ii. Forcemain relining and replacement with similar pipe size where the nominal diameter is not greater than 1,200mm.
 - b. Sewage Treatment Process
 - i. Installing additional chemical dosage equipment including replacing with alternative chemicals for pH adjustment or coagulants (non-toxic polymers) provided that there are no modifications of treatment processes or other modifications that may alter the intent of operations and may have negative impacts on the effluent quantity and quality.
 - ii. Expanding the buffer zone between a sanitary sewage lagoon facility or land treatment area and adjacent uses provided that the buffer zone is entirely on the proponent's land.
 - iii. Optimizing existing sanitary sewage lagoons with the purpose to increase efficiency of treatment operations provided that existing sewage treatment plant rated capacity is not exceeded and where no land acquisition is required.
 - iv. Optimizing existing sewage treatment plant equipment with the purpose to increase the efficiency of the existing treatment operations, provided that there are no modifications to the Works that result in an increase of the approved Rated Capacity, and may have adverse effects to the effluent quality or location of the discharge.
 - v. Replacement, refurbishment of previously approved equipment in whole or in part with Equivalent Equipment, like-for-like of different make and model, provided that the firm capacity, reliability, performance standard, level of quality and redundancy of the group of equipment is kept the same. For clarity purposes, the following equipment can be considered under this provision: pumps, screens, grit separators, blowers, aeration equipment, sludge thickeners, dewatering equipment, UV systems, chlorine contact

equipment, bio-disks, and sludge digester systems.

c. Sewage Treatment Plant Outfall

- i. Replacement of discharge pipe with similar pipe size provided that the outfall location is not changed.

d. Stormwater Management System

- i. Modifications of Works to service the existing approved drainage area located within the site, provided that there is no increase in the average impervious area established in the original design and the discharges from the site will not exceed the attenuated flows established in the original design.
- ii. Installation of new oil grit separators.

e. Sanitary Sewers

- i. Pipe relining and replacement with similar pipe size within the Sewage Treatment Plant site, where the nominal diameter is not greater than 1,200mm.

f. Pilot Systems

- i. Installation of pilot systems for new or existing technologies provided that:
 - any effluent from the pilot system is discharged to the inlet of the sewage treatment plant or hauled off-site for proper disposal,
 - any effluent from the pilot system discharged to the inlet of the sewage treatment plant or sewage conveyance system does not significantly alter the composition/concentration of the influent sewage to be treated in the downstream process; and that it does not add any inhibiting substances to the downstream process, and
 - the pilot system's duration does not exceed a maximum of two years; and a report with results is submitted to the Director and District Manager three months after completion of the pilot project.

2. Works that are exempt from section 53 of the OWRA by O. Reg. 525/98 continue to be exempt and are not required to follow the notification process under this Limited Operational Flexibility.

3. Normal or emergency operational modifications, such as repairs, reconstructions, or other improvements that are part of maintenance activities, including cleaning, renovations to existing approved Works equipment, provided that the modification is made with Equivalent Equipment, are considered pre-approved.

4. The modifications noted in section (3) above are not required to follow the notification protocols under Limited Operational Flexibility, provided that the number of pieces and description of the equipment as described in the ECA does not change.

RETAIN COPY OF COMPLETED FORM AS PART OF THE ECA AND SEND A COPY TO THE DISTRICT MANAGER

Part 1 – Environmental Compliance Approval (ECA) with Limited Operational Flexibility		
<i>(Insert the ECA's owner, number and issuance date and notice number, which should start with "01" and consecutive numbers thereafter)</i>		
ECA Number	Issuance Date (mm/dd/yy)	Notice number (if applicable)
ECA Owner	Municipality	

Part 2: Description of the modifications as part of the Limited Operational Flexibility
<i>(Attach a detailed description of the sewage works)</i>
<p>Description shall include:</p> <ol style="list-style-type: none"> 1. A detail description of the modifications and/or operations to the sewage works (e.g. sewage work component, location, size, equipment type/model, material, process name, etc.) 2. Confirmation that the anticipated environmental effects are negligible. 3. List of updated versions of, or amendments to, all relevant technical documents that are affected by the modifications as applicable, i.e. submission of documentation is not required, but the listing of updated documents is (design brief, drawings, emergency plan, etc.)

Part 3 – Declaration by Professional Engineer				
<p>I hereby declare that I have verified the scope and technical aspects of this modification and confirm that the design:</p> <ol style="list-style-type: none"> 1. Has been prepared or reviewed by a Professional Engineer who is licensed to practice in the Province of Ontario; 2. Has been designed in accordance with the Limited Operational Flexibility as described in the ECA; 3. Has been designed consistent with Ministry's Design Guidelines, adhering to engineering standards, industry's best management practices, and demonstrating ongoing compliance with s.53 of the Ontario Water Resources Act; and other appropriate regulations. <p>I hereby declare that to the best of my knowledge, information and belief the information contained in this form is complete and accurate.</p>				
<table border="1"> <tr> <td>Name (Print)</td> <td>PEO license Number</td> </tr> <tr> <td>Signature</td> <td>Date (mm/dd/yy)</td> </tr> </table>	Name (Print)	PEO license Number	Signature	Date (mm/dd/yy)
Name (Print)	PEO license Number			
Signature	Date (mm/dd/yy)			
Name of Employer				

Part 4 – Declaration by Owner				
<p>I hereby declare that:</p> <ol style="list-style-type: none"> 1. I am authorized by the Owner to complete this Declaration; 2. The Owner consents to the modification; and 3. This modifications to the sewage works are proposed in accordance with the Limited Operational Flexibility as described in the ECA. <p>4. The Owner has fulfilled all applicable requirements of the Environmental Assessment Act.</p> <p>I hereby declare that to the best of my knowledge, information and belief the information contained in this form is complete and accurate.</p>				
<table border="1"> <tr> <td>Name of Owner Representative (Print)</td> <td>Owner representative title (Print)</td> </tr> <tr> <td>Owner Representative's Signature</td> <td>Date (mm/dd/yy)</td> </tr> </table>	Name of Owner Representative (Print)	Owner representative title (Print)	Owner Representative's Signature	Date (mm/dd/yy)
Name of Owner Representative (Print)	Owner representative title (Print)			
Owner Representative's Signature	Date (mm/dd/yy)			

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

1. The reason for the definitions are to simplify the wording in the subsequent conditions and to define the specific meaning of terms used in this ECA.
2. The reason for Conditions 1.1 to 1.13 is to clarify the legal rights and responsibilities of the Owner.
3. The reason for Conditions 2 and 7 is to ensure that the Site is developed and operated in accordance with the Application and supporting documentation submitted by the Owner, and not in a manner which the Director has not been asked to consider.
4. Conditions 3.1 and 3.2 are 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.
5. Conditions 3.3 and 3.4 are included to ensure that the Works are constructed in accordance with the ECA and that record drawings of the Works “as constructed” are maintained for future references.
6. Conditions 3.5 and 3.6 are 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.
7. Condition 3.7 is included to ensure that the works is operated in accordance with the information submitted by the Owner relating to the process and materials which are served by the Works, and to ensure that any contemplated changes in them which could potentially affect the characteristics of effluent from the Works will be properly reviewed and approved.
8. Conditions 3.8 through 3.15 are 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. Conditions 3.16 and 3.17 are imposed to ensure that the effluent discharged from the Works meets the Ministry's effluent quality requirements, as specified, on a continuous basis, thus minimizing environmental impact on the receiver.
10. Conditions 3.18 and 3.19, and 4.1 through 4.6 are included to require the Owner to demonstrate on a continual basis that the quality and quantity of the effluent from the approved Works is consistent with the design and effluent objectives/limits specified in the ECA and that the approved Works does not cause any impairment to the receiving watercourse.
11. Condition 5 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.

12. Condition 6 is included to ensure that the Works are operated in accordance with the application and supporting documentation submitted by the Owner, and not in a manner which the Director has not been asked to consider. These Conditions are also included to ensure that a Licensed Engineer Practitioner has reviewed the proposed modifications and attests that the modifications are in line with that of Limited Operational Flexibility, and provide assurance that the proposed modifications comply with the Ministry's requirements stipulated in the Terms and Conditions of this Approval, Ministry's policies, guidelines, and industry engineering standards and best management practices.
13. The reason for Condition 8 is to ensure that if for any reason the Owner should cease operation or abandon the Site sufficient funds will be available for the Site to be properly closed, maintained and monitored in an environmentally safe manner.

**Upon issuance of the environmental compliance approval, I hereby revoke Approval No(s).
1352-6N6LRW, 5743-BGRHQ3 issued on November 29, 2021, November 12, 2019**

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 receipt of this notice, require a hearing by the Tribunal. Section 142 of the *Environmental Protection Act* provides that the notice requiring the hearing ("the Notice") shall state:

- a. 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;
- b. The grounds on which you intend to rely at the hearing in relation to each portion appealed.

Pursuant to subsection 139(3) of the *Environmental Protection Act*, a hearing may not be required with respect to any terms and conditions in this environmental compliance approval, if the terms and conditions are substantially the same as those contained in an approval that is amended or revoked by this environmental compliance approval.

The Notice should also include:

1. The name of the appellant;
2. The address of the appellant;
3. The environmental compliance approval number;
4. The date of the environmental compliance approval;
5. The name of the Director, and;
6. 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:

Registrar*
Ontario Land Tribunal
655 Bay Street, Suite 1500
Toronto, Ontario
M5G 1E5
OLT.Registrar@ontario.ca

and

The Director appointed for the purposes of Part II.1 of
the *Environmental Protection Act*
Ministry of the Environment, Conservation and Parks
135 St. Clair Avenue West, 1st Floor
Toronto, Ontario
M4V 1P5

* 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 www.olt.gov.on.ca

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

DATED AT TORONTO this 24th day of June, 2024



Mohsen Keyvani, P.Eng.
Director
appointed for the purposes of Part II.1 of the
Environmental Protection Act

CM/

c: District Manager, MECP Timmins District Office
Sarah McLean, De Beers Canada Inc.