

Environmental Assessment Approval

Approval Date: August 2, 2022

Goldboro Gold Project

Signal Gold Inc.

Goldboro, Guysborough County, Nova Scotia

Terms and Conditions for Environmental Assessment Approval

1 Definitions

- 1.1 *Environment Act* means Environment Act 1994-95, c.1, s.1, and includes, unless the context otherwise requires, the regulations made pursuant to the Act, as amended from time to time.
- 1.2 Department means the Department of Environment and Climate Change, and the contact for the Department for this Approval is:

Nova Scotia Environment
Eastern Region, Antigonish Office
155 Main Street, Suite 205, Nova Scotia B2G 2B6
Phone: 902-863-7389 Fax: 902-863-7411
- 1.3 Minister means the Minister of Environment and Climate Change.
- 1.4 Commencement means the same as to commence work, as defined in the Environmental Assessment Regulations.
- 1.5 EA means Environmental Assessment.

2 Scope

- 2.1 This Approval (the "Approval") relates to the Approval Holder(s) and their Registration Document, and all documentation submitted to the Department prior to the issuance of this approval for the Goldboro Gold Project, situated at or near Goldboro, Guysborough County, Nova Scotia, hereafter referred to as the "Project."
- 2.2 The Approval Holder(s) shall ensure the Project is carried out in accordance with this Approval and reference documents, including the Registration Documents and supporting documentation.

3 General

- 3.1 The Approval Holder shall conduct the Project in accordance with the Environment Act, as amended from time to time.
- 3.2 The Approval Holder shall, within two years of the date of issuance of this Approval, commence work on the Project unless granted a written extension by the Minister.
- 3.3 The Approval Holder shall provide written notification to the Department of the commencement date of the Project, at a minimum 30 days prior to the commencement.
- 3.4 The Approval Holder shall provide to the Department a concordance table detailing the status of the EA terms and conditions on January 31 of each year until released in writing by the Department.
- 3.5 Prior to any proposed expansion, modification, or relocation of any aspect of the Project from that proposed in the Registration Document, the Approval Holder must submit the proposal to the EA Branch for review and may require an EA or amendment.
- 3.6 Nothing in this Approval relieves the Approval Holder of the responsibility for obtaining and paying for all other licenses, permits, approvals or authorizations necessary for carrying out the Project which may be required by municipal by-laws or provincial or federal legislation. The Minister does not warrant that such licenses, permits, approvals or authorizations will be issued.
- 3.7 No authority is granted by this Approval to enable the Approval Holder(s) to commence or continue the Project on lands which are not in the control or ownership of the Approval Holder(s). It is the responsibility of the Approval Holder(s) to ensure that such a contravention does not occur. Failure to retain said authorization may result in this Approval being cancelled or suspended.
- 3.8 The Approval Holder shall not transfer, sell, lease, assign or otherwise dispose of this Approval without the written consent of the Minister. The sale of a controlling interest of a business or a transfer of this Approval from a parent company to a subsidiary or an affiliate is deemed to be a transfer requiring consent.
- 3.9 Upon any changes to the Registry of Joint Stock Companies information related to the Approval Holder, the Approval Holder shall provide a copy to the Department within 5 days of the changes.

- 3.10 If there is a discrepancy between the Registration Documentation and the terms and conditions of this Approval, the terms and conditions of this Approval shall apply.
- 3.11 Where a timeline is associated with a condition(s) of the Approval, the Approval Holder shall fulfil the requirements of the condition(s) within the prescribed timeline, unless otherwise authorized in writing by the Department.
- 3.12 The Approval Holder shall notify the Department of any incidents of non-compliance with this Approval immediately and in accordance with the Act and Regulations.
- 3.13 The Approval Holder shall bear all expenses incurred in carrying out the environmental management and monitoring required under the terms and conditions of this Approval, the Act or the Regulations.
- 3.14 Unless specified otherwise in this Approval, all samples required to be collected by this Approval, the Act or the Regulations shall be collected, preserved, and analysed, by qualified personnel, in accordance with recognized industry standards and procedures and in accordance with any Standard under the Act or Regulations.
- 3.15 The Approval Holder shall ensure that this Approval, or a copy, is present at the Project site while personnel are on site and that personnel directly involved in the Project are made fully aware of the terms and conditions which pertain to this Approval.
- 3.16 The Approval Holder shall update and/or revise any of the plans, programs or other documents required in this Approval to reflect the progressive development of the Project, and at any time at the request of the Department and make them available to the Department upon request.
- 3.17 Based on the results of the monitoring required in this Approval or otherwise completed for the Project, or at any time as determined by the Department, the Approval Holder shall make necessary modifications to mitigation plans and/or changes to Project operations to prevent unacceptable environmental effects, as required by the Department.
- 3.18 The Approval Holder shall provide to the Department a summary table detailing the results of the monitoring required in this Approval, or otherwise completed for the Project, on January 31 of each year until released in writing by the Department. The results shall clearly identify and summarize any exceedances.

- 3.19 Where a condition of this Approval requires the Approval Holder to consult a particular party or parties, the condition will be considered complete once the Approval Holder provides a written confirmation letter from the party or parties that the consultation is complete.

If there is a conflict between the Approval Holder and a party or parties regarding the consultation, the Department will determine if suitable consultation has been completed and/or if further action is required.

4 Historical Mining Contamination

- 4.1 Using the results of the Phase 1 Environmental Site Assessment, the Approval Holder shall retain a Site Professional to conduct a Phase 2 Environmental Site Assessment, as defined by the Contaminated Sites Regulations, for all suspected or known contaminated areas that could be disturbed by construction, operation or reclamation of the Project. Prior to commencement, unless otherwise authorized by the Department, the Phase 2 Environmental Site Assessment shall be submitted to the Department.
- 4.2 The Approval Holder shall retain a Site Professional to prepare a Remedial Action Plan (RAP), as defined by the Contaminated Sites Regulations, for historic contamination impacts within all areas that could be disturbed by construction, operation or reclamation of the Project. The Approval Holder shall submit the RAP to the Department with the Part V Industrial Approval application.

5 Project Design and Operations

- 5.1 At the request of the Department, the Approval Holder shall reimburse the Department for the additional cost of all resources required to ensure environmental compliance for this Project, up to \$200,000 annually. This amount will include the cost and time of staff persons dedicated to the Project and will be due by January 1 of each year throughout the life of the Project, until released in writing by the Department.
- 5.2 The Approval Holder shall submit to the Department with the Part V Industrial Approval application information identifying potentially acid generating (PAG) material (PAG1, PAG2) and non potentially acid generating (NPAG) material for the Project using the Neutralization Potential Ratio (NPR) value rather than the operational NPR.

- 5.3 The Approval Holder shall submit to the Department with the Part V Industrial Approval application further evaluation by a qualified professional geochemist supporting the use of NPAG rock for construction in areas where surface water runoff will not be captured and sent to the Tailings Management Facility for treatment. This shall evaluate the suitability of a 100 mg/kg cut-off for arsenic leaching material and the sequencing of NPAG and low arsenic leaching mine rock, confirming sufficient volumes are available on site, when required.
- 5.4 The Approval Holder shall be responsible for the costs of any third-party review of plans, reports, or monitoring results deemed necessary by the Department over the life of the Project.

6 Surface Water Resources

- 6.1 The Approval Holder shall submit additional information to the Department with the Part V Industrial Approval application to support determination of regulatory discharge limits to surface water (e.g., establishment of baseline concentrations for contaminants of concern), preventing adverse effects to surface water resources and aquatic life. This information shall be developed in consultation with the Department.
- 6.2 As part of the Part V Wetland Alteration Approval application submitted to the Department, the Approval Holder shall demonstrate that wetlands, particularly wetlands of special significance, have been avoided to the extent possible, and risks to indirect alteration of wetland area have been mitigated. The application shall include a monitoring plan to demonstrate the effectiveness of avoidance and mitigation of indirect impacts in both partially altered and avoided wetlands. This monitoring shall include sufficient pre-construction data from wetlands for comparison to Project effects, including at a minimum, WESP-AC assessments, representative vegetation monitoring plots on transects perpendicular to wetland boundaries and hydrological monitoring in each wetland.
- 6.3 Prior to commencement of the Project, the Approval Holder shall submit a Part V Watercourse Alteration Approval for Gold Brook for the alteration of flows in a watercourse. As a part of the application, the Approval Holder shall demonstrate that watercourse alteration has been minimized to the extent possible, and risks to, and arising from the alteration of flow have been mitigated. The application shall include a monitoring plan to demonstrate the effectiveness of mitigations to the alteration of flow. This shall include sufficient pre-construction monitoring data from Gold Brook to allow effective comparison of Project effects, including, at a minimum, sufficient data to support characterization of seasonal and annual variability, as well as in characterizing low-flow regimes where the addition of pumped flows will represent the largest change from natural conditions.

- 6.4 The Approval Holder shall submit a detailed surface water management plan to the Department with the Part V Industrial Approval application. This plan shall be developed by a qualified professional engineer licensed to practice in the Province of Nova Scotia.
- 6.5 The Approval Holder shall submit a detailed surface water quality and quantity monitoring plan to the Department with the Part V Industrial Approval application. This plan shall be developed in consultation with the Department.
- 6.6 Throughout the life of the Project, the Approval Holder shall conduct any additional effluent or surface water monitoring or studies, as required by the Department.

7 Groundwater Resources

- 7.1 The Approval Holder shall submit additional information to the Department with the Part V Industrial Approval application to support determination of regulatory discharge limits to groundwater (e.g., establishment of baseline concentrations for contaminants of concern), preventing adverse effects to groundwater resources. This information shall be determined in consultation with the Department.
- 7.2 The Approval Holder shall submit a detailed groundwater quality and quantity monitoring plan to the Department with the Part V Industrial Approval application. This plan shall be designed by a professional hydrogeologist licensed to practice in Nova Scotia.
- 7.3 The Approval Holder shall conduct any additional effluent or groundwater monitoring or studies, as required by the Department.
- 7.4 The Approval Holder shall submit a blasting plan to the Department with the Part V Industrial Approval. The plan shall consist of a completed pre-blast survey for structures within 800 m of the point of the blast. A blast monitoring plan and a blast damage response shall also be prepared.

8 Flora and Fauna

- 8.1 The Approval Holder shall provide the Wildlife Division, Department of Natural Resources and Renewables (NS NRR) with digital way points and shape files showing precise locations for species listed under the Species at Risk Act (SARA) and/or Endangered Species Act (ESA), as well as of Species of Conservation Concern identified during field work. Data should adhere to the format prescribed in the NRR Template for Species Submissions for EAs. Data are to be provided within two months of their collection.

- 8.2 Prior to commencement, the Approval Holder shall develop a Wildlife Management Plan in consultation with NS NRR and Environment and Climate Change Canada. The plan shall include:
- a lighting management plan
 - appropriate noise and dust mitigation measures
 - a process to manage exposure to spills/hazardous chemicals
 - appropriate mitigation to prevent wildlife from entering the tailings management facility and open pits
 - measures to reduce the spread of invasive species on and off site
 - an avian monitoring plan
 - appropriate setbacks from common loon and greater yellow legs nests if located during their respective breeding seasons
 - avoidance/minimization/mitigation measures that are consistent with Recovery Strategies, Action Plans or Management Plans
 - details to educate Project personnel on wildlife and species at risk that may be present on site
 - details of monitoring and inspections to ensure effectiveness of the plan
 - a contingency plan outlining measures that will be taken if unexpected effects to vegetation and wildlife are detected
 - a communication protocol including points of contact, as appropriate depending on the particular situation and species, if wildlife are encountered onsite
- 8.3 Revegetation must be undertaken using native species following consultation with NS NRR.
- 8.4 Prior to commencement, the Approval Holder shall undertake surveys to identify the extent of Blue Felt Lichen in areas surrounding the Project. Surveys must be undertaken within a 10 km radius of the Project in relevant habitats. Data will be provided to NS NRR in accordance with Condition 8.1 of this Approval and used in the development of the mitigation plan (Condition 8.6 of this Approval).
- 8.5 The Approval Holder must undertake research related to the indirect impacts of Project mining activity on lichens by monitoring Blue Felt Lichen thalli retained on the site (as outlined in the Registration Document) relative to those transplanted off site and provide a report to NS NRR. Monitoring of transplanted individuals should continue for 5 years.

8.6 Prior to commencement, the Approval Holder shall develop and implement a mitigation plan in consultation with NS NRR that prevents adverse effects to species at risk, and/or that supports species at risk recovery in Nova Scotia through financial contributions, research or conservation. The plan shall also include a program for biodiversity offsets after consulting with a knowledgeable land conservation organization. The plan shall be made available to the Department. The Approval Holder shall monitor the plan to determine its effectiveness. Monitoring reports shall be available to the Department upon request.

9 Light

9.1 At the request of the Department, the Approval Holder shall develop and implement a plan to monitor light levels, ensuring the Institution of Lighting Engineers illuminance limits included in the Registration Documents are not exceeded. The plan shall include, but not be limited to, sampling locations, parameters, monitoring methods, protocols, and frequency.

10 Traffic

10.1 Prior to commencement, the Approval Holder shall develop and implement a traffic management plan that meets the Nova Scotia Temporary Workplace Traffic Control Manual in consultation with Nova Scotia Department of Public Works. The plan should be updated regularly and be available to the Department upon request.

11 Archaeological and Heritage Resources

11.1 The Approval Holder shall cease work and contact the Special Places Coordinator, Nova Scotia Department of Communities, Culture, Tourism and Heritage (CCTH) immediately upon discovery of an archaeological, or paleontological site, artifact or fossil specimen unearthed during any phase of the Project. If the find is of certain or possible Mi'kmaq origin, the Approval Holder shall also contact the appropriate Mi'kmaq representatives as advised by CCTH.

12 Public Engagement

12.1 The Approval Holder shall develop and implement a comprehensive complaint resolution plan for receiving and responding to complaints related to the Project, including a reporting system which records, and documents steps taken to determine the cause of complaint, timeline for responding to complaints and implementing corrective measures that will be taken to alleviate the cause and prevent its recurrence. The plan shall be made available to the Department upon request.

- 12.2 The Approval Holder shall appoint a contact person designated to deal with complaints and shall provide the contact information to the Department.
- 12.3 Prior to commencement of the Project, the Approval Holder shall develop and implement a plan for the formation and operation of a Community Liaison Committee (CLC) including terms of reference, which meet the Department's Guide for the Formation and Operation of a Community Liaison Committee, as amended from time to time. The Approval Holder shall operate the CLC for the duration of the Project or until released in writing by the Department.

13 Engagement with the Mi'kmaq of Nova Scotia

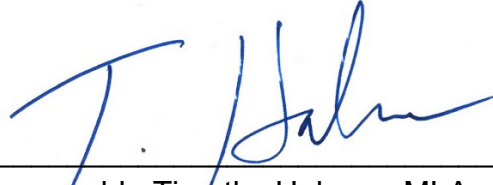
- 13.1 The Approval Holder shall develop and implement a Mi'kmaq Communication Plan, which will include but not be limited to a process for communicating Project details and seeking input from all thirteen Mi'kmaq communities on the development and implementation of Project mitigation and monitoring plans. The plan shall be updated regularly and be available to the Department upon request.
- 13.2 The Approval Holder shall complete the update to the Mi'kmaq Ecological Knowledge Study (MEKS) for the Project, as described in the Registration Document. The study shall be made available to the Department upon request.

14 Contingency Plan

- 14.1 The Approval Holder submit a comprehensive contingency plan to the Department with the Part V Industrial Approval application which meets the Department's Contingency Planning Guidelines. The plan shall provide prevention measures and address plans for dealing with accidental occurrences including but not limited to spills of hydrocarbons or other hazardous materials (e.g., sodium cyanide and hydrogen cyanide), failure of tailings/wastewater management facilities and erosion and sediment control measures, fires, and vehicular collisions.
- 14.2 The Contingency Plan shall include a specific acid rock drainage contingency plan, outlining a timeline and the measures to be taken if unacceptable effects to groundwater or surface water are occurring.
- 14.3 The Contingency Plan shall include specific surface water and groundwater contingency plans, outlining a timeline and the measures to be taken if unacceptable effects to surface water or groundwater quality or quantity are detected.

15 Bonding

- 15.1 The Approval Holder shall submit sufficient security for activities identified in Division IV of the Activities Designation Regulations to the Department with the Part V Industrial Approval application.



Honourable Timothy Halman, MLA
Minister of Environment and Climate Change