International Cyanide Management Code Mining Operation Recertification Audit

Summary Audit Report

Report Prepared for

Red Lake Operation

Evolution Mining

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Report Prepared by

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Mountain Valley Professionals, LLC

MVP Project NO. P-ERL2023.66

November 25, 2024

Evolution Mining Red Lake Operation

International Cyanide Management Code

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Table of Contents

Operational Contact

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Mine Owner:	Evolution Mining Company
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Location and Description of the Operation

Red Lake Operation was originally certified in full compliance with the International Cyanide Management Code on December 22, 2010, under the Goldcorp Canada, Inc. signatory. Red Lake Operation was subsequently recertified in full compliance in 2014, 2017 and 2021. Evolution Mining Red Lake Operation became signatory to the International Cyanide Management Code (ICMC) on December 28, 2020. The Red Lake Operation recertification audit scheduled to be completed in 2020, was postponed due to the recent acquisition of the site and subsequently to complications with COVID-19; travel and auditing, an extension from the International Cyanide Management Institute (ICMI) was granted until March 31, 2021.

The Red Lake Operations are located in Balmertown, Ontario, Canada (Figure 1). Mining, all underground, is carried out using three main mining methods - underground overhand cut and fill, underhand cut and fill, and longhole – allowing maximum ore extraction. The operation is supported by two mill processing facilities; the Red Lake Complex and the Campbell Complex, providing a total milling capacity of 3,000 tons per day, including crushing, processing, and paste fill plants.

Figure 1 - Location Map of the Red Lake Operations

Red Lake Complex Mill Mineral Processing

Red Lake Complex (RLC) has the capability to process 1,150 tons per day. The processing facilities consist of crushing, processing, and paste preparation. The crushing circuit is a two-stage process, which reduces underground ore from approximately 12 inches to 3/8 inch. The ore is fed into the jaw crusher and is classified using a sizing screen. Oversized material larger than 3/8 inch was further crushed using the cone crusher. The oversized ore then reports back to the screen for further classification, whereas the undersized ore is conveyed to the processing stages.

RLO receives solid cyanide (briquettes) in one-ton stainless steel flo-bins at a central storage area, at the Campbell Complex, similar to a Quonset hut. The bins are delivered using over-the-road trucks in a single covered trailer with up to 20-bins per delivery. The bins are distributed for use to the RLC interim storage area and mixed on an as needed basis. Bins are returned to the supplier for reuse.

The processing stages consisted of grinding, gravity concentrating, leaching with cyanide solution, carbon in pulp (CIP), carbon elution and reactivation, electrowinning, bullion smelting/refining, cyanide destruction, flotation, and concentrate handling.

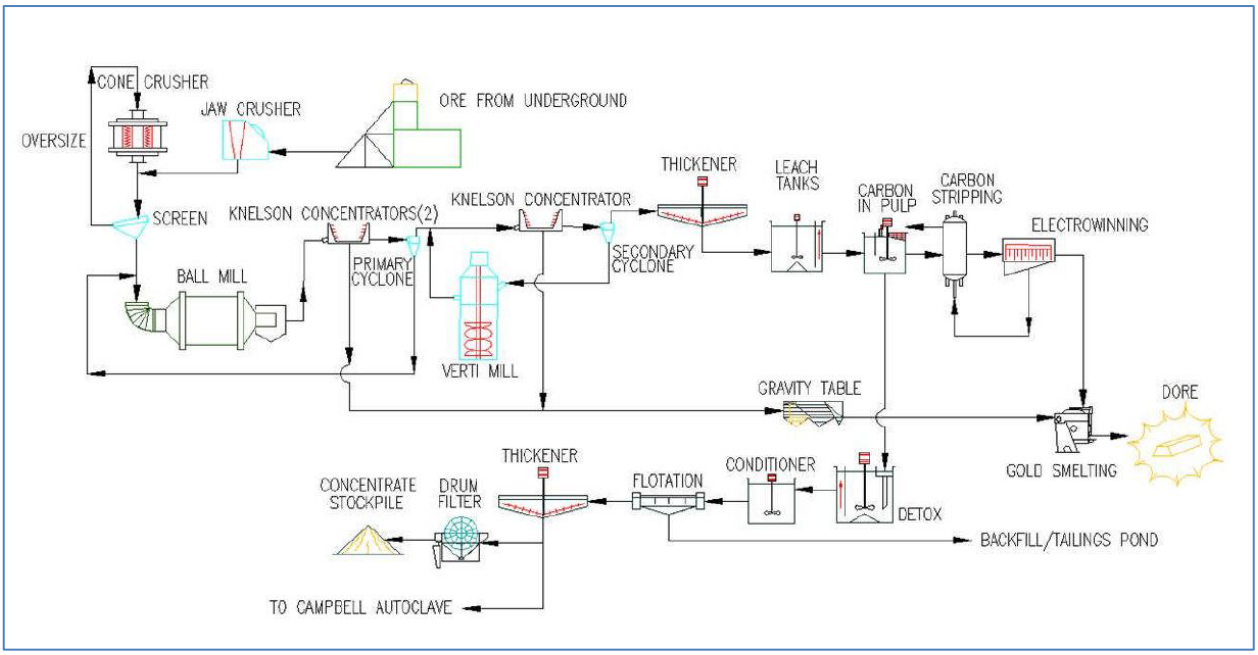
The grinding circuit consists of a 1,200 HP ball mill in closed circuit with sizing cyclones, with the secondary cyclone underflow feeding a 400 HP vertimill. Coarse gold is recovered from grinding using three Knelson Concentrators. This gold is concentrated on a shaker table and smelted into bullion at the RLC refinery.

The overflow from the secondary cyclone is thickened and pumped into four leach tanks where gold is dissolved using a weak cyanide solution. The dissolved gold and slurry mixture then flows to eight CIP tanks that contained granular activated carbon particles that adsorbed the gold in solution. The adsorbed gold is stripped from the carbon using a heated mild caustic solution that is pumped to two electrowinning cells. Dore is then produced in the refinery at the RLC.

After exiting the CIP tanks, most of the remaining cyanide in solution is destroyed via the Inco SO2/Air treatment process, which oxidizes the cyanide component of the slurry and precipitates heavy metals. After the cyanide is destroyed, the slurry flows to the flotation circuit. This slurry has a concentration of sulphides, which encapsulates the remaining recoverable gold and is separated from the rest of the gangue minerals. In the flotation circuit, chemicals are added to help the gold bearing sulphide minerals adhere to tiny bubbles of air that are added in small, agitated tanks. The bubbles rise to the surface and collect in a froth layer which is removed from the surface with paddles. The concentrate is collected, and any excess water is removed in the concentrate thickener. The concentrate is transferred at around 70 percent solids through a connecting pipeline, but if required it could be filtered to remove moisture and trucked to the concentrate storage area, until reclaimed back into the process later. This concentrate is then processed in the Campbell Complex (CC) pressure oxidation circuit (autoclave) or sold and shipped off-site.

The tailings from the flotation circuit are directed to the Paste Plant where the slurry is either discharged to the RLC Tailings Management Facility or prepared to be used as backfill underground. The tailings that are used underground are filtered using a disc filter to remove excess water. The filtered tailings are then mixed with cement, fly ash, and water to form a paste. Once the proper consistency is achieved, the paste is sent underground to the desired stope. Tailings sent to the RLC Tailings Management Facility are discharged via spigot to either Tailings Area 1 or Tailings Area 2. Water is decanted to Tailings Area 2, followed by the Primary and Secondary ponds. Lastly, water is pumped from the Secondary pond to the treatment plant to remove arsenic before the water is discharged into Balmer Lake. Water is also pumped from the Secondary pond to the RLC for reuse as process water.

Figure 2 - Process Flowchart at Red Lake Complex Mill



Campbell Complex Mill Mineral Processing

The CC mill has the capability to process 1,850 tonnes per day. Processing facilities consist of crushing, grinding, gravity recovery, flotation, pressure oxidation, cyanide leach, carbon-in-leach (CIL), CIP recovery and paste preparation.

The crushing plant is a three-stage process which reduces underground ore size to approximately ½ inch in size. The ore is fed into a jaw crusher, which reports to a standard cone crusher. The ore is then classified using a double deck screen. Oversized ore is fed into a short head cone crusher to be crushed to the desired size and reports back to the screen for additional classification, whereas the crushed undersize ore is conveyed to the grinding circuit to be reduced further in size.

RLO receives solid cyanide (briquettes) in one-ton stainless steel flo-bins at a central storage area, at the Campbell Complex, similar to a Quonset hut. The bins are delivered using over-the-road trucks in a single covered trailer with up to 20-bins per delivery. The bins are distributed to the CC mill mixing area and mixed on an as needed basis. Bins are returned to the supplier for reuse.

The grinding circuit is a two-stage process with an open circuit rod mill and a closed-circuit ball mill with sizing cyclones. The coarse gold is recovered from the grinding circuit using two Knelson Concentrators. The gold is concentrated on a shaker table and sent to the refinery at the RLC where it is smelted into bullion.

Following grinding, the slurry is fed to the flotation circuit where a sulphide concentrate is produced. In the flotation circuit, chemicals are added to help the gold bearing sulphide minerals adhere to tiny bubbles of air that are added to the bottom of small, agitated tanks. The bubbles rise to the surface and collect in a froth layer, which is removed from the surface with paddles. The concentrate is collected, and any excess water is removed in the concentrate thickener. This concentrate is then mixed with concentrate from RLC and passes into the autoclave. The flotation tails pass on to the cyanide leach circuit for additional gold recovery.

In the pressure oxidation circuit, thickened flotation concentrate is contacted with weak acidic solution to convert any hydrocarbons into CO^2. This process takes place in five continuously stirred reactor tanks to ensure that this reaction is complete. It is very important that all CO^2 is removed as the CO^2 will rob the oxygen's partial pressure, ultimately resulting in low autoclave kinetics. Once treated, the slurry is then pumped into a carbon steel, lead and acid brick lined autoclave where the concentrate will be exposed to extreme pressures (305 PSI) and high temperatures (varying depending on compartments). Under these conditions, the oxidation process converts the sulphides to sulphates and the arsenopyrite to scorodite (ferric arsenate). The oxidized slurry is pH adjusted using lime prior to being leached in the CIL circuit. The acidic tailings solution from the oxidation process is sent to the waste treatment circuit where it is first neutralized with final mill tailings, and then further with lime.

The oxide product from the autoclave circuit and the flotation tailings are leached in a weak cyanide solution. Carbon is added to the last CIP tank and transferred concurrently with the flow of slurry right up to CIL 1. The gold in solution is adsorbed onto the carbon and the loaded carbon is separated from the slurry using a screen. The gold is stripped from the carbon using a caustic solution.

The carbon is then acid washed to remove calcium in the pores of the carbon, before being reactivated in a rotary kiln and recycled.

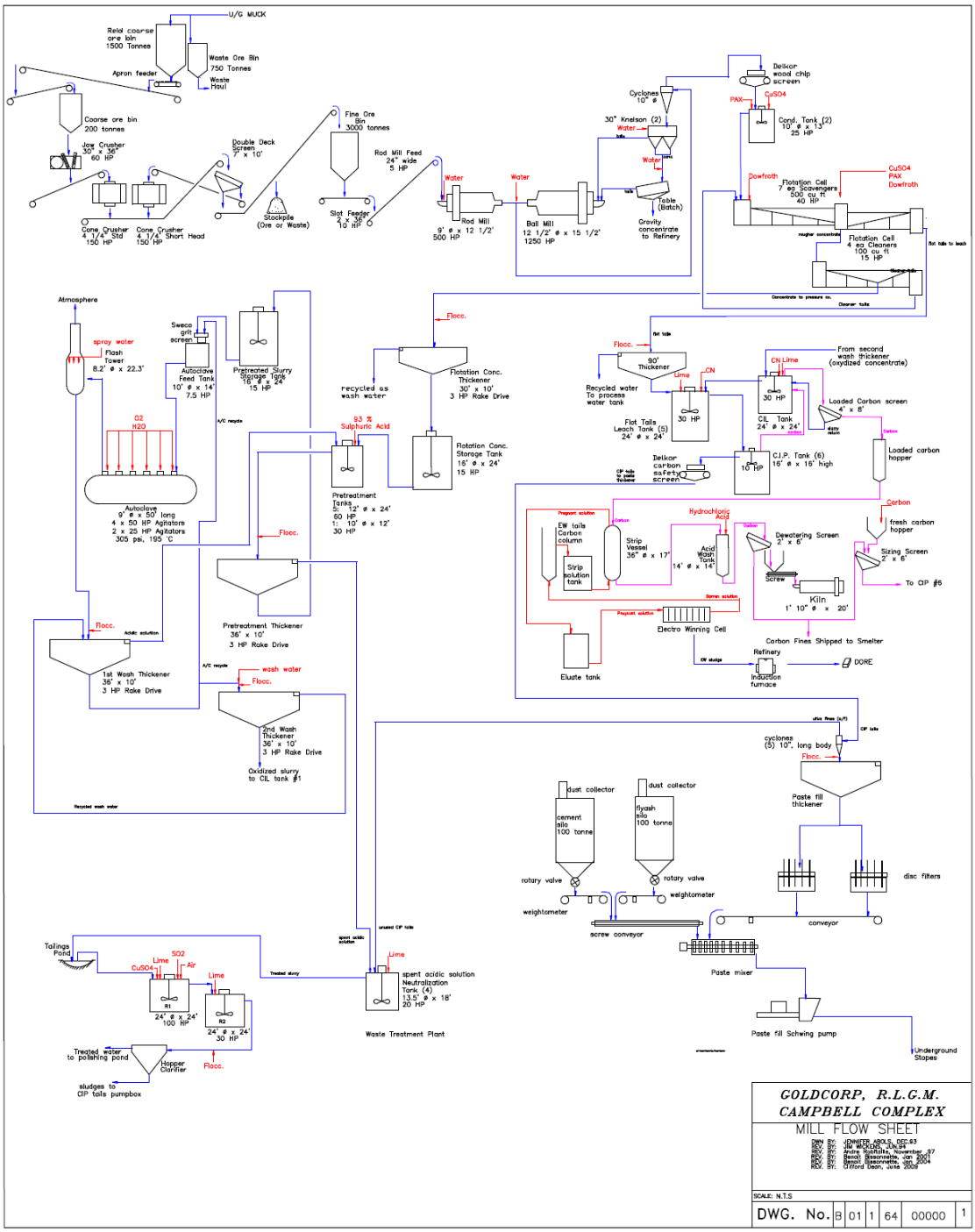
Since the last recertification audit the CC plant has added two CIL tanks, one CIP tank and an additional Detox tank.

The leached tailings are then treated using the Inco SO2/Air process which oxidizes the cyanide component of the slurry and precipitates heavy metals. After the cyanide is destroyed, the slurry is sent to the paste thickener. Slurry that is to be sent underground is filtered before adding cement, fly ash and water to form a paste. Once the proper consistency is achieved, the paste is discharged underground by gravity to the desired stope. Thickener underflow that is not required for paste fill is mixed with the acidic solution from the pressure oxidation circuit and treated with lime in the waste treatment circuit to precipitate metals and increase the pH. Outflow from the waste treatment circuit is combined with thickener overflow prior to being pumped to the Campbell main tailings pond.

2-kilometer bi-directional pipeline transfers CC tailings to the RLC Paste Plant, and returns reclaimed water from the RLC Paste Plant to CC.

All water that has accumulated in the main tailings pond is treated by pumping into the effluent treatment system from approximately May through October. Once the water reaches effluent treatment, lime is added to adjust the pH further to ensure the removal of metals. From the effluent treatment system, the treated effluent is pumped to the settling pond. The settling pond also receives inflow of water from the primary clear water pond which stores runoff from the closed Balmer Tailings and seepage from the Main Tailings Pond. From the settling pond, water is filtered as it travels through a rock berm into the polishing pond. Next, the polishing pond water is gravity fed to the wetlands. The wetlands consist of various cells with cattails which remove ammonia from the water. The treated water is eventually discharged into Balmer Lake.

Figure 3 - Process Flowchart at Campbell Complex Mill



Auditor Information

Red Lake Operation	☒ in full compliance with ☐ in substantial compliance with ☐ not in compliance with	**The International Cyanide Management Code**

The auditor has determined that the Red Lake Operation is in **Full Compliance** for this ICMC audit.

This operation has not experienced any compliance issues during the previous three-year audit cycle.

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Audit Dates

The site visit for the Recertification Audit was undertaken over 4 days from April 15th – 18th, 2024.

I attest that I meet the criteria for knowledge, experience, and conflict of interest for Code Verification Audit Team Leader, established by the International Cyanide Management Institute and that all members of the audit team meet the applicable criteria established by the International Cyanide Management Institute for Code Verification Auditors.

I attest that this Audit Report accurately describes the findings of the verification audit. I further attest that the verification audit was conducted in a professional manner in accordance with the International Cyanide Management Institute for Mining Operations Verification Protocol (2021) and using standard and accepted practices for health, safety, and environmental audits.

Date: November 25, 2024

Operation Name: **Red Lake Operation**

Signature of Lead Auditor: 

PRINCIPLE 1 – PRODUCTION & PURCHASE

Encourage responsible cyanide manufacturing by purchasing from manufacturers that operate in a safe and environmentally protective manner.

Standard of Practice 1.1	**Purchase cyanide from manufacturers employing appropriate practices and procedures to limit exposure of their workforce to cyanide, and to prevent releases of cyanide to the environment.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 1.1**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 1.1; purchase cyanide from manufacturers employing appropriate practices and procedures to limit exposure of their workforce to cyanide, and to prevent releases of cyanide to the environment. Independent cyanide distributors were not used.

On or about July 26, 2021, Chemours Company FC, LLC entered into a Purchase and Sale Agreement to sell certain assets to Manchester Acquisition Sub LLC, who is a wholly owned subsidiary of Draslovka. This agreement included the acquisition of the Chemours North American Production & Packaging supply chain.

Draslovka, previously Chemours, was the sole cyanide producer and supplier for Red Lake Operation (RLO) during this audit cycle.

RLO has committed to purchasing cyanide only from producers that are compliant with the Code. Draslovka' s production facility in Memphis, Tennessee, was initially certified as Code compliant on June 13, 2006. The facility was initially recertified as fully compliant on December 1, 2009, recertified on April 30, 2013, and July 15, 2016, January 21, 2020, and most recently on May 24, 2023.

PRINCIPLE 2 - TRANSPORTATION

Protect communities and the environment during cyanide transport.

Standard of Practice 2.1	**Require that cyanide is safely managed through the entire transportation and delivery process from the production facility to the mine by use of certified transport with clear lines of responsibility for safety, security, release prevention, training and emergency response.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 2.1

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 2.1, requiring that cyanide is safely managed through the entire transportation and delivery process from the production facility to the mine by use of certified transport with clear lines of responsibility for safety, security, release prevention, training and emergency response.

Dry cyanide briquettes are shipped directly from the Draslovka Memphis production plant, in stainless steel one-ton bins, directly to the RLO site by Empire Express, Inc. (Empire).

Draslovka provided a Chain of Custody Letter for the RLO supply chain that confirmed the supply chain logistics and that no intermediaries are included in the supply chain. Bill of Ladings verify that RLO cyanide supply has been exclusively from the Draslovka Memphis Production facility and exclusively transported by Empire. RLO does not contract with cyanide transporters directly.

Empire is a Signatory to the Code and was first certified in October of 2010, recertified as fully compliant with the Code on September 2014, 2017, and most recently on February 7, 2022, Empire was certified as fully compliant with the Code.

PRINCIPLE 3 – HANDLING & STORAGE

Protect workers and the environment during cyanide handling and storage.

Standard of Practice 3.1	**Design and construct unloading, storage and mixing facilities consistent with sound, accepted engineering practices, quality control/quality assurance procedures, spill prevention and spill containment measures.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 3.1**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 3.1, requiring that cyanide handling and storage facilities are designed and constructed consistent with sound, accepted engineering practices, quality assurance/quality control (QA/QC) procedures, spill prevention and spill containment measures.

Facilities for unloading, storing, and mixing cyanide have been designed and constructed in accordance with cyanide producers' guidelines, applicable jurisdictional rules and/or other sound and accepted engineering practices. No changes in the cyanide storage and mixing facilities have occurred since the previous Recertification Audit. Unloading and storage areas of solid cyanide are located away from people and surface waters. Cyanide is not transported, stored, or unloaded in solution.

The temporary storage area in the RLC Mill, as well as the mixing and storage tanks, are located away from mill offices and areas where staff may congregate. The mill itself is located approximately 100 m from Balmer Creek, in a bermed area with no reasonable flow path to the creek. The cyanide mixing and distribution tanks at the RLC Mill have level sensors and high-level alarm indicators (lights and a siren) to warn of possible overfilling. There is also a system with automatic shut off valves that prevents overfilling of the mixing tank.

The temporary storage area within the CC Mill, as well as the mixing and storage tanks, are located away from surface water bodies, mill offices and areas where staff may congregate.

The mixing and distribution tanks at the CC Mill also have level sensors and high-level alarm indicators (lights and a siren) to warn of possible overfilling. The systems to prevent overfilling are maintained. The high-level sensor on the mix tank shuts off makeup water addition at 89% and the high-level alarm is set at 95%. The level sensor on the distribution tank automatically shuts the valve from the mixing tank at 95%.

The systems to prevent overfilling are maintained and inspected routinely.

Cyanide mixing and storage tanks are located on a concrete surface that can prevent seepage to the subsurface.

The secondary containments for the mixing and distribution tanks at both the RLC Mill and the CC Mill are constructed of reinforced concrete that provides a competent barrier to leakage.

The cyanide is stored with adequate ventilation to prevent the build-up of hydrogen cyanide (HCN) gas, under a roof and off the ground. The central storage area and reagent mixing facilities are in secure areas where public access is prohibited, and employee access is restricted. The cyanide is stored separately from incompatible materials through packaging and secondary containments which prevent mixing. The cyanide storage tanks for the mills are located within the open areas of the mill building, which have roof fans to provide adequate ventilation to prevent build-up of HCN gas.

Standard of Practice 3.2	**Operate unloading, storage and mixing facilities using inspections, preventive maintenance and contingency plans to prevent or contain releases and control and respond to worker exposures.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 3.2

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Practice 3.2 requiring that cyanide handling and storage facilities are operated using inspections, preventive maintenance and contingency plans to prevent or contain releases and control and respond to worker exposures.

RLO has developed procedures with respect to empty cyanide containers. Cyanide is received, stored and handled in dedicated flo-bins which are returned to the manufacturer for reuse. The Cyanide Handling & Delivery Procedure requires that flo-bins are not stacked.

The operation has implemented procedures to prevent releases and exposures during cyanide unloading, transfer, and mixing. The procedures describe the steps for mixing solid cyanide including emptying of the mixing tank, pre-mix preparation and mixing the cyanide into solution. The operation and maintenance of the valves are included in the procedures. The procedures are accompanied by checklists.

The operation has also developed procedures to be followed in case of a cyanide spillage during cyanide offloading and transfer activities, or in response to spills of cyanide during mixing activities, including the timely clean-up of cyanide spills. The procedures describe the required personal protective equipment (PPE) for mixing, and control room operators observe mixing events via video camera. RLO also requires a second observer either in the mix room or in the control room. The Draslovka contract specifically states that dye will be added to the solid packaging prior to shipment.

PRINCIPLE 4 – OPERATIONS

Manage cyanide process solutions and waste streams to protect human health and the environment.

Standard of Practice 4.1	**Implement management and operating systems designed to protect human health and the environment including contingency planning and inspection and preventive maintenance procedures.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 4.1

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.1, requiring that the operation implement management and operating systems designed to protect human health and the environment including contingency planning and inspection and preventive maintenance procedures.

RLO has developed, implemented and maintained written management plans and procedures describing the standard of practice necessary for the safe and environmentally sound operation of the cyanide facilities, including:

- Cyanide unloading, storage and mixing areas
- Secondary containments
- Leach tanks
- CIP tanks
- Cyanide destruction plants
- Paste plants
- Unloading station for paste trucking
- Effluent treatment plant
- Tailings pipelines and reclaim lines
- Tailings dams and associated ponds

The procedures and plans have been updated, as needed, to reflect operational changes during the recertification period.

The operation has plans and procedures that identify the assumptions and parameters on which the facility design was based and any applicable regulatory requirements as necessary to prevent or control cyanide releases and exposures consistent with applicable requirements. The CC and RLC Tailings Management facilities – Operation, Maintenance and Surveillance (OMS) Manuals and Emergency Planning and Response (EPRs) describe the procedures and plans have been updated, as needed, to reflect operational changes during the recertification period.

The operation has plans and procedures that identify the assumptions and parameters on which the facility design was based and any applicable regulatory requirements as necessary to prevent or control cyanide releases and exposures consistent with applicable requirements. The CC and RLC Tailings Management facilities – OMS Manuals and EPR's describe the freeboard required for safe operation of the tailings impoundments and ponds as well as their maximum operating levels and storage volumes. Specific Weak Acid Dissociable (WAD) cyanide concentration allowed in the tailings and in the effluent discharges into the ponds are also considered. The procedures for the CC Effluent Treatment Plant Operation, the CC Detox Operation and the RLC Detox Operation detail cyanide concentrations. The operating procedures for both mills cover the operational requirements for all tanks, valves, pipes and other equipment with regard to elements such as tonnages, densities, pH and cyanide concentrations.

The plans and procedures describe the standard of practice necessary for the safe and environmentally sound operation of the cyanide facilities, including the specific measures needed for compliance with the Code. RLO has developed and implemented inspection and preventive maintenance programs for all the cyanide facilities including: cyanide unloading, mixing and storage facilities; the mills; the cyanide destruction plants; the paste plants; the effluent plant; and the Tailings Management Areas (TMAs) (including all ponds and wetlands).

In 2023, RLO streamlined the process for evaluating changes to cyanide facilities to ensure the current processes of safe management and handling of cyanide, by incorporating the processes into the platform INX. The INX platform facilitates and tracks the review, agreement and sign-off by the processing, safety, maintenance, and environmental managers, as well as other department managers if relevant to the proposed change. The process was reviewed in the INX platform.

RLO has various procedures and plans to address contingency actions for various scenarios related to cyanide, including: leaks and/or tank ruptures inside the mills; spills of solid cyanide during transportation; fires inside the mills; pipe/valve ruptures; cyanide destruct system failure; power outages; detoxification process upsets and failure; overtopping of TMAs and ponds; and temporary closure or cessation of operations. In addition, RLO has procedures in place for temporary cessation and periods of inactivity of operations and the safe management of cyanide and cyanide facilities.

Inspections of the cyanide facilities are conducted on a shift, daily, weekly, monthly and annual basis at CC and RLC. These inspections are sufficient to assure and document that the cyanide facilities are functioning within the design parameters. Inspections are documented on operator reports and inspection forms. The documentation includes the name of the inspector, date and observed deficiencies. It is the auditor's professional opinion that the site inspects cyanide facilities on a frequency that is sufficient to assure and document that they are functioning within design parameters.

RLO inspects unloading, storage, mixing, process, and tailings areas at both the CC and RLC. Tanks are inspected visually during the weekly operational and cyanide inspection and annually Non-destructive testing is conducted on all cyanide tanks including the detox tanks and the paste plants' tanks. Secondary containments are inspected visually by the mill operations personnel every shift and as part of the weekly operational and cyanide inspections. Pipelines, valves, and pumps are inspected visually during the weekly operational, cyanide, and tailings inspections. Tailings ponds are inspected daily for wildlife, water levels, freeboard, run-on diversions, tailings pipelines, and adverse conditions. In addition, RLO commissions the engineer-of-record to conduct dam safety inspections.

RLO utilizes the software Pronto to manage the preventative (scheduled) maintenance and corrective (unscheduled) maintenance to ensure that equipment and devices function as necessary for safe cyanide management. During the field verification review of the maintenance cyanide related workorders for the audit period.

RLO has redundant (standby) units for critical equipment and spare parts in the warehouse such as pumps and due to this there is not a specific preventive maintenance frequency determined for the pumps. If a pump fails, it will be immediately replaced by its spare part.

RLO receives electrical power via a single line from the Ear Falls hydropower plant. In the event of disruptions to this source, RLO has provided emergency generators at the CC and the RLC. There are two 1 Mega Watt (MW) generators for the CC that will run critical equipment in the mill and paste plant. There are also two generators for the RLC that will run critical equipment in the mill (0.5 MW) and the paste plant (0.25 MW). The generators were routinely tested and maintained during the recertification period.

Standard of Practice 4.2	**Introduce management and operating systems to minimize cyanide use, thereby limiting concentrations of cyanide in mill tailings.**

The operation is	☒ **in full compliance with**	**Standard of Practice 4.2**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.2, requiring the operation to introduce management and operating systems to minimize cyanide use, thereby limiting concentration of cyanide in mill tailings.

RLO conducted an initial evaluation of cyanide addition rates at the CC Mill and the RLC Mill in 2010 and updated that initial study in 2013. No changes in ore characteristics have occurred since the previous 2021 Recertification Audit. RLO conducted a study to evaluate the optimization of leaching parameters in terms of gold recovery including cyanide consumption and pH in August 2016. The evaluation was conducted based on three different cyanide concentrations, different values of pH, and percent solids as input data. The study also served to confirm or adjust the cyanide targets being used at the mills at the time of the evaluation.

RLO has determined, through operations and past studies, an optimal cyanide concentration for gold recovery. Currently, the cyanide addition target rates are based on previous studies, the feed ore grades and the final tailings (pre-detox) cyanide concentration. The target addition rates vary and are based on maintaining a tailings (pre-detox) cyanide concentrations at a minimum target level.

RLO tests the CC mill and RLC mill cyanide solutions, including the pre-detox tailings, multiple times per shift. Cyanide addition rates are adjusted to maintain the target pre-detox cyanide concentration.

Standard of Practice 4.3	**Implement a comprehensive water management program to protect against unintentional releases.**

The operation is	☒ **in full compliance with**	**Standard of Practice 4.3**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.3, requiring the operation to implement a comprehensive water management program to protect against unintentional releases.

RLO has developed and implemented a comprehensive, probabilistic water balance. The model is comprehensive in that it includes: tailings deposition rates; available storage volume based on annual bathymetric surveys; precipitation, evaporation and extreme events; undiverted run-on; spring snowmelt; treatment systems; and losses to seepage. The model does not include power outages because the effects would be negligible given that the pumped inflow and outflow would simply stop and, in any case, those rates are low relative to the large solution storage volumes available (i.e., these tailings ponds are unlike heap leach pads that naturally continue to drain when there is a power outage).

The model is comprehensive in that it includes tailings deposition rates; available storage volume based on annual bathymetric surveys; precipitation and evaporation; undiverted run-on; spring snowmelt; treatment systems; and losses to seepage. The model does not include power outages because the effects would be negligible given that the pumped inflow and outflow would simply stop.

The model is probabilistic in that it can be run using measured and average precipitation as well as extreme dry and/or wet scenarios for multiple return periods. In addition, selected extreme events are included.

Operating procedures incorporate inspection and monitoring activities to implement water balance and prevent overtopping of the impoundments and ponds. RLO conducts inspections of the pond water levels, run-on diversions, and dam conditions daily to implement the water balance.

The design freeboard is specified in the CC and RLC OMS Manuals and ERPs for each TMA.

The operation measures precipitation compares results to design assumptions and revises operating practices, as necessary. RLO installed a weather station near the CC TMA wetland discharge location in 2020. This station was installed in anticipation of the closure of the Red Lake Airport weather station and has been used in updates to the water balance model. RLO has conducted periodic reviews of the precipitation collected onsite against the precipitation data collected at the Red Lake Airport station in order to identify any possible reading errors and/or significant differences in data. The water balance is updated to include the site meteorological monitoring data.

Standard of Practice 4.4	**Implement measures to protect birds, other wildlife and livestock from adverse effects of cyanide process solutions.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 4.4**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.4, requiring the operation implement measures to protect birds, other wildlife and livestock from adverse effects of cyanide process solutions.

RLO has implemented cyanide neutralization as a primary means to maintain WAD cyanide concentrations below 50 mg/L in open waters at the CC and RLC TMAs. In addition, RLO has also installed fencing to limit wildlife access in certain areas of the TMAs. WAD cyanide in open waters at the CC and RLC TMAs are well below 50 mg/L.

Analytical data for the cyanide facilities (open water and discharge points) at the CC and RLC TMAs indicated that WAD cyanide concentrations in these facilities did not exceed 50 mg/L during the Recertification Audit.

RLO inspects daily for wildlife mortality at the CC and RLC TMAs and data indicates that no cyanide related wildlife mortalities have occurred during the recertification period.

RLO does not have a heap leach facility.

Standard of Practice 4.5	**Implement measures to protect fish and wildlife from direct and indirect discharges of cyanide process solutions to surface water.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 4.5**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.5, requiring the operation implement measures to protect fish and wildlife from direct or indirect discharges of cyanide process solutions to surface water.

RLO discharges seasonally from May to October directly to Balmer Lake from the CC TMA (at "Wetout") and from the water treatment plant at the RLC TMA ("G2").

WAD cyanide levels for both direct discharges were less than 0.5 mg/L throughout the recertification period.

Regulatory authorities have established compliance points for the direct discharges from the CC and RLC TMAs to Balmer Lake. Total cyanide (includes free Cyanide) levels at the discharge compliance points were below 0.022 mg/L.

RLO has the potential for indirect discharges to surface water from the CC and RLC TMAs.

Due to a groundwater divide underlying the Main Tailings Pond, the CC TMA may indirectly discharge to Balmer Lake. The RLC TMA may indirectly discharge to Balmer Lake from the adjacent Secondary Pond. Analytical data indicates that total cyanide (includes free cyanide) at all monitoring locations were protective of fish and wildlife.

RLO is not engaged in any remedial action no evidence was observed to indicate cyanide concentrations in surface water have risen above levels protective of a designated beneficial use for aquatic life.

Standard of Practice 4.6	**Implement measures designed to manage seepage from cyanide facilities to protect the beneficial uses of ground water.**

The operation is

- ☒ in full compliance with
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 4.6

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.6, requiring the operation implement measures designed to manage seepage from cyanide facilities to protect the beneficial uses of groundwater.

RLO has constructed its tailings dams at both the CC and RLC TMAs with low permeability, compacted clay cores, and installed tailings pipelines in secondary containment. In addition, RLO has installed several monitoring wells immediately downgradient of the CC and RLC process facilities in order to monitor groundwater and detect potential impacts from cyanide.

The beneficial use of groundwater has been identified by the operation as ”drinking water”. The Province of Ontario has not established groundwater protection levels for any cyanide species for the RLC TMA. However, the Province of Ontario has established an alert level of 0.025 mg/L for free cyanide in groundwater for the CC TMA. If this protective level is exceeded in more than 50% of the sentinel wells in more than 50% of the samples in 3 consecutive monitoring events, a biological risk assessment is recommended by the Province of Ontario (as indicated in the Campbell Complex, Monitoring Framework: Updated to Groundwater Monitoring Plan and Leachate Contingency Plan, February 2020).

The Province of Ontario has established an alert level of 0.025 mg/L for free cyanide in groundwater for the CC TMA. If this protective level is exceeded in more than 50% of the sentinel wells in more than 50% of the samples in 3 consecutive monitoring events, a biological risk assessment is recommended by the Province of Ontario (as indicated in the Campbell Complex, Monitoring Framework: Updated to Groundwater Monitoring Plan and Leachate Contingency Plan, February 2020). Monitoring results for the recertification period did not trigger this requirement.

RLO uses paste backfill from the CC and RLC Paste Plants for backfill in the underground workings and the potential impacts to worker health and beneficial uses of groundwater have been evaluated and measures have been implemented as necessary to address them. Given that RLO reduces cyanide to low levels via their SO2/Air cyanide destruct circuits at both mills before the tailings arrive at their respective paste plants, the levels of cyanide in the backfill are also low. Nonetheless, RLO performed sampling in the underground workings from sumps and areas where workers are pouring, or recently have poured, backfill. Sampling was conducted for WAD cyanide and HCN gas during the recertification period to evaluate potential impacts to workers and to groundwater. Results obtained are protective of workers and groundwater.

In addition to the analytical data, annual groundwater monitoring reports were reviewed and found to be consistent with past reporting and indicate that total cyanide, as a surrogate for WAD cyanide, has not exceeded levels considered to be protective of identified beneficial uses of the groundwater.

Standard of Practice 4.7	**Provide spill prevention or containment measures for process tanks and pipelines.**

The operation is	☒	**in full compliance with**	**Standard of Practice 4.7**
	☐	in substantial compliance with	
	☐	not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.7 requiring that the operation provide spill prevention or containment measures for process tanks and pipelines.

RLO has spill containment measures for all mixing, distribution, and process solution tanks at the CC Mill and the RLC Mill. At the CC three modifications to containment were completed since the last audit: 1) Addition of two CIL tanks, 2) addition of a CIP tank, and 3) addition of a third detox tank. The containments are sized to hold a volume greater than 110% of the largest tank within the containment and provide an impermeable barrier between the tanks and the environment. The operation does not have any cyanide process tanks without secondary containment.

RLO has implemented procedures to prevent discharge to the environment of any cyanide solution or cyanide-contaminated water that is collected in the secondary containment area. The mixing and distribution tanks at both mills have their own sumps with pumps to return any spills of reagent grade solution to the tanks. All other process tanks at both mills have sumps and/or flow-through capability with ultimate containment provided by the mill floors. The sump pumps for the cyanide storage and distribution tanks as well as for process tanks at both mills have level sensors to automatically operate the pumps, which in turn are monitored from the control rooms.

RLO has constructed all cyanide process solution pipelines and tailings pipelines as pipe-in-pipe or within concrete secondary containment or geomembrane-lined ditches as secondary containment systems. A short stretch (i.e., 50 feet) of the tailings pipeline leaving the RLC paste plant is underground without pipe-in-pipe containment. The area is equipped with video observation as spill prevention, and in any case, the natural slope of the ground would direct spills to an adjacent stormwater pond allowing timely identification of leaks.

Areas where cyanide pipelines present a risk to surface water have been evaluated for special protection needs. The tailings pipeline from the RLC paste plant to the RLC TMA crosses over Balmer Creek, a perennial watercourse. This pipeline segment is a pipe-in-pipe system.

All cyanide-related tanks and pipelines are constructed of materials compatible with cyanide and high pH, such as mild steel, stainless steel, and high-density polyethylene.

Standard of Practice 4.8	**Implement quality control/quality assurance procedures to confirm that cyanide facilities are constructed according to accepted engineering standards and specifications.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 4.8**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.8 requiring that operations implement quality control/quality assurance procedures to confirm that cyanide facilities are constructed according to accepted engineering standards and specifications.

RLO provided evidence of construction QA/QC programs during the 2021 Recertification Audit for the cyanide facilities existing at that time.

These records were available on site. There has been new construction projects at cyanide facilities since the previous Recertification Audit: The CIL, CIP, and Detox modifications were completed and documented. The construction reports included as-built drawings, construction photos, material compatibility, and quality control measures taken during construction. The report was signed by a licensed professional engineer of the Province of Ontario.

Standard of Practice 4.9	**Implement monitoring programs to evaluate the effects of cyanide use on wildlife, and surface and ground water quality.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 4.9**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 4.9 requiring that operations implement monitoring programs to evaluate the effects of cyanide use on wildlife, surface and groundwater quality.

RLO has developed written procedures for monitoring activities including surface water, groundwater and wildlife. The procedures were developed by qualified RLO staff with environmental science backgrounds and appropriate levels of experience.

The monitoring procedures specify the details of where, how, and when samples should be taken, sample preservation techniques, shipping instructions, chain of custody procedures and cyanide species to be analyzed.

The RLO Surface Water Sampling Procedure and the Groundwater Sampling Procedure contain step-by-step instructions for sampling procedures including photos. RLO uses laboratories accredited by the Canadian Association for Laboratory Accreditation throughout the recertification period for analysis of free, WAD, and total cyanide.

RLO sampling staff note sampling conditions during groundwater and surface water sampling activities.

RLO monitors for cyanide in discharges to surface water and in surface and groundwater downgradient of the operation. Groundwater is monitored at numerous wells around the site.

RLO monitors wildlife daily throughout the year.

Groundwater and surface water monitoring are completed at frequencies adequate to characterize each medium. Groundwater is monitored quarterly, while surface water is monitored at variable frequencies from weekly to monthly depending on the location. Wildlife activities and mortalities are inspected as part of the daily tailing's inspection conducted on open waters at the TMAs.

PRINCIPLE 5 - DECOMMISSIONING

Protect communities and the environment from cyanide through development and implementation of decommissioning plans for cyanide facilities.

Standard of Practice 5.1	**Plan and implement procedures for effective decommissioning of cyanide facilities to protect human health, wildlife, livestock, and the environment.**

The operation is	☒	**in full compliance with**	**Standard of Practice 5.1**
	☐	in substantial compliance with	
	☐	not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 5.1 requiring that the site plan and implement procedures for effective decommissioning of cyanide facilities to protect human health, wildlife and livestock.

The operation has developed written procedures to decommission cyanide facilities at the cessation of operations. RLO commissioned consultants to prepare a mine-wide closure plan that covers both the RLC and CC. A December 2013 revision of the closure plan incorporates comments from the Northern Development and Mines.

The plan includes an implementation schedule for decommissioning activities.

RLO reviewed its decommissioning procedures for cyanide facilities in 2021 and 2023. The 2023 update was under agency review at the time of this audit.

Standard of Practice 5.2	**Establish an assurance mechanism capable of fully funding cyanide-related decommissioning activities.**

The operation is	☒	**in full compliance with**	**Standard of Practice 5.2**
	☐	in substantial compliance with	
	☐	not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with the Standard of Practice 5.2 requiring that the site establish an assurance mechanism capable of fully funding cyanide related decommissioning activities.

The operation has developed an estimate of the cost to fully fund third party implementation of the cyanide-related decommissioning measures as identified in its Plan. The Asset Retirement Obligation (ARO) spreadsheet contained in the Plan provided the basis for the costs. The 2020 and 2022 ARO spreadsheets are based on using third party contractors for implementation of the decommissioning activity.

The operation reviews and updates the cost estimate at least every five years and when revisions to the plan are made that affect cyanide-related decommissioning activities. RLO provided 2013 versions of the closure plan, and the 2020 updates were provided as evidence that the decommissioning and demolition costs are periodically reviewed and revised. In addition, RLO updates the ARO spreadsheet annually according to Evolution's policy. The applicable regulatory agency has accepted a letter of credit issued by the Bank of Montreal on behalf of Evolution Mining Gold Operations Limited. The letter of credit amount exceeds the estimates for decommissioning and demolition of mill equipment at both complexes.

PRINCIPLE 6 – WORKER SAFETY

Protect workers' health and safety from exposure to cyanide.

Standard of Practice 6.1	**Identify potential cyanide exposure scenarios and take measures as necessary to eliminate, reduce and control them.**

The operation is	☒	**in full compliance with**	**Standard of Practice 6.1**
	☐	in substantial compliance with	
	☐	not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The site is in full compliance with Standard of Practice 6.1 requiring that the site identify potential cyanide exposure scenarios and take measures as necessary to eliminate, reduce and control them.

RLO has developed standard operating procedures (SOPs) that describe how cyanide-related tasks are to be performed to minimize worker exposure. The SOPs describe related hazards, minimum PPE requirements, operator responsibilities, decontamination procedures, procedures for using and handling cyanide, and documentation.

Pre-work inspections are undertaken before every shift using a 5-point card, which prompts the completion of a field-level risk assessment based on the task and a workplace inspection.

RLO solicits worker input in developing and evaluating health and safety procedures via direct communication with supervisors and workers during safety meetings. An Occupational Health & Safety representative who is a worker representative is involved in all reviews of SOPs. The representative and supervisors ask for worker input during safety meetings, and in the performance of job task observations (JTO).

Standard of Practice 6.2	**Operate and monitor cyanide facilities to protect worker health and safety and periodically evaluate the effectiveness of health and safety measures.**

The operation is	☒	**in full compliance with**	**Standard of Practice 6.2**
	☐	in substantial compliance with	
	☐	not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 6.2 requiring that the site operate and monitor cyanide facilities to protect worker health and safety and periodically evaluate the effectiveness of health and safety measures.

RLO has determined the appropriate pH for limiting the evolution of HCN gas during mixing and production activities. At CC and RLC, the pH is maintained at least at 12.5 for mixing activities, diminishing to 10.5 to 10.8 throughout the production processes.

RLO has identified areas and activities where workers may be exposed to cyanide and has developed PPE requirements for each relevant procedure. Some procedures also require the use of a portable HCN meter during the task. RLO has also installed fixed HCN monitors in areas where the potential exists for cyanide exposure.

The fixed HCN meters have visual and audible alarms that alert at 2.5 ppm HCN and at 4.7 ppm HCN. At 2.5 ppm, an alarm and amber light are activated in the work area and the control room. When the HCN alarm level of 2.5 ppm is triggered, personnel are required to investigate the cause of the elevated HCN and make

operational adjustments to reduce HCN levels. At 4.7 ppm, a red light and alarm are activated, and evacuation is required. HCN monitoring equipment is maintained, tested and calibrated as directed by the manufacturer, and the records (checklists, workorder, inspections, and calibration) are retained for at least three years. The portable HCN meters have audible alarms that alert at 2.5 ppm HCN and at 4.7 ppm HCN. At 2.5 ppm, an audible alarm is activated, and personnel are required to investigate the cause of the elevated HCN and make operational adjustments to reduce HCN levels. At 4.7 ppm, an audible alarm is activated, and evacuation is required.

Warning signs prohibiting open flames, smoking, food and drink are posted at the entrance to all cyanide facilities, and areas where cyanide is present. RLO has also posted signage for PPE requirements located at the entrances of process areas.

The purchase contracts between RLO and Draslovka state that the Seller (i.e., Draslovka) is responsible for the addition of colorant dye. The auditor reviewed the site safety data sheets (SDS) for liquid cyanide which indicated that the liquid cyanide color was red.

Safety showers, low-pressure eye wash stations and dry chemical fire extinguishers are located at strategic locations throughout RLO and are maintained, inspected and tested on a regular basis.

All piping and tanks containing cyanide process solutions, including unloading, storage, mixing and process tanks and pipes, are marked as containing cyanide and, in the case of reagent grade cyanide tanks and pipes, are painted with purple paint. Pipe labelling also indicates the direction of solution flow. SDSs for liquid and solid sodium cyanide are maintained in an online SDS system, and cyanide emergency response procedures have been posted at several locations in the workplace.

RLO has implemented a procedure throughout the recertification period to investigate and evaluate potential cyanide exposure incidents to determine the adequacy of the operation's programs and procedures to protect worker health and safety, and to respond to cyanide exposures.

During this audit period RLO has not experienced a health or safety incident requiring the use of the investigation and external reporting process. Based on interviews with site personnel the site has not experienced a significant worker health or safety incident.

Standard of Practice 6.3	**Develop and implement emergency response plans and procedures to respond to worker exposure to cyanide.**	
The operation is	☒ **in full compliance with** ☐ in substantial compliance with ☐ not in compliance with	**Standard of Practice 6.3**

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 6.3 which requires that the site develop and implement emergency response plans and procedures to respond to worker exposure to cyanide.

RLO has water, oxygen, resuscitators, cyanide antidote kits (Cyanokits), Amyl Nitrite, radios, and telephones at key locations to be available for use in the event of emergencies.

The Amyl Nitrite can be administered by a trained first responders, while the Cyanokits must be administered by either the Site nurse, or a responding paramedic, all of whom have received training in the administration of Cyanokits. Oxygen cylinders and Amyl Nitrite are available for deployment by first responders before the Cyanokit is deployed. RLO has nursing stations in CC and Balmer Complex, with a nurse providing coverage on day shifts and on call during weekends and at night to provide 24-hour coverage. The operation has developed procedures for responding to and transporting workers exposed to cyanide to Red Lake Hospital.

The operation inspects its first aid equipment regularly to ensure that it is available when needed, and that materials are stored and/or tested as directed by their manufacturer and replaced on a schedule to ensure that they will be effective when needed.

RLO has developed specific written emergency response plans and procedures to respond to cyanide exposures (ingestion, inhalation, absorption through skin and eyes). These procedures describe emergency response actions including the location of emergency response equipment, cyanide exposure treatment, directions for decontamination, and emergency communication protocols.

RLO maintains on-site capability to provide first aid and medical assistance to workers exposed to cyanide. RLO has nursing stations in CC and Balmer Complex, with one nurse providing coverage on day shift Monday through Friday, and on call during weekends and nights.

RLO has a formalized agreement with the local hospital, that acknowledges the presence of cyanide at RLO and states the hospital's preparedness to treat cyanide exposure victims. The hospital maintains a CYANOKIT® in the Emergency room and provides in-house training on the use of the kit, as well as the recognition of cyanide exposure. The hospital inspects the kit and RLO replaces the kit as necessary.

RLO is confident that the medical facility at Red Lake Hospital is adequate, has qualified staff, equipment and expertise to respond to cyanide exposures.

PRINCIPLE 7 – EMERGENCY RESPONSE

Protect communities and the environment through the development of emergency response strategies and capabilities.

Standard of Practice 7.1 **Prepare detailed emergency response plans for potential cyanide releases.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 7.1

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.1 which requires that the site prepare detailed emergency response plans for potential cyanide releases.

RLO has developed several plans and procedures that address cyanide exposures and releases including potential cyanide failure scenarios relevant to RLO such as spills (solid and liquid), fires, power outages, system failures, overtopping of ponds, pipes/valves/tank ruptures, worker exposure, and transportation events. The RLO plans and procedures describe appropriate preparedness, response and treatments, evacuation and decontamination procedures for the relevant scenarios. All releases are also investigated such that preventive actions may be identified to reduce the risk of future occurrences.

Responsibility for cyanide rests with Draslovka throughout the transport until it is unloaded into the cyanide warehouse. The transporter, Empire, is certified as fully compliant with the Code and has met the requirements associated with this Standard of Practice to obtain their certification.

Standard of Practice 7.2 **Involve site personnel and stakeholders in the planning process.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 7.2

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.2, which requires that the site involve site personnel and stakeholders in the planning process.

RLO solicits worker input in developing and evaluating emergency response procedures via direct communication to supervisors and during pre-shift safety meetings and monthly safety meetings. An Occupational Health & Safety representative who is a worker representative is involved in all reviews of procedures.

A 2020 letter from the Red Lake District Fire Chief was reviewed that confirmed he was provided with and reviewed a copy of the Surface Spill Response Plan. The Fire Chief is the emergency response coordinator for the community and communicates on emergency preparedness matters with the community, through public town council meetings. Several members of the RLO emergency response team are also members of the community emergency response teams.

RLO maintains an ongoing dialogue with the Red Lake Hospital in regard to cyanide emergency response preparedness. Representatives from RLO have visited the nearest school and spoken about the Emergency Response Plan and the actions to be taken in the event of an evacuation.

RLO regularly, and at least annually on a formal basis, consults with the Red Lake Fire Chief about emergency response planning and preparedness.

Standard of Practice 7.3	**Designate appropriate personnel and commit necessary equipment and resources for emergency response.**

The operation is

- ☒ in full compliance with
- ☐ in substantial compliance with **Standard of Practice 7.3**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.3 which requires that the site designate appropriate personnel and commit necessary equipment and resources for emergency response.

RLO has developed plans and procedures that describe the authorities and responsibilities for emergency response, as well as specific duties for implementing cyanide response.

An incident Control Group is described in the Surface Spill Response Plan, and RLO has also identified minimum representation required on the emergency response Team, with current team member names and contact information. Training for emergency responders includes coverage of all cyanide-related emergency procedures. The role of outside responders is described, including the fire department, paramedics, police officers, and the hospital. Reference is also made to the Municipality of Red Lake Emergency Plan.

The site has developed callout procedures for initiating a cyanide related response. This procedure includes information and the 24-hour contact information for team members and the emergency coordinators.

Emergency response equipment is identified in the cyanide related emergencies procedures. Inspection procedures for this and other emergency equipment is conducted in accordance with several procedures and checklists.

The Red Lake Fire Chief maintains the Municipality of Red Lake Emergency Plan and is the coordinator of information transfer between the various emergency responders in the community. Through consultation and planning with the Fire Chief, RLO has also consulted and coordinated with other emergency response agencies in the community. A November 2020 letter was viewed which showed the Fire Chief was aware of and had reviewed the Surface Spill Response Plan, although it is understood that communication with Fire Chief is frequent and not always documented.

RLO takes part in drills related to the Municipality of Red Lake Emergency Response Plan. External responders may be invited to RLO mock drill events as well but are not often able to attend. However, several members of the RLO emergency response Team are also members of the community emergency response teams, and therefore attend RLO mock drills in an unofficial manner.

RLO maintains an ongoing dialogue with the Red Lake Hospital in regard to cyanide emergency response preparedness, and the role of the hospital in response to cyanide emergencies.

Standard of Practice 7.4	**Develop procedures for internal and external emergency notification and reporting.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with **Standard of Practice 7.4**
- ☐ not in compliance with

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.4 which requires that the site develop procedures for internal and external emergency notification and reporting.

RLO response plans include procedures and contact information for notifying Evolution management, the Emergency Response Team, Government Agencies, Municipal Fire Department, the ambulance and hospital, local

police, Draslovka, and community representatives including First Nations contacts. The Plans also makes reference to the Red Lake Municipal Emergency Plan, with contact information and notification procedures for all other community response agencies and procedures for communicating with the media.

The Surface Spill Response Plan includes specific protocols to provide the ICMI with an initial report of a cyanide event. The protocol includes reporting within 24 hours by phone or email. The protocol also includes the ICMI reporting number and email. Additionally, an outline of required information to properly report to ICMI is provided. No significant events, as defined by ICMI, have occurred at the site during this audit cycle.

Standard of Practice 7.5	**Incorporate remediation measures and monitoring elements into response plans and account for the additional hazards of using cyanide treatment chemicals.**

The operation is	☒ **in full compliance with**	**Standard of Practice 7.5**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the basis for this Finding/Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.5 which requires that the site incorporate remediation measures and monitoring elements into response plans and account for the additional hazards of using cyanide treatment chemicals.

The Surface Spill Response Plan has specific remediation measures for the cyanide release scenarios, including affected soils, standing water, recovery of spilled solid cyanide, and treatment of residuals following remediation. The plan permits the use of lime or sodium carbonate to treat liquid or solid residuals, but prohibits the use of sodium hypochlorite, ferrous sulphate, or hydrogen peroxide for releases to water. RLO procedures require the treatment or removal of all contaminated soils affected by a release. Generic sampling plans have been developed for cyanide spills. Recovered residuals will be excavated until the desired endpoint for cyanide is reached. Liquid and solid residuals are to be placed in the Tailings Management Area.

Bottled water is to be supplied in the event of cyanide contamination of drinking water supplies, although pathways to the potable water supply (at Cochenour, upgradient of RLO) are unlikely.

The Surface Spill Response Plan requires that contaminated water and/or soils are monitored as necessary after a cyanide spill. In addition, it provides detailed procedures for water and soil sampling including methodologies, parameters, which laboratory to be used, and possible sampling locations.

Standard of Practice 7.6	**Periodically evaluate response procedures and capabilities and revise them as needed.**

The operation is	☒ **in full compliance with**	**Standard of Practice 7.6**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 7.6, which requires the site to periodically evaluate response procedures and capabilities and revise them as needed.

The RLO emergency response plans were reviewed for adequacy and updated in 2023 or 2024 and are scheduled for updates every one or two years depending on the scope of the previous update. Emergency response plans may be reviewed more frequently if required. Each document includes a "Published" date and a "Next Review"

date indicating the date the Plan was implemented and the date of the next scheduled review.

RLO conducts mock drill events, testing the entire emergency response process, for cyanide spills and exposures, including tabletop exercises and full mock drills in the field annually. Records of the mock drill events showed that corrective or preventive actions had been identified as a result of learnings from the drill events.

RLO has procedures in place to evaluate and revise its emergency response plans and procedures following cyanide related emergencies and following a mock drill. The mock drill reports and tabletop exercise reports provided evidence of corrective actions taken as a result of lessons learned in the drill.

PRINCIPLE 8 – TRAINING

Train workers and emergency response personnel to manage cyanide in a safe and environmentally protective manner.

Standard of Practice 8.1	**Train workers to understand the hazards associated with cyanide use.**

The operation is	☒ **in full compliance with**	**Standard of Practice 8.1**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 8.1 which requires that the site train workers to understand the hazards associated with cyanide use.

RLO provides initial and annual training to all site personnel who may encounter cyanide. General Orientation Training is provided to all employees, visitors, and contractors upon first arrival at the site and is refreshed annually. This training includes cyanide awareness, hazard recognition, identification, coloring and signage, points of use, and exposure routes and risks. General emergency response information is reviewed. Information on the ICMC is also provided. Mill Induction Training is given to all mill, tailings, and maintenance employees except maintenance electrical workers.

All mill employees also receive training during annual mill safety training that includes the Mill Induction cyanide training presentation as refresher training.

RLO retains employee training records in an electronic system using the INX platform.

Standard of Practice 8.2	**Train appropriate personnel to operate the facility according to systems and procedures that protect human health, the community and the environment.**

The operation is	☒ **in full compliance with**	**Standard of Practice 8.2**
	☐ in substantial compliance with	
	☐ not in compliance with	

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 8.2 which requires that the site train appropriate personnel to operate the facility according to systems and procedures that protect human health, the community, and the environment.

RLO ensures personnel receive training, prior to working with cyanide by themselves, for all cyanide-related

standard operating procedures, as required for their role. Training elements for each specific job are identified in the training modules developed for each specific process area. Mill Common Core training covers much of the training required, and covers mill induction, work safety, reagents handling, lock out/tag out, and mill orientation. Additional specialized training is provided for some cyanide tasks such as manual sampling, mixing of reagents, operation of leach tanks, and operation of the carbon strip plant. This training follows the mill process circuits.

The training elements necessary for each job involving cyanide management are identified in the training materials. The training materials for Mill Orientation and specialty training were reviewed. The training materials include objectives, safety measures, process descriptions, equipment location and recognition, PPE, hazardous materials, tools, and emergency procedures.

Training at RLO is provided by qualified trainers, including senior mill or safety personnel with many years of experience conducting the tasks that the training pertains to. Train-the-trainer program training has been provided to RLO's supervisors who are responsible for training operators.

RLO provides all employees and contractors with annual safety training, in which cyanide awareness refresher training is included. All mill employees also receive training during annual mill safety training that includes the Mill Induction cyanide training presentation as refresher training.

RLO evaluates the effectiveness of cyanide training by worker testing and observation. Training programs, including General Awareness training and Mill Induction training, are concluded with tests to verify comprehension of the materials, and the test results are retained with the training records.

JTOs are undertaken by supervisors on an ongoing basis to verify that the worker performs the task in accordance with the procedure and their training.

RLO evaluates the effectiveness of cyanide training by worker testing and observation. Training programs, including General Awareness training and Mill Induction training, are concluded with tests to verify comprehension of the materials, and the test results are retained with the training records.

JTOs are undertaken by supervisors on an ongoing basis to verify that the worker performs the task in accordance with the procedure and their training. JTO checklists are used for this purpose by the supervisor. A number of JTO sheets signed by both the worker and the supervisor were reviewed for a number of tasks involving the use of cyanide.

Course records are retained in the INX database, which identifies person conducting the training, the course title and date of course for each employee and contractor and the results of tests associated with the training material. Hardcopy records for most training events and tests are also available.

Standard of Practice 8.3	**Train appropriate workers and personnel to respond to worker exposures and environmental releases of cyanide.**

The operation is

- ☒ **in full compliance with**
- ☐ in substantial compliance with
- ☐ not in compliance with

Standard of Practice 8.3

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 8.3 which requires that the site train appropriate workers and personnel to respond to exposures and environmental releases of cyanide.

RLO personnel responsible for unloading, mixing, production, and maintenance receive the Mill Orientation Training, which covers, in part, the emergency procedures to be followed in the case of a cyanide release. This includes recognition of exposure symptoms, decontamination, and first aid/first response procedures. Monthly safety meetings are used to reinforce training.

The Surface Response Team has an annual training program which includes annual comprehensive spill response

training provided by an external trainer, and monthly procedure/equipment reviews. This training incorporates the identification and proper use of emergency response equipment.

RLO maintains an ongoing dialogue with the Red Lake Hospital in regard to cyanide emergency response preparedness, and the role of the hospital in response to cyanide emergencies.

Annual comprehensive spill response training, and monthly focused emergency response training sessions, are provided to all Surface Response team members.

RLO retains employee training records in an electronic system using the INX platform. Course information in the INX database identifies the trainer, course title and date of training for each employee or contractor and the results of tests associated with the training material. Hardcopy records for most training events and tests are also available.

PRINCIPLE 9 – DIALOGUE & DISCLOSURE

Engage in public consultation and disclosure.

Standard of Practice 9.1	**Promote dialogue with stakeholders regarding cyanide management and responsibly address identified concerns.**	
The operation is	☒ **in full compliance with** ☐ in substantial compliance with ☐ not in compliance with	**Standard of Practice 9.1**

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 9.1 which requires that the site promote dialog with stakeholders regarding cyanide management and responsibly address identified concerns.

RLO provides the opportunity for stakeholders to communicate issues of concerns in a number of ways, from email accounts and hotlines established to receive concerns, to regularly scheduled community and First Nations meetings at which concerns are raised by these stakeholders. The Community Connections Meetings and First Nations meetings target a broad range of stakeholder interests, but any concerned party may contact RLO through the hotline or email accounts, which are provided on business cards and distributed.

Standard of Practice 9.2	**Make appropriate operational and environmental information regarding cyanide available to stakeholders.**	
The operation is	☒ **in full compliance with** ☐ in substantial compliance with ☐ not in compliance with	**Standard of Practice 9.2**

Summarize the Basis for this Finding or Deficiencies Identified:

The operation is in full compliance with Standard of Practice 9.2 which requires that the site make appropriate operational and environmental information regarding cyanide available to stakeholders.

RLO has produced written descriptions of the mine processes and use of cyanide. In addition, RLO has developed a one-page flyer that describes emergency preparedness, environmental impact, and public consultation efforts related to cyanide use. This flyer has been made available to the public at many of the outreach events.

The population is generally literate, and English is the prevalent common language in the community.

RLO provides information on cyanide in written format as well as in verbal format during meetings with stakeholders.

RLO has processes in place should a cyanide exposure or release occur for notification of regulatory agencies, if required. RLO Regulatory entities would require reporting for: cyanide hospitalizations, releases off the mine site, and releases that exceed an applicable standard are required to be reported to regulatory agencies, who make the information on releases and exposures available to the public.