



AGNICO EAGLE

MELIADINE GOLD PROJECT

FRESHET ACTION PLAN

April 2016

DOCUMENT CONTROL

Revision				Pages Revised	Remarks
#	Prep.	Rev.	Date		
01	AGNICO EAGLE	Internal	April 2016	All	

Prepared By: _____

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Approved by: _____

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1 INTRODUCTION

The purpose of this Freshet Action and Incident Response Plan is to ensure that AGNICO EAGLE can address and manage excess water associated with the freshet season at the Meliadine site and to ensure AGNICO EAGLE has implemented specific management and mitigation measures in response to environmental incidents with potential for off-site impacts to water or land.

The freshet season is loosely defined as being a period of time from approximately *May 15 – July 30*; in some cases this period of time can extend up to early fall when freezing re-occurs (October 15). There are many areas around the site that are vulnerable to this excess water; the goal is to identify these areas and develop a clear plan with defined roles and responsibilities (among AGNICO EAGLE Departments), and to manage the freshet flows.

In addition, several guiding principles are applicable to the formation of this plan. The highest priority principles are:

- 1) To ensure that mine contact water from runoff or seepage is managed to prevent adverse environmental impacts;
- 2) To ensure that the health and safety of AGNICO EAGLE employees is protected, especially with respect to mining operations when excess water is present; and
- 3) To make sure the site is in compliance with the Nunavut Water Board (NWB) License, Part D, Item 19 and Part E, Item 10.

The plan will identify the areas of concern and discuss the potential risks as well as mitigation measures necessary to address the identified issues. Section 3 contains the actual defined 2016 procedures, the roles and responsibilities and associated timelines. AGNICO EAGLE's intent is to update the Freshet Action Plan Procedural on a yearly basis. For example, there may be additional mitigation measures for a defined problem area or in some cases a previously defined issue, may be permanently rectified.

At this time the main areas of concern are:

- P1
- Portal Surface Sump
- Portal Sump Lv50
- AWAR
- Exploration Infrastructure Areas

Each area identified above will be discussed in detail below. All areas of concern are considered priorities based on the guiding principles.

2 AREAS OF CONCERN

2.1 P1 AREA

P1 was the initial containment area identified for precipitation events; snow melt or freshet water that had come in contact with the waste rock pile or any infrastructure pertaining to the Meliadine Project surface works in the portal area.

In 2016, AGNICO EAGLE set forth a plan to ensure all surface water originating from snow melt and precipitation, during Freshet, to be collected in one location to ensure capacity and prevent the deposition of any deleterious substance to the surrounding environment.

AGNICO EAGLE reviewed the water management strategy for the P1 surface area water management. It appeared that additional surface water capacity was required to ensure management of: summer storm events and to ensure the existing road and permafrost is maintained during the freshet. Based on this, AGNICO EAGLE decided to increase the capacity of P1 area by adding additional dykes within the existing footprint of P1 and downstream of the road, with staged ponds; see Figure 1. This was done to ensure the additional capacity to protect the permafrost in the roadbed during spring freshet and for water treatment or enhanced evaporation if required.

The P1 containment system will be broken down into three containment areas; Pond 1, Pond 2, and Pond 3. See Figure 1.

2.1.1 Pond 1

Pond 1 will be the main receptacle area for water from sump Lv50. Sump Lv50 is the receptor of all surface water that is attempting to drain into the underground mine. The water from Lv50 will be pumped directly to Pond 1 or via the surface portal sump. The volume of water pumped will be logged on a daily basis. In addition, Pond 1 will also hold water snow melt, rain and water that have been in contact with waste rock. Pond 1 containment is holding the Lake A58 which is the only place allowing snow movement for the portal.

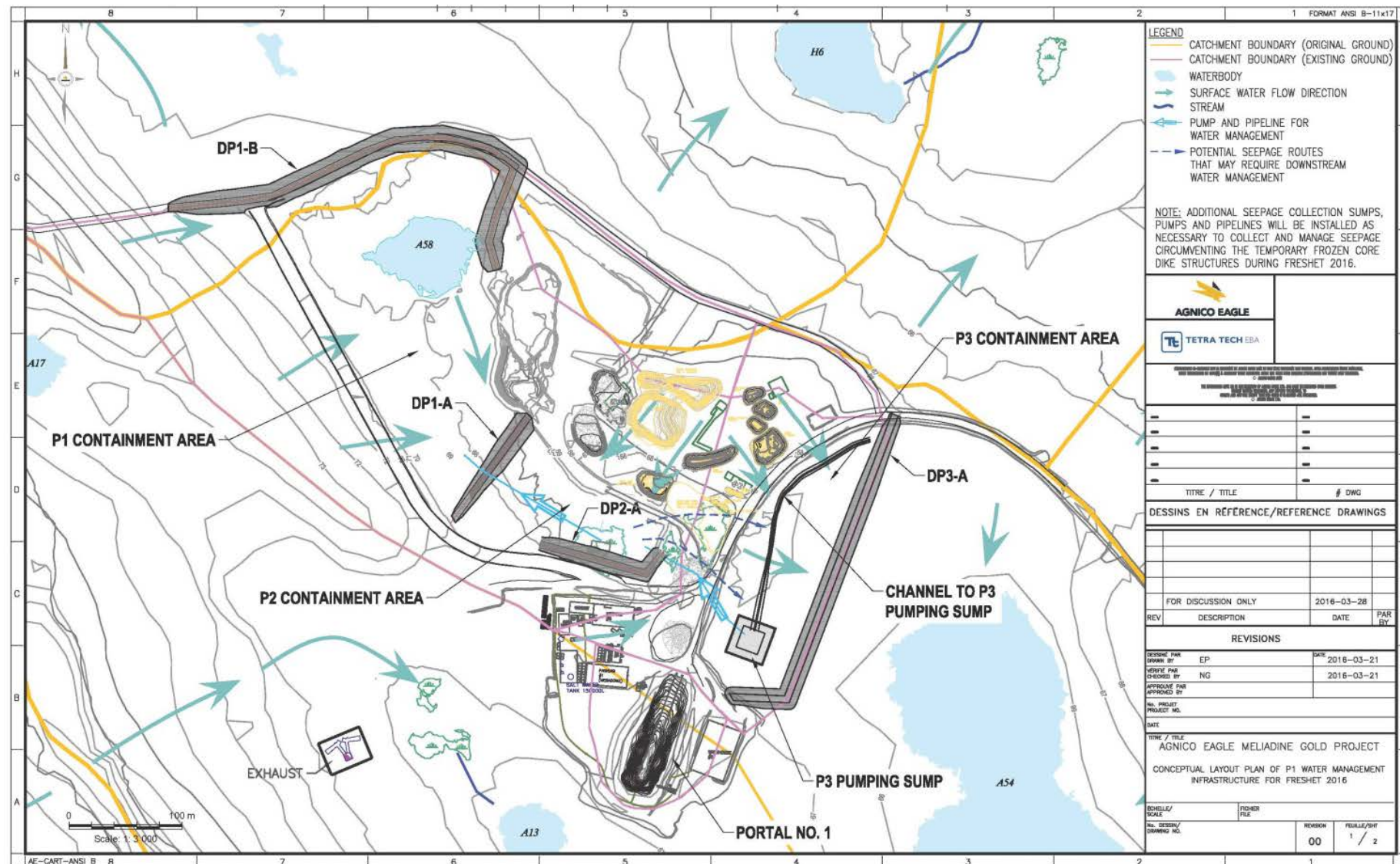
2.1.2 Pond 2

Pond 2 is the second basin of the P1 Containment System; See Figure 1. This basin is in place to increase water management capacity. Due to elevation change between the Pond 1 and Pond 2 area, it was more fundamental to build a tiered system of containment areas to increase the capacity of the cells. Pond 2 will catch snow melt originating from the waste rock and ore piles to the north of the containment. Water from this area (depending on constituents) will be pumped back to Pond 1.

2.1.3 Pond 3

Pond 3 is the last basin before the environment in the Pond 1 Containment System; See Figure 1. This basin is in place to be the last line of defence for water management capacity. Pond 3 will collect surface runoff from the portal surface area, catch snow melt originating from the waste rock and ore piles to the west of the containment. Water from this area (depending on constituents) will be pumped back to Pond 1.

Figure 1 - P1 -- Plan View of New Structures



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2.1.4 P1 AREA RISK MANAGEMENT

The following management practices will be maintained during the freshet period:

- A freeboard of 0.5 m from the lowest point of each dyke will be maintained at all times in all containments.
- Daily visual inspections will be undertaken as to the structural integrity of the containment dykes by Site Services..
- Twice a week a written inspection will be completed by the Environment department in conjunction with the Engineering department.
- Dykes DP1-B and DP3-A (see Figure 1) will have the base of the dykes on the downstream side visually monitored on daily basis for seeps, sedimentation, and erosion. If seepage or water with increased TSS is noted during the inspection, water will be sampled, contained, and pumped back into the P1 Containment System.

2.1.5 P1 AREA CAPACITY MANAGEMENT

With the construction of the P1 containment area, a cumulative capacity of 32,404 m³ will be in place. Periodic pumping of Pond 1, Pond 2, and Pond 3 can be expected to manage capacity, providing water quality meets the required permissible limits. Volumes will be recorded for all pumping.

If water accumulation is noted during winter months (or before freshet), a water sample will be taken to characterize the water and if the water quality is permissible, a volume of water will be released after consultation with Indigenous and Northern Affairs Canada Inspector and only upon direction provided by the inspector. At this time of developing the Freshet Action Plan, it should be noted that proposed effluent criteria is being developed and additional consultation with ECCC; INAC; KIA and NWB will take place to develop the next steps. Once this information is finalized, the final plan of this aspect of the P1 Containment area will be sent under separate cover, with the understanding it would be part of the Freshet Action Plan.

If the water doesn't meet permissible limits, treatment or evaporation of the contained water with evaporators, will be applied and additional water samples will be collected to confirm water quality prior to releasing the water to A54.

Under emergency situations, where the integrity of the dykes are at a high risk, we will notify INAC at requesting an Emergency Directive to discharge the water based on agreed to water quality criteria. The collected water will be sampled and analyzed and INAC will receive a 10 day notice of the proposed discharge. The definition and associated design criteria for managing the integrity of the dykes will be defined by Tetra Tech and will be submitted under separate cover with the understanding that this information will be part of the Freshet Action Plan.

At the very last resort, and not the preferred option by AGNICO EAGLE, water will be pumped underground. This would be a major setback for the underground development; employment and associated contractual obligations.

2.2 Portal Sump

In previous years, the surface portal sump was used to store water coming from Lv50 sump.

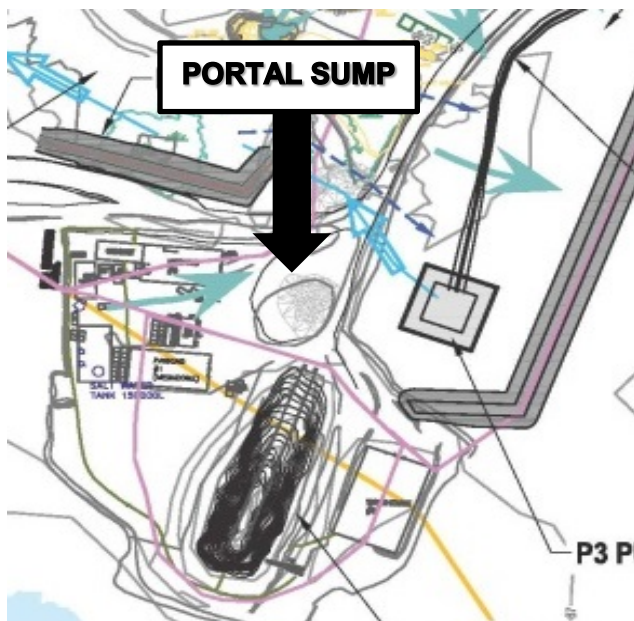


Figure 2 - Surface Portal Sump

This sump was situated just north of the portal entrance and East of the Dome #1 and #3 area. With the increased mining traffic from the portal several safety issues were posed with having a large sump in this busy area and several near misses occurred with Vehicles and the Surface sump. In fall 2015, the vast majority of the surface portal sump was filled in to allow for safer movement of equipment and personnel. Figure 2 shows location of the portal sump.

A small portion of the portal sump was left un-backfilled. This portion was not backfilled to allow some surface storage of water in the case of a need for emergency storage of water that was

unexpectedly intercepted. The area left open was left at a size that if water needed to be stored, a polyethylene liner could just be rolled out on the inside of the structure and create a lined containment without any plastic welding.

The need for this emergency sump will be re-visited after the construction of the P1 containment area, however this sump will remain at least until the P1 containment area is constructed or until a risk assessment deems the sump too high of a risk to personnel.

2.3 Lv50 SUMP – SUMP 1

All snow melt and surface run-off that reports to the portal entrance, which is the lowest point on the Meliadine exploration site, is pumped out of the Lv50 Sump (also known as Sump 1). This sump is located 50 meters down the ramp to the underground workings.

In 2016, all the water from Lv50 Sump will be directly pumped to the P1 containment. The volume of water will be tracked and logged on a daily basis, ensuring to balance the capacity of the containment facility.

2.3.1 Lv50 RISK MANAGEMENT

If the P1 containment area becomes filled to capacity and Lv50 sump still needs to be pumped, the Surface Portal sump will be utilized as an emergency containment. As a last resort, if all surface containments are filled to capacity the Lv50 sump will over flow and be allowed to flood the underground workings to ensure no deleterious substance or waste is released to the receiving environment.

2.4 Landfarm

Snow and ice accumulation within the land farm must be adequately managed to prevent overflow to the environment and/or damage to the liner. The Environmental Department will direct the site services department to pump the containment area once ice/snow begins to melt. Water samples will be taken in accordance with the Water License to ensure compliance prior to its release. A notice must be provided to the Inspector 10 days prior to this pumping activity. Once sample results have been obtained, the Environmental Department will advise the Site Service Department if pumping can begin. If sample results permit, the pumping may begin; to direct water to the tundra/ground in a way to avoid erosion of the tundra.

In the event that the water sample results do not meet discharge criteria, the water will be stored until suitable treatment system can be put in place to remove contaminants. Suitable treatment methods potentially used are as follows:

- Oil/water Separator
- EVAC Waste Water Filter System
- Carbon Filter System

If a suitable treatment system cannot be obtained the water will be pumped to bladders and will be shipped south for disposal in a certified disposal facility.

2.5 All Weather Access Road (AWAR)

The monitoring program for the AWAR is in place to deal with the uncertainties associated with the impact predictions and environmental design features noted in the project description and environmental assessment of the Phase 1 All Weather Access Road (AWAR). To prevent any

negative impacts to the environment surrounding the AWAR, 2 main objectives will continue to be implemented:

A. Compliance inspection

Inspections will include: monitoring the activities, procedures, and programs undertaken to confirm the implementation of approved design standards, mitigation, and conditions of approval and company commitments;

B. Follow-up

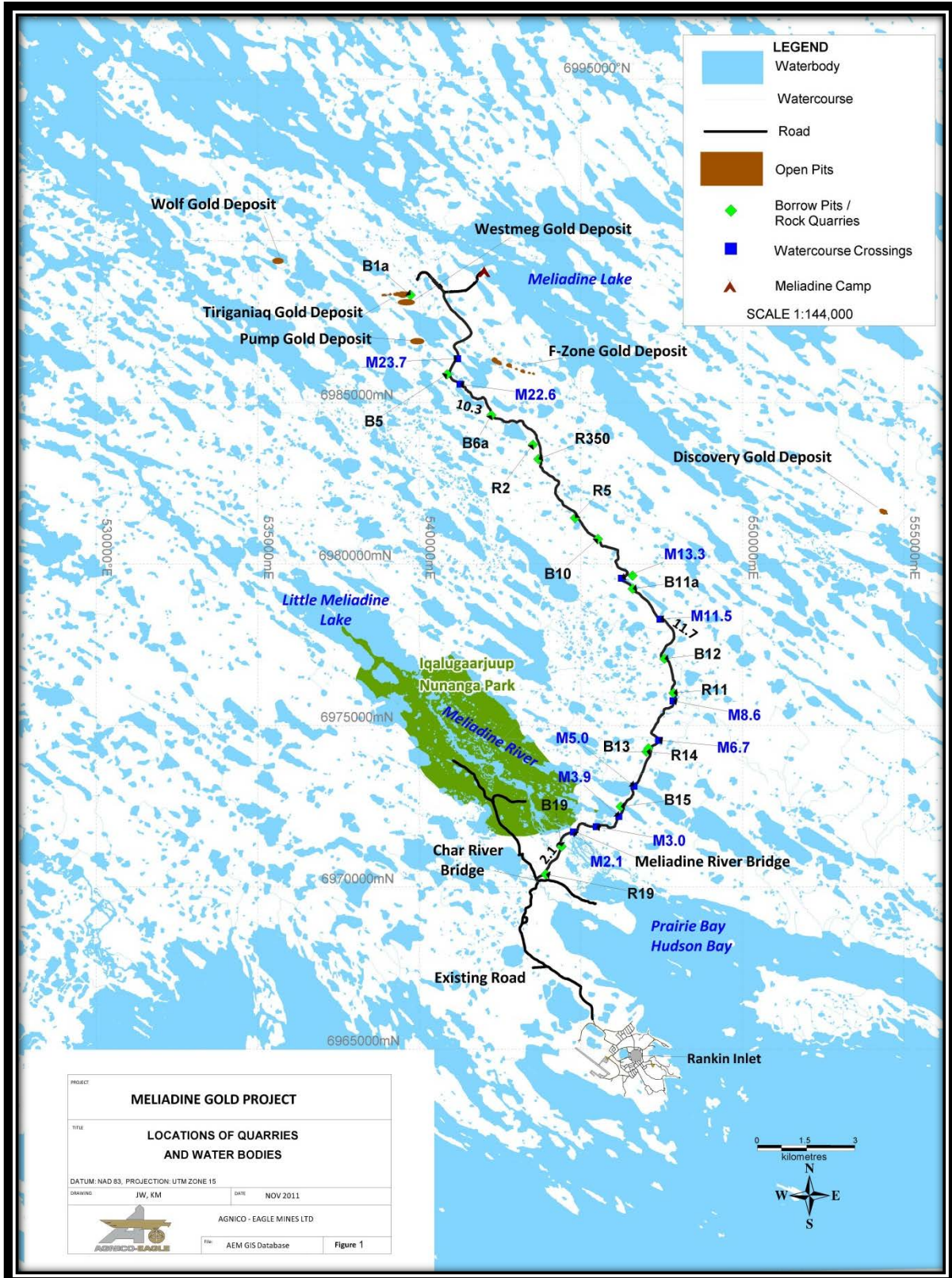
Programs designed to test the accuracy of impact predictions, reduce uncertainty, determine the effectiveness of environmental design features, and provide appropriate feedback to operations for modifying or adopting new mitigation designs, policies, and practices.

2.5.1 AWAR RISK MANAGEMENT

The following management practices will be maintained before and during the freshet period:

- Any large culverts will be steamed out to allow passage of water prior to freshet.
- All water crossings will have snow removed from ice surface on the up and downstream side of the crossing to allow free flow of water.
- Daily visual inspections will be undertaken as to the structural integrity of the abutments and road integrity by the Road Supervisor.
- Weekly throughout freshet and daily during peak flows a written inspection will be completed by the environment department in conjunction with the Site Services department.
- Weekly throughout freshet and daily during peak flows, inspections will be undertaken at all culverts along the AWAR to ensure that water during freshet is flowing freely and no erosion is occurring. If elevated TSS levels are observed sampling will occur and the results assessed.
- Water samples at the following locations will be collected as per 2BW-MEL1215. See Figure 3:
 - Mel-River (M2,1)
 - M3.0
 - M5.0
 - M11.5
 - M23.6
 - In addition: Any *significant* water seeps or water pound in contact with the road will be sample

Figure 3 - All Weather Access Road



2.6 Exploration Infrastructure Areas

The Exploration Infrastructure represent all the building, pads and towers installed during the primary phase of Meliadine project under License 2BB-MEL1424. The monitoring program for the Exploration Infrastructures Areas are in place to deal with snow melting, sediment transport into lakes and streams, thawing, and pad movement. To prevent any negative impacts to the environment surrounding the Exploration infrastructures and pad, the 3 following objectives will continue to be implemented:

1 Compliance Inspection

Inspections will include: monitoring the activities, procedures, and programs undertaken to confirm the implementation of approved design standards, mitigation, and conditions of approval and company commitments;

2 Follow-up

Programs designed to test the accuracy of impact predictions, determine the effectiveness of environmental design features, and provide appropriate feedback to operations for modifying or adopting new mitigation designs, policies, and practices.

3 Sediment Barrier

When sediment migration is possible, predicted or observed, sediment migration equipment will be install to mitigate such happening.

2.6.1 Dome 1-2-3-4 Pads and Surroundings

- Dome 1-2-3-4 will be inspected to witness the water infiltration within domes and how, if any, it's dealt with.
 - If water infiltration is getting in contact with the "presume" contaminated soil in domes, a "water treatment" system will be implemented to mitigate the situation.
- Pad limits will be inspected to witness and report any water run-off or sediment transportation toward lakes and stream.
- Dome 5 was dismantled and a new generator erected in this location, but the contaminated soil is still in place (behind the portal office)
 - Special attention during inspection will be given to this area.

2.6.2 Camp Pad and Surroundings

- Recycling center will be monitored as station Mel-8 (run off water at the back of the scrap steel pile pad)
 - When water pooling is observed, a water sample will be taken as per Licence 2BB-MEL1424 section Section D, Item 14.
- Monitor Landfarm area for Seepage
 - If water is seeping through the containment or if water needs to be pumped out of the landfarm area, the water quality will need to comply with License 2BB-MEL1424, Section D, Item 15 criteria, prior to discharge.
- Dome 7-8-9 Yard and Pads
 - Control for TSS will be monitored at the culvert beside the garage that flows straight to Meliadine Lake. This area will be monitored closely for signs of TSS and preventative measures put in place to prevent any deleterious substance from entering Meliadine Lake.
- Dome 8 and 9 will be inspected for water accumulation in the garage..
 - If water infiltration is getting in contact with the “presumed” contaminated soil in the domes, a “water treatment” system will be implemented to mitigate the situation.

2.6.3 Construction Pad and Access

- One culvert between Lake H12 and H13 will be steamed out prior to freshet and will be monitored closely for TSS.
- New access road going to the industrial pad will be monitored for erosion and TSS loading into surrounding areas. This area will be monitored closely for signs of TSS and preventative measure put in place to prevent any deleterious substance from entering Lake Meliadine.

3 2016 FRESHET ACTION PLAN PROCEDURE

Section	Area of Concern	Role/Action	Responsibilities	Dates
1. ALL WEATHER ACCESS ROAD				
1.1.1	AWAR Culverts	1) Weekly inspection of culverts along AWAR to Rankin Inlet	Env. Department	Before May 15
		2) Sample for TSS and Turbidity if elevated TSS observed.	Env. Department	May - until freeze up
		3) Notify Site Services if severe erosion/scouring observed - for repair action.	Env. Department	May - until freeze up
		4) Install turbidity barriers if required.	Site Services	May - until freeze up
1.1.2	Major Crossing	1) Clean all ice and snow impeding free water flow at all major water crossings	Site Services	Before May 15
		2) Daily visual inspections will be undertaken as to the structural integrity of the abutments and road integrity	Site Services	May - until freeze up
		3) Weekly inspection of major crossings along AWAR to Rankin Inlet to ensure that water during freshet is flowing freely and no erosion is occurring.	Env. Department	May - until freeze up

		5) Sample for TSS and Turbidity if elevated TSS observed.	Env. Department	May - until freeze up
		6) Notify Site Services if severe erosion/scouring observed - for repair action.	Env. Department	May - until freeze up
		7) Install turbidity barriers if required.	Site Services	May - until freeze up
1.1.3	Sampling along AWAR at Major Crossings	1) Water samples at the following locations will be collected as per 2BW-MEL1215. See Figure 3: <ul style="list-style-type: none"> o Mel-River (M2,1) o M3.0 o M5.0 o M11.5 o M23.6 o In addition: Any <i>significant</i> water seeps or water pound in contact with the road will be sample 	Env. Department	May - until freeze up
2. LANDFARM				
2.1.1	Landfarm Water Removal	1) Env Dept to determine when intent to pump once ice melts in containment area.	Env. Department	Probably mid-June and September
		2) Sample water in accordance with Water License to ensure compliance with limits prior to release (Licence 2BB-MEL1424 Section D, Item 15 Criteria).	Env. Department	Probably mid-June and September
		3) Provide notice to Inspector 10 days prior to pumping. Along with an estimated water volume to be pumped.	Env. Department	Probably mid-June and September

		4) Once approval given by Env Dept, water can pump to tundra but must avoid erosion during pumping, ie., low flow, the volume must also be determined recorded NOTE: The water cannot be pumped out to the tundra if it does not meet the Water License criteria.	Env. Department	Probably mid-June and September
3. MELIADINE SITE				
3.1 Construction Pad Access				
3.1.1	Culverts	1) Clean all ice and snow impeding free water flow at all major water crossings	Construction	Before May 15
		2) Daily visual inspections will be undertaken as to the structural integrity of the culvert abutments and road integrity	Construction	May - until freeze up
		3) Weekly inspection of major crossings along AWAR to Rankin Inlet to ensure that water during freshet is flowing freely and no erosion is occurring.	Env. Department	May - until freeze up
		4) Sample for TSS and Turbidity if elevated TSS observed.	Env. Department	May - until freeze up
		5) Notify Site Services if severe erosion/scouring observed - for repair action.	Env. Department	May - until freeze up

		6) Install turbidity barriers if required.	Construction	May - until freeze up
3.1.2	Ditched Areas	1) Snow and/or ice must be removed with an excavator to allow water flow and prevent ponding.	Construction	Early May
		2) Weekly inspection - keep record. Daily visual inspection – if issues are observed immediate action required.	Env. Department	May - until Freshet complete and after rain events
		3) Sample for TSS monthly (Multi Lab) and as needed for Turbidity	Env. Department	May - until Freshet complete and after rain events
		4) If water exceeds Water License criteria (TSS - 30 mg/L (grab) and 15 mg/L (monthly average), contact construction to pump water to P1 and temporarily stop (dam) flow through ditch to prevent impact to surrounding water bodies.	Env Department -- if limits exceeded, Construction if pumping needed	May - as soon as freshet start and until water freeze up
3.2 Meliadine Exploration Pad (Dome 1-2-3-4 pads and surroundings)				
3.2.1	Dome 5 contaminated soil	1) Remove the top layer of snow before snow melt	Sites Services	May

	2) Monitor the remaining snow melt for the freshet period daily for contaminant run off	Env. Dept.	May-June
	3) Test the runoff water if contaminant is monitor	Env. Dept.	May-June
3.3 Meliadine Camp Pad (Camp, Dome 7-8-9 , and Surroundings)			
3.3.1	Camp	1) Snow bank along the camp have to be lower down	Sites Services November to May
3.3.2	Recycling center	1) Weekly inspection	Env. Dept. May-June
		2) Sampling for TSS, Metal, Oil & grease and Mercury (monthly) (As per criteria found under Licence 2BB-MEL1424, Section D, Item 14).	Env. Dept. June
3.3.3	AGNICO EAGLE garage	1) Install sump in garage to collect water	Site Service May
		2) Install silt fence the other side of the road	Site Service June

		3) Daily inspection and TSS monitoring	Site Service	June
3.3.4	Corebox cemetery and culvert	1) Put silt fence the other side of the road	Sites Service	May
		2) Monitor the Culvert run off daily for TSS and sample if needed	Env. Dept.	May – June
3.3.5	Landfarm structure	1) Daily inspection of the Landfarm wall	Sites Service	May-June
		2) Weekly inspection for seepage	Env. Dept.	May June
		3) Sample to complete if any seepage for fuel contaminated water (As per Licence 2BB-MEL1424, Section D, Item 15 criteria).	Env. Dept	May June
4. P1 Containment				

4.1 P1 AREA			
4.1.1	P1 Containment Area	1) Install piping from Lv50 Sump to discharge area at P1.	Engineering and Construction Early May
		2) If the snow accumulation is judged to be too great, then snow must be removed.	Environment to coordinate with Site Service, Engineering, and Construction Early May
		3) Weekly inspection - keep record.	Env. Dept, May - as soon as freshet starts until freeze up
		4) Daily visual inspection – if issues are observed immediate action required.	Construction May - as soon as freshet starts until freeze up
		5) Notify Construction when water present and pumping can start. Water level to be maintained, as a minimum, do not exceed 0.5m freeboard.	Engineering May/early June - as soon as free water present and ice has melted until freeze up
		6) Water sampling program starts when open water is present.	Env. Department May/early June - as soon as water present until freeze up
		7) Any seepage through dykes must be reported to Env Dept and authorities.	ALL May/early June - as soon as water is present until freeze up

	8) Thermistor Monitoring.	Env. Department	Ongoing throughout the year
4.1.2 A8	1) In conjunction with the AGNICO EAGLEP sampling that is required under the Type A water License 2AM-MEL1631; full suites of samples will be taken in 4 locations in lake A8; two in the middle of the lake at previous AGNICO EAGLEP locations as well at the outfall of both the East and West Arms of A8 these samples will be taken as well	Env. Department	Monthly during open w2ter