Baffinland

Memo

To: Nunavut Water Board

From: Baffinland Iron Mines Corporation

Title: **2024 NWB/QIA Annual Report for Operations Intervenor Comments**

Date: October 2, 2025

2024 NWB QIA ANNUAL REPORT FOR OPERATIONS – INTERVENOR COMMENTS

Please find attached Baffinland's preliminary response to the intervenor comments on our 2024 Annual Report for Operations. The QIA play essential roles in safeguarding Inuit rights and interests in relation to the Mary River Project—a role Baffinland recognizes and respects. At the same time, challenges persist due to the recurring nature of questions and comments raised by the QIA. We note that many of their comments have been asked and answered multiple times previously, including previous years' Annual Report reviews, during the NWB Re-Licensing hearings, and most recently during the 2024 NIRB Annual Report intervenor process. Furthermore, a number of the QIA's comments specifically:

- Extend beyond the scope of reporting requirements under Schedule B of the Water Licence and are outside of the specific requirements laid out in Section 6.4 of the Commercial Lease Agreement;
- Are a repetition of comments in other regulatory forums, and as such, Baffinland considers the comment complete for the purposes of this report;
- Reflect assumptions that do not align with Arctic operational realities;
- Are based on inspection findings that were not discussed with Baffinland while onsite, limiting opportunities for clarification.

The attached documents, (1) provide responses to completed comments, (2) outline the status of the comments and the anticipated timeline for the remaining responses to be completed, and (3) compile QIA's comments that have either been previously addressed or fall within the categories identified above and, in our view, are not appropriately included in this submission. We believe that decisions regarding QIA-NWB Annual Report content lie within the jurisdiction of the NWB. In this context, Baffinland respectfully seeks the Board's guidance to:

1. Clarify whether comments that are out of scope, repetitive of other regulatory processes, or already fulsomely addressed can be excluded in the official record of the Annual Report review (marked as orange in Table A.1, and described fully in Table B.1).
2. Confirm that only comments relevant to the defined scope of Annual Reports be carried forward for response in the official package (marked as green). We believe these represent comments that are not closed off, and Baffinland intends to respond to the comment within the 2025 Annual Report submission on March 31; and
3. Encourage, where appropriate, that QIA's identified issues or concerns better suited to inspection or audit processes under the Commercial Lease be addressed in those established fora, rather than through the Annual Report mechanism.

This approach will ensure that the Annual Report review process remains efficient, focused, and collaborative. We appreciate the NWB's consideration and remain committed to transparency and responsible operations.

Sincerely,

Lou Kamermans | Senior Director, Sustainable Development

Cc: Karén Kharatyan, Robert Hunter, Richard Dwyer (NWB)

Attachments:

Attachment 1: Table A.1: Status of QIA Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations
Attachment 2: Table A.2: Status of ECCC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations
Attachment 3: Table A.3: Status of DFO Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations
Attachment 4: Table A.4: Status of CIRNAC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations
Attachment 5: Table B.1: 2024 Annual Report QIA Comments no response
Attachment 6: 250731 ESCA Update
Attachment 7: July 2025 Waste Rock Facility Thermistor Monitoring R1

Attachment 1

Table A.1: Status of QIA Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

Table A.1: Status of QIA Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

No.	Intervener Cmt. No.	Intervener Comment	Intervener Recommendation	Baffinland's Response
General & Geotechnical Comments (GGC)				
1	GGC#1	There are several recommendations made within the Appendix. While BIM has addressed each of the recommendations, very little detail has been included in terms of dates of previous or planned repairs and maintenance.	Please provide available documentation, photographs of proposed and applicable repairs discussed within Appendix C.2, as well as estimated timing of referenced routine maintenance.	This comment extends beyond the scope of annual reporting requirements under Schedule B of the Water Licence and Section 6.4 of the Commercial Lease Agreement. Please refer to the attached Table 1 for more details.
2	GGC#2	The annual WRF geotechnical inspection report is not included within the Annual report.	Please provide the 2024 WRF Geotechnical Inspection Report.	This information was provided in the 2024 NIRB Report - Appendix G.2.6.2 Geomechanical and Geotechnical Inspection of Facilities. Note that QIA specifically references the document in NIRB Comment **QIA 2024 NIRB GC# 03**.
3	GGC#3	The most recent slope stability modelling of the WRF indicates an internal friction angle of 40 degrees was assumed for the waste rock which is stated to be 'conservative'. It is unclear if this strength is based on literature review or on site specific lab testing.	Provide documentation of the lab testing data or literature which supports the material characteristics used in the stability assessment. To better understand risks associated with potential variations in materials, it is recommended sensitivity analyses be completed at lower strengths to verify that minimum recommended Factors of Safety are met.	This comment extends beyond the scope of annual reporting requirements under Schedule B of the Water Licence and Section 6.4 of the Commercial Lease Agreement. In addition, this comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
4	GGC#4	Several repairs to the Tote Road are planned for the 2025 season, however, repair plans and schedule are not provided.	Please provide an outline of the recommended repairs outlined in (Tetra Tech, 2024) which are to be completed for each planned repair and a high-level schedule of when they will occur.	This comment extends beyond the scope of annual reporting requirements under Schedule B of the Water Licence and Section 6.4 of the Commercial Lease Agreement. In addition, this comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
5	GGC#5	Climate change modelling of the thermal regime of the WRF was completed for the least conservative climate change scenario (SSP1-2.6).	Please provide commentary to support the basis for the selected climate change scenario. To better understand risks and potential outcomes, it is recommended that sensitivity analyses be performed for other climate change scenarios.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. In addition, comments about management plans belong with the review process for the respective management plan. Please refer to the attached Table 1 for more details.
6	GGC#6	Baffinland reported in March 2025 that several thermistor beads at the T2 thermistor were functioning inconsistently, and it was unclear if Baffinland had planned to repair/replace T2. Additionally, thermistors T4 and T5 were permanently not functioning after April 2022, and BH2 was permanently down after August 2019 (oxygen sensor) and November 2021 (vibrating wire piezometer). It was unclear if Baffinland had committed to repairing/replacing T4, T5, and/or BH2.	Baffinland should clarify whether the T2 thermistor will be repaired/replaced, as well as permanently down thermistors and sensors (T4, T5, BH2). Baffinland should provide a timeline for addressing damaged/down thermistors and	See attached document "July 2025 Waste Rock Facility Thermistor Monitoring" which documents all functioning instrumentation and new installation plans. There will be no more repairs made as they have been buried/damaged by equipment. A repair would require the excavation of the thermistor string to locate the damage. As these burials were not surveyed, excavation would almost certainly result in significant damage of the string

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			sensors, or alternatively, rationale for why these thermistors will not be repaired/replaced.	which has been previously observed when attempted . New installations took place in 2024 to reduce the data gap resulting from previous instrumentation damage.
7	GGC#7	Baffinland notes improvements in their QA/QC program, with a reduction in the number of parameters exceeding their respective analyte Lowest Detection Limit (LDLs) in field and trip blanks from 2023 (46 parameters) to 2024 (32 parameters). They further state that 6.8% of trip blank results (16 out of 236) and 14.3% of field blank results (16 out of 112) exceeded the Data Quality Objectives of less than the LDL, and conclude that this indicates negligible contamination and acceptable field precision and accuracy. The basis for considering 6.8% and 14.3% of results exceeding the LDL as negligible and acceptable needs to be clarified. Is there a reference or guideline that supports these thresholds? To determine the main source of contamination in BIM's QA/QC program, an assessment of their distilled water was conducted in 2024. Baffinland concluded that analyte detections above the LDL in blanks were likely due to contamination from equipment, workspace, or sampling procedures during blank preparation or fieldwork. In response, Baffinland has implemented increased training and awareness sessions, improved cleaning and storage of sampling containers, and enhanced workspace cleanliness when preparing blanks. It is important to note that the QA/QC program is intended to identify potential sources of contamination in field-collected samples. When contamination is detected, it may call into question the validity of field sample results.	1. Provide a basis for considering 6.8% and 14.3% of results exceeding the LDL as negligible contamination and it is acceptable. 2. Provide a reference of guideline that supports these thresholds. 3. Confirm that corrective actions implemented for the QA/QC program are also being applied consistently across all aspects of the field sampling program.	Baffinland will provide a response or update in the 2025 Annual Report.
8	GGC#8	In September 2024, unusually heavy rainfall caused heavy runoff, with erosion that elevated sediment concentrations in the water, and overland flooding that caused extensive damaged to the Tote Road and six (6) stream crossings, including a complete culvert washout at the km 63.5 stream crossing (Main Doc., s.7.3, p. 48; App. C.1.2, p. 5). Spill reports filed on the sediment-laden water detailed the damage, and the erosion and sediment controls implemented to protect water quality (Table 6.2, p. 37 and 38; App. E.8.3 Parts 2 and 3 of 3). The road was closed to all traffic for nine days and required significant emergency repairs. This extreme weather was described variously as an "*unprecedented 1:1000 rainfall event*" (Main Doc. s.7.3, p. 45) and "*greater than a 1000-year return period 24-hour rainfall event*" (p. 54), based on the Mary River Mine site rainfall records between 2013 and 2023 (App. E.8.2, Part 1, p. 57 and Part 2, p. 92). The frequency of extreme weather events in northern Canada is expected to increase in response to ongoing climate change (e.g., Zhang et al. 2019). Given the impact of this rainfall event, it is important to understand the level of certainty attached to its predicted 1,000-year return period, which suggests a 0.1% probability of recurrence in any given year. Was the prediction based simply on a decade of local rainfall records, or were longer term regional rainfall records and patterns such as the Arctic Oscillation also considered?	QIA requests Baffinland clarify: 1) how the 1,000-year return period this rainfall event was estimated, 2) the level of uncertainty associated with this estimate, and 3) how the potential for climate change to cause such events on a greater frequency is being factored into stream crossing remediation and design, and erosion and sediment control preparedness?	Baffinland will provide a response or update in the 2025 Annual Report.

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Terrestrial Environment (TE)				
9	TE#1	Table 1 recommendations from QIA's Environmental Audit Report (2024) prepared by Okane included addressing uncontrolled seepage to the surrounding environment observed near the ore crusher pad/landfill, identified on August 21, 2024. The source of the seepage was reported to be inconclusive, but was determined to not be coming from the ore crusher pad as it was consistent with runoff (due to its temperature, conductivity, and general field parameters). Baffinland has asserted that the landfill is not designed to hold or contain any infiltration water (P. 42), holds non-hazardous waste, and that comprehensive groundwater quality monitoring surrounding the landfill will continue, to characterize potential impacts from the facility. However, it was unclear whether Baffinland had a plan for responding to the uncontrolled seepage near the landfill. It is also unclear whether seepage from the crusher pad contributed to that which was observed. As Baffinland has asserted that the uncontrolled seepage is likely surface runoff (i.e., from active layer mobilization or seasonal permafrost melting), what mitigative measures (such as erosion and sediment control measures) are being taken to control runoff in this area?	Please clarify how Baffinland has responded to (and mitigated) uncontrolled seepage near the ore crusher pad/landfill (i.e., what ESC measures have been implemented in the short-term and long-term to control runoff). What specific protocols does Baffinland follow to respond to observations of uncontrolled seepage to the surrounding environment? Please provide reference to a specific section of the Spill Response Plan (or other relevant reports) which includes a proactive response plan. We note it is unclear whether the Spill Response Plan was triggered by this incident.	This comment is based on QIA/QIA consultant inspection findings that were not discussed with Baffinland while onsite, limiting opportunities for clarification. The comment is also a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
10	TE#2	The geochemical stability of exposed pit walls is uncertain, and may present a future water quality concern. Okane states in the Environmental Audit Report that "*while the risk of water quality issues associated with the pit walls is low compared to the WRF due to the substantial decrease in contact surface area, the same constituents of concern that lead to low observed pH values in WRF seepage in 2017 are likely present in exposed pit walls.*" (P. 7). Further, it is stated that "To meet water quality objectives of the closure plan, exposed pit walls may require a cover system to inhibit oxygen ingress and the production of ARD products. BIM has not proposed updating pit wall water quality modelling until 2029." (P. 31) Additionally, Okane stated that assumptions made in previous geotechnical analysis did not appear to be consistent with the conditions that were observed during the Audit site visit in 2024. Baffinland stated in their response that an update to the water quality predictions for the pit had been proposed in the updated Phase I Waste Rock Management Plan (2023), and that pit source terms would be developed, for use in developing a predictive water quality model for operational water quality and "early closure" scenario water quality to support closure planning development. Baffinland stated that Appendix D-7 of the ICRP Revision 6 included the timeline for this work, however this document was not included within the 2024 Annual Report for Operations package.	As previously stressed by Okane and QIA in the 2024 Environmental Audit Report, Baffinland should further investigate the geochemical stability of the exposed pit walls, to ensure that low-pH seepage will not occur. A timeline for the completion of updated pit wall water quality modelling should be provided. Updated water quality predictions and modelling should be reviewed by QIA and other interested third parties, when available, to determine that updated water quality modelling and long-term monitoring of exposed pit runoff is sufficient, in advance of the scheduled 2029 pit wall water quality modelling update. Baffinland should also provide a copy of Appendix D-7, for third-party review of timelines for developing pit source terms and updating water quality predictions.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
11	TE#3	Dust suppression continues to be a concern for Baffinland. The effectiveness of dust suppression methods was called into question by LGL Limited in their 2024 inspection, as excessive amounts of dust from heavy equipment and haul trucks was observed throughout project areas, and particularly along the Tote Road (P. 93). LGL Limited noted in their July 2024 site visit that fugitive	Baffinland should commit to implementing the recommendations for increasing the number of water trucks and implementing an early	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		dust from haul truck activities continued to be observed (and that the number of water trucks and volume of water being sprayed for dust suppression on the roads was far below what was needed), and therefore recommended that Baffinland increase the number of water trucks available, and implement an effective early notification system to alert managers when dust levels are increasing (P. 89, 93). It was unclear whether Baffinland had committed to implementing these recommendations.	notification system for responding to increased dust levels.	
12	TE#4	In their 2024 Environmental Inspection Report, LGL Limited noted that snow with high sediment load was observed in the Sheardown Lake Tributary, and recommended that snow clearing operations should avoid pushing snow into the stream channel, which could be accomplished by clearly marking the area (visible during the winter).	Baffinland should explicitly commit to taking steps (i.e., clearly marking the snow clearing/storage area) to prevent sediment-laden snow from being pushed into the Sheardown Lake tributary, as recommended by LGL Limited.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
13	TE#5	As an outcome of QIA's 2024 inspections, QIA requested Baffinland complete the leak detection investigation of the waste rock facility water treatment plant at the top of mine site scheduled for the snow-free period of 2024, or provide an alternate plan to ensure the Sediment Containment Pond contents are not released to the environment. In response, Baffinland stated that for the 2025 operational year, they will continue monitoring and implement suitable controls, including containment via ditching and pumping seepage back to the lined facility. However, Baffinland's response does not explain why the 2024 leak detection investigation was not completed, nor does it provide a revised schedule or justification for abandoning the investigation.	Baffinland is requested to clearly confirm whether the leak detection investigation will be rescheduled. If it is no longer considered necessary, Baffinland to provide a detailed rationale and present an alternate plan that ensures no release of SCP contents to the environment. A specific timeline and commitment are expected in the response.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
14	TE#6	In section 9.7, Baffinland has indicated that reclamation studies will be provided in the NIRB annual report. As QIA has not had a chance to review these reports at this time, we are unable to confirm whether there are any technical concerns present as they relate to the NWB process.	QIA may provide further comments on the reclamation research work completed by Baffinland pending review of the forthcoming 2024 Terrestrial Environment Annual Monitoring Report (TEAMR).	No response required (information only).
15	TE#7	QIA's comment on the 2023 annual report noted a concern with the proximity of reclamation study control sites to potential disturbances like the Tote Road at sites KM52, KM16, KM18 (i.e. sites other than KM58). BMC's response appears to have misunderstood this concern and subsequent request. QIA reiterates their concern that for reclamation study sites KM52, KM16, and KM18 there appears to be a lack of information on initial site conditions/baseline at survey locations pre-disturbance (e.g. road construction, borrow site use), and the adjacent control may be influenced by indirect effects of Tote Road use (e.g. dustfall), which could influence vegetation amounts and composition, thereby influencing recommendations based on revegetation observations. QIA recognizes that the current adjacent control provides useful inferences on adjacent conditions where initial disturbance activities did not take place, however potential indirect effects from Tote	QIA requests that before deriving recommendations on revegetation based on observations at revegetation study sites KM52, KM16, and KM18, BIMC determine baseline site conditions pre-project disturbance (e.g. before the borrow site use) or use a similar site reference site for comparisons that is beyond the zone of influence of any adjacent activities which could impact the accuracy of results (e.g. dustfall from the Tote Road).	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		Road may influence the vegetation levels at control sites. Exploring additional reference locations for documenting baseline conditions is warranted.		
Metal and Diamond Mining Effluent Regulations (MDMER)				
16	MDMER#1	MDMER data submission for sublethal toxicity with *Lemma minor* with effluent from MS-08 collected on October 1, 2024, are missing IC25 or EC25 lower and upper 95% confidence limit (see snippet below). **Sublethal toxicity test IC_{25}/EC_{25} — 2024 — Version 1** **Facility name**: Mary River Mine Site * **Final discharge point (required)**: MS-08 * **Collection date (required)**: 2024/10/01 * **Collection method (required)**: Grab * **Aquatic environment (required)**: Fresh water * **Species tested (required)**: Lemna minor - Growth (Frond Number) **Test start date**: 2024/10/03 **Consultant laboratory**: Nautilus Environmental Company Inc. * **IC_{25} or EC_{25} flag (required)**: >; * **IC_{25} or EC_{25} concentration (required)**: 97 %; * **IC_{25} or EC_{25} lower 95% confidence limit (conditionally required)**: %; * **IC_{25} or EC_{25} upper 95% confidence limit (conditionally required)**: %; * **Was there statistical stimulation of any concentration? (required)**: No **Percent stimulation** / **Effluent concentration with stimulation**: No data available	Provide the following information; IC25 or EC25 lower and upper 95% confidence limit and an explanation as to why the data were not included in the original submission.	Confidence limit information is only conditionally required and is not warranted to support the result provided by the ALS external laboratories.
Aquatic Environment (AE)				
17	AE#1	QIA-7 from the inspection reports recommended that turbidity controls be installed along uncontrolled areas of the Tote Road, to minimize sediment load in the surrounding water bodies (P. 42). Baffinland's response indicated that sediment and erosion controls were implemented per the SWAEMP, and that water quality monitoring (for suspended solids) continued to be conducted at select crossings along the Tote Road, as per the Roads Management Plan, which was reported to meet guidelines in 2024. Further, QIA had requested in 2023 that ditches along the Mine Haul Road be reconstructed and rock check dams be installed to accommodate higher flows and reduce velocities (thereby reducing erosion) (P. 91). It was reported by LGL Limited in 2024 that no action had occurred to address the 2023 recommendation. Additionally, LGL Limited highlighted that high amounts of road sediments were entering stream channels and lakes throughout the project area, exacerbated by rain and snowmelt, and recommended that an effective (and high-	Baffinland should commit to reconstructing the ditches along the Mine Haul Road to accommodate higher flow volumes, and rock check dams as recommended by QIA in 2023. Once implemented, Baffinland should commit to conducting higher-resolution monitoring in the downstream environment, to ensure that ditch reconstruction and rock check dams have been successfully installed and are performing as intended.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		resolution) ESC plan be implemented, including increased use of coir logs and sediment curtains (for example) along roadside margins and adjacent to water bodies.	Additionally, Baffinland should prepare/implement more robust ESC measures along roadside margins and adjacent to water bodies, as recommended by LGL Limited. A higher resolution ESC monitoring program should be implemented to ensure that routine monitoring occurs at a sufficient temporal scale, and includes measures to respond to sediment and erosion issues in a timely, proactive manner. Baffinland should provide a timeline for developing and implementing a monitoring program (i.e., Special Effects Study) for assessing effectiveness of any newly-implemented ESC measures along roadside margins, Mine Haul Road ditches, and adjacent to downgradient water bodies.	
18	AE#2	Several areas of seepage were identified at the KM 105 pond over the years: Upstream of the northwest embankment geomembrane tie-in trench (July 2022), and further upgradient and caused by a bypass of the dam structure retention features (May 2023), and concerns are ongoing. A bentonite plug program that was initiated for remediation was unsuccessful in preventing seepage, so ESC measures were implemented (sediment curtains, check dams, floating silt curtain in the nearest downgradient water body), as well as a pre-dosing treatment system of inflows at the water treatment plant. Additionally, during the commissioning of the water treatment system, thawing of the temporary retention berms occurred, resulting in water flowing through the berms. LGL Limited's 2024 Inspection Report stated that "the failure of the grouting indicates that the leaking dam is more complex than originally thought, and as such, it is our opinion that proactive measures should be taken to ensure that effective sediment capture is provided downstream of the northwest embankment." (P. 89). LGL Limited also recommended that more robust ESC measures (and other mitigation measures) be implemented downstream; It was unclear whether the ESC measures planned by Baffinland for 2025 (including filtration and settling enhanced with chemical addition at the inflow), were sufficient in the long-term, although Baffinland has asserted that these measures have resulted in significant improvements in water quality. Has Baffinland developed a longer-term plan to address KM 105 pond seepage concerns (i.e., addressing dam leakage, given that grouting is not feasible)? LGL Limited had stressed in their inspection report that the areas downstream of the KM 105 pond support fish and fish habitat, and should be prioritized for prevention of runoff from entering these waters (P. 89).	Baffinland has stated that they are currently reviewing potential remedial options for permanent repair of the KM 105 pond – Baffinland should provide their timeline for preparing a long-term remediation plan for the pond, and indicate when the plan will be implemented, how its success will be monitored (i.e., more targeted monitoring of the downstream environment/fish-bearing waters, with appropriate triggers), and when monitoring results will be available.	Baffinland provided the current water management plan for Km 105 in the 2024 QIA-NWB Annual Report. The plan focused on water management within the facility footprint below and above the dam, as opposed to continuing the 2024 grout curtain project. Further grouting was deemed unreliable as there is a possibility frozen ground will thaw and open new pathways allowing seepage to propagate. In 2025, improved sediment control measures for the runoff flowing from the valley infrastructure involved two processes for sediment removal: filtration and settling; both enhanced with chemical addition at the inflow. Surface water runoff flowing into the Km 105 Pond was treated using a chemical dosing system. This system, which was in operation since 2024, has demonstrated significant improvements in water quality. The flocs generated by this chemical treatment were retained by an aggregate filter berm constructed within the KM 105 Pond containment and the dam structure, allowing for enhanced settling within the km 105 valley infrastructure and filtration. Improvement in water quality achieved through polymer dosing and subsequent filtration via the aggregate filter berm is shown in the photo below and has been documented with monitoring results at MS-11 throughout 2025.

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				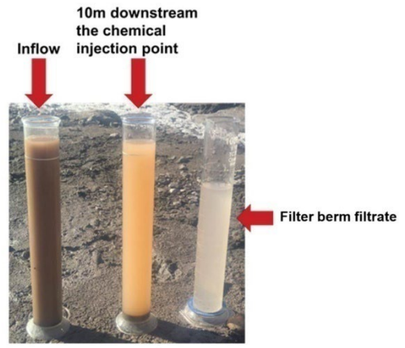 *Polymer dosing mitigating sediment transport within the Km 105 valley infrastructure, 2025-05-23.* The treated water flows into the existing downstream pond of the KM 105 valley infrastructure. A natural settling area downgradient functions as a polishing pond, and was enhanced with silt curtains to facilitate the settling of any remaining fine sediment. Following this, the treated water flows to MS-11. An additional silt curtain has been deployed where flows and water quality data are recorded. A full summary of the performance of water management features implemented in 2025 will be included in the 2025 QIA-NWB Annual Report. In addition to sampling requirements under the water licence, and MDMER, Baffinland executed a robust performance monitoring process for the mitigations implemented at the Km 105 Pond in 2025. Results of regulatory water quality monitoring under the water licence and MDMER for MS-11 will be included in the 2025 QIA-NWB Annual Report. In addition, annual sampling completed under the CREMP, which provides the basis for the evaluation of any mine-related influences on water quality, sediment, and/or biota within aquatic environments located near the Mine Site, will be included in the2025 QIA-NWB Annual Report. In short, Baffinland's remediation plan will continue to focus on water management infrastructure improvements within the km 105 valley and will utilise existing comprehensive monitoring programs inform on potential future improvements.
19	AE#3	Under the freshet monitoring programs several non-compliant releases were documented by BIM. These non-compliant releases occurred at Sheardown Lake Tributary 1 outfall (SDLT-OUT), Camp Lake Tributary 1 outfall (CLT-OUT), Sheardown Lake Landfill Gate Tributary outfall (LDFG-OUT) and Camp Lake Settling Pond outlet (CLSP-OUT). The Camp Lake Settling Pond outfall was measured on four dates between June 3 and June 12, 2024 and concentrations of TSS ranged between 206 mg/L and 433 mg/L. Concentrations at the other four outfall locations ranged between 1.3 mg/L (LDFG-OUT) and 62.1 mg/L (CLT-OUT) on the same dates. It is understood that water was discharged from the Camp Lake Settling Pond outfall for a shorter period of time compared to the other four sites. The elevated concentrations measured, however are of concern as it appears current	Describe the unique characteristics of site CLSP-OUT that lead to TSS concentrations greatly above the water licence criteria and indicate management techniques that can be applied to address the characteristics of this site and maintain TSS concentrations below water license criteria during spring freshet. Provide a timeline when these management techniques will be implemented to curtail noncompliant discharges.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		management plans are not sufficient to maintain TSS concentrations below water license criteria at this location.		
20	AE#4	The Final Environmental Impact Statement (FEIS) for the Mary River Project indicated a reduction in flow of up to 26% due to diversions, and an increase of up to 31% from effluent discharge—resulting in a net increase of approximately 5%, not a net reduction for SDLT-1 (Catchment H11). Baffinland has since noted that the diversion of the Mine Haul Road increased the catchment size of H11, yet this change is not reflected in the description of altered flows due to diversions or effluent discharge.	Baffinland is requested to provide a clear and complete assessment of the implications of the change to the catchment size of H11, including: 1. A description of the change in the size of the SDLT-1 catchment due to the Mine Haul Road diversion; 2. The predicted increase in flow associated with the enlarged catchment; 3. An assessment of the potential impacts of the change in flow on SDLT-1; 4. Confirmation of whether current observed flows remain within the range of the predicted increase; and 5. If current flows exceed predictions, a description of any potential or observed impacts resulting from this change.	Baffinland submitted Modification No. 13 – Mine Site Water Management Plan to the Nunavut Water Board in June 2021. Attachment 2 to this Modification Request is the report 'Mine Site Water Management Plan' (Knight Piesold, June 30, 2021), and Attachment 4 is the memorandum 'Hydrology Assessment – Effects of Proposed Mine Site Water Management Measures on Flows in Sheardown Lake Tributary 1 – Mary River Project' (Knight Piésold, June 24, 2021). Baffinland notes that the 2024 AEMP Hydrometric Monitoring Report (Appendix E.9.3 of the 2024 QIA-NWB Annual Report for Operations) includes in-text references to KP, 2021a and KP, 2021b, but did not provide the full references for these reports in the document, but can confirm that the referenced documents are the Water Management Plan and Hydrology Assessment referenced above. These documents can be accessed through the Nunavut Water Board public registry. Baffinland wishes to clarify that the percentage changes in flow stated in the intervener comment are not from the Final Environmental Impact Statement (FEIS). These percentage changes were provided in Table 4 of the 2024 AEMP Hydrometric Monitoring Report (Appendix E.9.3) which references the Sheardown Lake Tributary 1 Hydrology Assessment (see above, hereafter referred to as 'the Hydrology Assessment'). It is noted that Table 4 did not include the 10% reduction in flow due to diversions from the Open Pit – when this is added the net mean annual discharge for SDLT-1 has a reduction of 5%. Table 3 from the Hydrology Assessment provides the diverted catchment areas and associated changes in mean annual discharge from the Proposed Water Management Plan. However, as the SDLT-1 Pond has not been constructed, the associated 26% reduction in discharge for this catchment has not occurred. Responses are provided below to the specific questions presented by QIA, however the reader is encouraged to reference the Hydrology Assessment for a fulsome understanding of these changes. 1. Section 3.0 of the Hydrology Assessment notes that 'The proposed water management plan would result in 1.27 km^2 of catchment being diverted out and 1.15 km^2 added into the SDLT-1 catchment for a net reduction in contributing area of 0.12 km^2 (3%)'. The Mine Haul Road Diversion represents the 1.15 km^2 added to the catchment. 2. The overall change in mean annual discharge for the SDLT-1 catchment from the open pit and MHR diversion is an increase of 21%. 3. The CREMP will continue to monitor potential changes within the tributary downgradient of the KM 105 valley infrastructure. Should hydrological flow and changes within SDLT- 1 exceed FEIS predictions, this information will be incorporated into evaluating potential mine influences on the SDLT-1

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				4. The 2024 AEMP Hydrometric Report summarizes flow measurements at station H11, stating: "The data from H11 have similar natural variability in runoff from month to month and year to year as at other stations prior to 2021. During 2021, the diversion of the Mine Haul Road increased the catchment size of H11. Since that time the average flow in all months has been higher and consistent with the predicted effects to the SDLT-1 catchment." 5. N/A
21	AE#5	The report states the "Based on spring concentrations that were elevated relative to both reference and baseline conditions and exceedance of both the AEMP benchmark and WQGs, a potential mine-related influence was identified for total aluminum concentrations in the CLT1 Upper Main Stem in 2024.However, given that total but not dissolved aluminum concentrations in the spring were elevated compared to reference and baseline concentrations, the higher total concentrations are associated with suspended solids in the water column during freshet as indicated by turbidity that was also elevated compared to both reference and baseline conditions in spring (Appendix Table C.15). Baffinland concludes suggests that contributions of total aluminum to the CLT1 Upper Main Stem may be related to the background minerology of the system mobilized by both natural (e.g., weathering and erosion) as well as mine-related (e.g., dust) processes." The report also states that concentrations were elevated in 2023 (although not sufficient to trigger a response). The same rationale was used for iron concentrations. The suggestion that the contributions of total aluminum may be related to the background minerology of the system is subjective and not based on any evidence.	Baffinland is requested to provide a basis for the statement that contributions of total aluminum (and iron) may be based on background minerology of the system. While this is a reasonable hypothesis, there is no supporting evidence except that the high total concentrations are associated with suspended solids in the water column during freshet. We note that concentrations were also highly elevated in the fall compared to baseline.	The conclusion that contributions of total iron are related, at least in part, to the background minerology of the system is based on the Mary River Mine (the Mine) being located among the richest iron ore deposits ever discovered (Baffinland 2025). Baffinland concluded that aqueous concentrations of aluminum in the CLT1 Upper Main Stem were likely attributed to both natural (e.g., weathering and erosion) and mine-related (e.g., dust) mobilization processes. For aqueous concentrations of aluminum to be elevated (relative to pre-mining, benchmarks, guidelines, etc.), whether it be the result of natural or mine-related processes/activities, there needs to be a source of aluminum. In this case, the soils/sediments in the vicinity of the Mine are the logical source of aluminum (e.g., unlike nitrogen-containing compounds that are often associated with blasting materials). For CLT1 Upper Main Stem, average concentrations of total aluminum reported for spring, summer, and fall 2024 were classified as elevated, relative to baseline (2005 to 2013) (see Appendix Table C.15 in Minnow 2025). However, average total aluminum concentrations in summer and fall were not elevated relative to reference. Average spring, summer, and fall concentrations of dissolved aluminum reported for CLT1 Upper Main Stem were not elevated relative to reference in 2024. However, concentrations in spring and fall were moderately and highly elevated relative to baseline, as indicated by the Intervener. As indicated in the 2024 Core Receiving Environment Monitoring Program (CREMP) report (Minnow 2025), these results may be attributable to mine-influence. Baffinland will continue to monitor water quality conditions in the CLT1 Upper Mainstem. Additionally, Baffinland is investigating an analysis of total compared to dissolved aqueous concentrations of aluminum, iron, and uranium to provide insight into biological availability and further determine potential for effects on aquatic biota. References: Baffinland. 2025. Mary River Mine [online]. Available from: https://www.baffinland.com/operation/mary-river-mine/ [Accessed 16 August 2025].

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				Minnow. 2025. Mary River Project 2024 Core Receiving Environment Monitoring Program Report. Prepared for Baffinland Iron Mines Corp. March. Project 247202.0075.
22	AE#6	The report states that "Although an AEMP benchmark has not been established for uranium, consistent exceedance of the WQG, the notable elevation relative to reference and baseline concentrations across all seasons in 2024 and increasing trends in uranium concentrations both since the baseline period and over the mine operation period, suggest a mine-related influence on uranium concentrations at the CLT1 Upper Main Stem. A combination of climate-driven and mine-related factors may be contributing." We note that elevated uranium was also identified in Sheardown Lake Northwest and Southeast as well as Sheardown Lake Tributaries 1 and 2 in 2023 and in 2024. There is discussion of development of a benchmark and that "it may be appropriate to establish one in order to better assess and manage potential mine-related influence moving forward" but to date, one has not been developed. Considering the time required to develop and implement a benchmark as well as determining action responses and potential mitigation measures, we are concerned this work has not been completed as the elevated concentrations have persisted.	Undertake and complete establishment of a uranium benchmark.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
23	AE#7	Cadmium concentrations were identified as a potentially mine-influenced in 2022, 2023 and 2024, which triggered a Moderate Action Response (i.e. completing temporal trend analyses). The temporal trend analyses revealed significant increasing trends in cadmium concentrations at both SDLT1 sampling stations and at the downstream station over the years of mine operation. Temporal trend analyses also revealed a significant increasing trend to total and dissolved cadmium concentrations in all seasons combined. Reference stream did not indicate similar trends in cadmium concentrations. Moderate Action Responses have been undertaken each year and the trends have indicated a likely association with mining activities.	Given that these results indicate a likely association with mining activities, additional action should be taken to mitigate these concentrations. Action should also be taken to determine if these effects can be correlated with other parameters.	In 2025 (and in future Core Receiving Environment Program [CREMP] studies), Baffinland will continue monitoring benthic invertebrate communities (BIC) at SDLT1 to track potential effects on biota and support the evaluation of elevated parameter concentrations exceeding the AEMP benchmark (cadmium), as well as those that were elevated compared to reference and baseline conditions, using a weight-of-evidence approach. Also in 2025, Baffinland will perform temporal trend analyses for key water quality parameters at SDLT1, including cadmium, to further investigate temporal trends/patterns. As part of the 2025 reporting cycle for the CREMP, Baffinland will also evaluate potential relationship between cadmium concentrations and concentrations of other water quality parameters at SDLT1. Adaptive management projects occurred within areas upgradient of SDLT 1 focusing on reducing TSS with water management infrastructure, to reduce metal transport associated with sediments within surface waters.
I 24	AE#8	Only a single chlorophyll-a sample was collected in SDLT12 in the spring of 2024. Yet the text goes on to compare differences between reference streams and all other Sheardown Lake Tributaries and to AEMP benchmarks. Differences were observed but these cannot be statistically tested as a single data point is not robust enough to conduct a test.	In future, results from a single sample should not be used in a statistical analysis for differences between reference streams and certainly not to conclude no adverse mine-related effects on phytoplankton productivity.	No statistical tests were completed using the single chlorophyll-a datapoint collected from SDLT12 in the spring of 2024. All comparisons were non-statistical. Comparisons of chlorophyll-a concentrations to the Aquatic Effects Monitoring Program (AEMP) benchmark technically requires, at a minimum, at least one data point. However, Baffinland recognizes that comparing mean chlorophyll-a concentrations to benchmarks (and reference and baseline) would better represent the variability in the system and lead to stronger conclusions regarding potential mine-influence, and this will be a consideration for the 2025 reporting cycle.
25	AE#9	Chlorophyll-a concentrations at Sheardown Lake NW in 2024 results are reported from winter, summer and fall sampling events. No results are reported from spring sampling.	QIA requests the absence of spring sampling results be explained.	Baffinland will provide a response or update in the 2025 Annual Report.

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26	AE#10	A "focus on remediation efforts for the KM 105 Pond that will shift toward sediment control measures, incorporation of chemical treatment, filtration and improved settling structures rather than additional structural modifications" is provided as a recommendation. The KM 105 pond is discussed as a "likely influence" on water quality at Sheardown Lake NW. Water quality information collected during the 2025 CREMP will be used to monitor water quality of SDLT1 and Sheardown Lake NW as a basis for informing the potential need for further investigations and mitigation. A point source in the vicinity of the pond would confirm whether it is the influence or not.	The KM 105 Pond is identified only as a "likely influence". In order to confirm its impact on SDLT1 and Sheardown Lake NW, consider installing a sampling site at the discharge point of the pond. A site at this location could be compared to downstream sampling points and any impact could be identified.	Baffinland executed a robust performance monitoring process in 2025 and executed the request. MS-11 water quality monitoring data was taken as per regulatory frequencies to evaluate the point source discharge from the km 105 Pond. Downgradient water quality monitoring was also conducted as part of the monitoring associated with MDMER data. Water quality and flow information associated with the Km 105 Pond continue to be assessed in conjunction with the annual CREMP program, to inform evaluation of potential influences on water quality at Sheardown Lake NW.
27	AE#11	In the Effects Assessment and Recommendations section of the report, the text summarizes the sediment quality AEMP benchmarks that were exceeded at Sheardown Lake SE. These include arsenic, mean chromium, iron and manganese concentrations in littoral and profundal sediment samples, nickel concentrations at two littoral and two profundal sites and phosphorus concentrations in two profundal samples. Also, influences were identified at SDLT9, which is a tributary to Sheardown Lake SE and at Sheardown Lake NW. Yet the report states that none of the samples were elevated compared to both reference and baseline and suggested that no or minimal mine-related impacts on littoral or profundal sediment quality were indicated in 2024. While the numbers suggest no or minimal mine-related impacts, the cumulative effect of these exceedance may indicate some mine-related impacts may be occurring that require further investigation.	A Moderate Action Response is required if the AEMP benchmark is exceeded. Investigation into potential cumulative effects of these metals on aquatic biota should be considered.	The KM 105 Pond was identified as the main potential mine-related influence upstream from the SDLT1 monitoring stations (2022 through 2024) and this was considered in the interpretation of the water quality data for SDLT1 in the 2024 Core Receiving Environment Monitoring Program (CREMP) report. The 2025 CREMP report will continue to analyze and report on mine-related influences associated with the KM 105 Pond, including changes in sediment chemistry, and will include relevant discussion of potential long-term mine-related effects to downstream aquatic environments and biota. This will include consideration of potential effects associated with metal concentrations in sediment.
28	AE#12	In comments on Baffinland's 2023 QIA NWB Annual Report on Operations (App. E.13, p. 22-23), QIA recommended Baffinland assess whether there are sites in Camp Lake Tributary 1 (North Branch), Sheardown Lake tributaries 1 and 9, and Sheardown Lake (Northwest and Southeast) with sediment traps that could be core-sampled to extend the temporal records of sediment quality. In its response Baffinland describe the difficulty of locating tributary stream habitats that trap fine sediments deep enough for coring and argued there is no need for a sediment deposition record that predates the 2005 baseline. The response did not address core sampling in the Sheardown Lakes. It also did not discuss the comparative value of current sediment samples, which uses a grab sampler and then scrapes off the surface layer for analysis, relative to a tubular core sample that can sectioned into discrete layers. In its June 2024 Mary River site inspection report (App. E.8.2, pdf p.112) LGL Limited also recommended the value of sediment cores for temporal sampling. "*Sedimentation accumulation and sedimentation rates have been reported previously by Baffinland Iron Mines. Rough estimates suggest the 2cm sediment cores collected by Baffinland Iron Mines at lakes located close to Mary River Mine – Sailiivik Camp span a period of ~10 to 15 years. This period extends barely past the start of mining operations. We recommend the collection of full-length lake sediment cores (>50 cm) from lakes located close to the mining operations at Mary River Mine – Sailiivik Camp and reference lakes sites. This Routine analysis of metal concentrations can be reported downcore to*	QIA recommends Baffinland collect sediment cores during the winter or summer 2026 field seasons from Project exposed and Reference lakes to establish clearer temporal records of pre-Project deposition quantity and quality and provide context for ongoing deposition of iron and other metals. Sediment cores should be extruded at 0.5cm intervals and dated using radio isotopes of lead to establish a chronology and put changes in sediment chemistry into temporal context. Each discrete sediment layer should be examined for sediment chemistry of key variables.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		provide context to metals concentrations observed in surficial sediment. For example, sediment metal concentrations at the top of the core may still be below sediment quality guidelines but have increased potentially 5-fold above sediment that predates industrial activities in the region. This will provide a more rigorous analysis to develop site-specific baselines for contaminants of concern. Combined with systematic water and surficial sediment sampling, these methods provide a powerful approach to tracking water quality changes at a range of temporal and spatial scales relevant to inform environmental stewardship decisions." (App. E.8.2, pdf p. 112) With growing evidence in the CREMP of mine-related influences on Project lakes (App. E.9.1, p. i to vi) and the planned increase in ore production from 4.2 Mtpa to 18 Mtpa, improving the current and future pre- and post-operational sediment deposition and quality is becoming increasingly important.		
29	AE#13	In its review comments on Baffinland's 2023 QIA NWB Annual Report on Operations (App. E.13, p. 22-23), QIA supported the Minnow Environmental Ltd. recommendation that Baffinland conduct temporal trend analyses to evaluate changes in the aqueous concentrations of sulphate (CLT1, SDLT1, SDLT12); molybdenum, sodium, and uranium (SLDT1, SLDT12); aluminum, nitrate, chloride, lithium, magnesium, manganese, potassium, and strontium (SLDT1) in Camp Lake Tributary 1 (i.e., CLT 1 Mainstem), and Sheardown Lake tributaries 1 and 12 (i.e., SLDT 1 and, SLDT 12). QIA also supported their recommendation to conduct temporal trend analyses to evaluate changes (i.e., since 2017) in the sediment quality and metals of Camp Lake Tributary 1 (North Branch), Sheardown Lake tributaries 1 and 9, and Sheardown Lake (Northwest and Southeast) and assess mine-related influence. In response, "*Baffinland commits to a one-time submission of usable, sorted data and metadata for statistical analyses by July 31, 2025. The submission will include all the sediment and water quality data collected from Sheardown and Camp catchment (e.g., lake and tributary). QIA's analysis of this data will be completed at their expense. The outcomes of QIA's analysis will be shared with Baffinland in draft for review and to discuss in relation to any further action to be undertaken as part of the adaptive management framework.*" (App. E.13, p. 22-23). QIA looks forward to Baffinland sharing these data but notes that it has not volunteered to conduct these trend analyses for Baffinland.	QIA recommends Baffinland conduct these temporal trend analyses and provide temporal plots of all sediment metals for each Project Lake, regardless of whether Baffinland has determined a project related effect has been observed at this point. Note this request is intended to support QIA and other stakeholders evaluate how the project has influenced sediment chemistry within the local study area.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
30	AE#14	In 2023 (CREMP 2023, p. 269) and again in 2024 (CREMP 2024, p. iii) the CREMP found elevated nitrogen-related compounds (ammonia, nitrate, nitrite, and total Kjeldahl nitrogen) in Sheardown Lake tributary 9 (SDLT9), and in 2024 elevated nitrate in both Sheardown Lakes (Northwest [NW] and Southeast [SE]). A special investigation completed in the fall of 2024 identified activities at the Dyno Nobel Emulsion Plant (Dyno facility), which stores ammonium nitrate for explosives production and is adjacent to SLDT9, as the primary source of these compounds (CREMP 2024 App. I, p. I-3 (p. 272 of 276).	QIA recommends: 1) that the additional sampling conducted during the 2024 special investigation of nitrogen-related compounds in Sheardown Lake tributary 9 (SLDT9) be continued in 2025, along with any other new stations needed to assess the efficacy of measures taken to reduce fugitive nitrogen compounds, and 2) that Baffinland consider the	Baffinland will provide a response or update in the 2025 Annual Report.

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		Baffinland plans to implement an activity audit of the transportation, storage, and handling of ammonium nitrate at the Dyno facility, with potential additional water sampling during the open water season in 2025, to help identify point source(s) of aqueous nitrogen compounds. Has Baffinland considered air quality monitoring for nitrogen compounds in the vicinity of the Dyno facility and mine pit to better understand their magnitude and dispersal?	value of monitoring airborne dispersal of nitrogen compounds in the vicinity of the Dyno facility and mine pit.	
31	AE#15	In response to QIA's 2023 request Baffinland provided additional details on the calcium chloride applications used for dust suppression on Project roadways (App. E.13, p. 27). This response noted the application rate is conservative relative to that in the south and less than 10% the industry standard, and that no changes in the terrestrial or aquatic environments are anticipated. This information was not found in the main report, but the volume of water withdrawn for dust suppression was reported (Table 4.3, pdf p. 19 and 20). Based on the information provided it is not clear whether some aquatic and terrestrial habitats receive a greater proportion of the calcium chloride than others. Arctic terrestrial and freshwater habitats are very different from those in southern Canada, so the more dilute solution may not be as conservative as expected.	QIA requests Baffinland: 1) include information on the amount of calcium chloride applied to the Tote Road each year in its QIA NWB Annual Report on Operations, and 2) assess whether there is any evidence of frequent application of calcium chloride dust suppressant on the adjacent Tote Road crossing producing measurable changes in the calcium and chloride levels of streams monitored for water quality.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
32	AE#16	In its response to a QIA water quality comment on the 2023 QIA NWB Annual Report for Operations Baffinland provided an update on the 2023 and 2024 seasons of the Pilot Study of aquatic effects of dustfall in a Tote Road stream (App. E.13, pp. 27+28). In 2023, Baffinland did not find a statistically significant difference when the weight of sediment collected in sediment traps upstream of the CV-099 culvert crossing was compared with that in traps downstream. The program was not successful in 2024 due to bedload movement and trap losses and contents related to the 1:1000 yr precipitation event. Baffinland is not confident that a sediment-trap type of program is feasible. QIA notes that differences in sediment weight or other parameters need not be statistically significant to be ecological significant. It looks forward to receiving the full report from this Pilot Project and Baffinland's recommendations for alternative approaches to assessing the aquatic inputs and effects of Project-related sediment and dust inputs to Tote Road stream ecology. It considers this an important gap in knowledge of Project related effects. Baffinland's response appears to confuse this Pilot Study with another Pilot Study to assess the risk to Arctic char in Tote Road streams from contaminants released by rubber particulates worn from truck tires. In 2022, Baffinland monitored the concentration of 6PPD-Quinone in water at six crossings along the Tote Road as part of this study.	QIA requests Baffinland provide a copy of the reports (or more detailed updates) from the Pilot Study of aquatic effects of dustfall and sediment on Tote Road streams and the Pilot study of rubber tire contaminants along the Tote Road, along with any plans or alternative approaches for related future work.	This comment extends beyond the scope of annual reporting requirements under Schedule B of the Water Licence and is entirely within the scope of the Project Certificate and Management Plans required under the Project Certificate. Please refer to the attached Table 1 for more details.
33	AE#17	*"Additional site visits are recommended throughout future seasons to verify the operation of data loggers and perform flow measurements. It is recommended that future hydrometric monitoring continue to target low flow and/or high flow periods to maintain and further validate the rating relationships. Peak flows tend to occur in the spring but not always when the channels are ice-free*	QIA supports the recommendations for additional hydrometric site visits throughout future seasons to verify the operation of data loggers and perform flow measurements and	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. In addition, comments about management plans belong with the review process for the respective management plan. Please refer to the attached Table 1 for more details.

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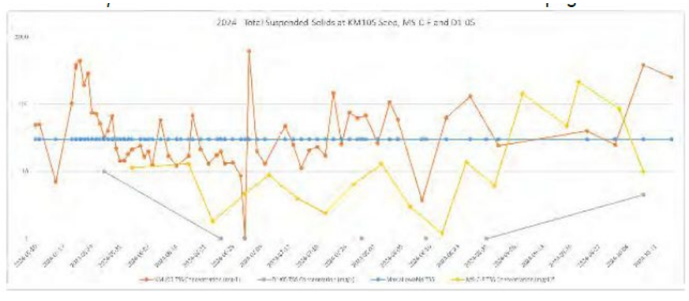
		or when conditions permit safe access for gauging. Following the extreme rainfall observed in September 2024, peak flows that occur in summer and fall months continue to be a good to target. In future programs, if they occur, precipitation events of greater than 4 mm per day should continue to be noted as they typically result in an appreciable increase in flow, especially at the stations with smaller catchments. Precipitation events that last for more than one day, with cumulative precipitation over 10 mm, can result in much higher flow, especially earlier in the summer (mid-July to mid-August) before the active layer of permafrost fully develops." (App. E.9.3, s.6, p. 8) Monitoring of stream flow through the open water season is important for understanding Arctic char access to and from juvenile summering habitats upstream of the Tote Road crossings, and to inform the design of culvert stream crossings.	continued targeting of low flow and/or high flow periods--particularly extreme peak flow, to maintain and further validate the rating relationships.	
34	AE#18	Baffinland reported on the September 2024 extreme rainfall event as follows: "During this event, TSS at the seep reached 9040 mg/L but dropped significantly in the subsequent sampling on September 24, where it was 40 mg/L. Suspended solids concentrations at receiving environment assessment station D1-05 on September 20 and on October 8 when the subsequent sample was collected remained very low at 2.8 mg/L and 4.5 mg/L, respectively, assessing negligible impact to the receiving environment fish bearing habitat as a result of the seepage even during the unprecedented 1:1000 rainfall event." (Appendix E.8.2 (Part 1 of 2), p. 54). What biological data does Baffinland have to support this conclusion? The following footnotes appear beneath Figure 3. "*Total Suspended Solids at the KM105-Seep and Downstream Stations MS-C-F and D1-05*" on page 55:  "[1] *Logarithmic scale used due to the wide range of TSS values, particularly the TSS value measured during the September precipitation event. And,* [2] *Outlier data for KM105 TSS concentration on September 20 of 9040 mg/L removed from figure dataset."* These changes fundamentally alter the figure by damping the apparent variability.	QIA requests Baffinland: • identify the biological data used to support its conclusion there was no impact from the high TSS pulse, • provide figures for the KM 105 seep that depict the full linear range of TSS measurements, and • explain why TSS concentrations above 1000 mg/L were omitted from Figure 4, and how this affects trend analysis.	a) No biological data was collected due to the emergency nature of the 1-1000 year occurrence. As previously communicated, Baffinland's priority was re-establishing fish bearing culverts along the tote road to allow fish passage, repairing the tote road itself in order to restore essential services to cut off staff on the Project, and collecting water quality samples when safe to do so due to the hazardous weather conditions that prevailed. b) Logarithmic scales allow the data to be visualized more effectively and allow for comparison to low TSS results within downgradient receiving environments. c) Influent sample results which included the omitted values that exceeded 1000mg/L, were provided in Appendix B of the aforementioned document. The decision to truncate the values sourced from the outlier data being difficult to align with the axis scale. Conclusions from the figure that seep data was significantly lower than influent data was not impacted.

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		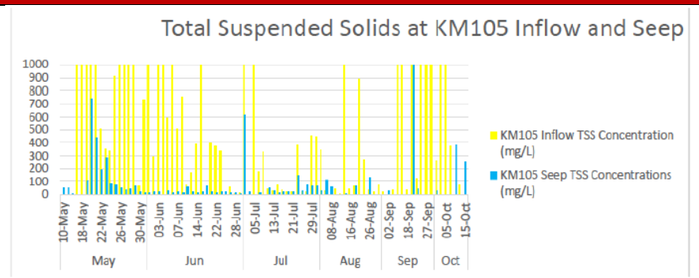 Figure 4: "Total Suspended Solids at KM 105 Pond Inflow and Seep" on page 57 has the following note underneath: "*Note: Values that exceed the Y-axis for inflows are truncated for trend analysis.*		
Fish and Fish Habitat (FFH)				
35	FFH#1	QIA-6 indicated that concerns with culvert crossing inhibiting fish passage in low flows at KM33 needed to be addressed. Baffinland's response stated that they were working with DFO during on-site inspections, and that rip rap that could potentially impact fish passage in low flows had been removed. Baffinland committed to reporting on fish passage in the 2024 NWB QIA Annual Report for Operations. However, QIA's concern was primarily regarding fish strandings on areas placed above grade (i.e., the culverts installed at KM33). Baffinland's response did not indicate that any work had been conducted/planned to address the grade of these culverts.	Please provide a summary of additional plans for preventing fish strandings at above-grade culverts. Additionally, please provide a copy in the 2025 NWB QIA Annual Report for Operations, for third-party review, to ensure that rip rap removal was successful, and if additional work for improving fish passage had been committed to.	This comment extends beyond the scope of annual reporting requirements under Schedule B, the Water Licence and Section 6.4 of the Commercial Lease Agreement. Please refer to the attached Table 1 for more details.
36	FFH#2	As requested in the 2022 NIRB Annual Report, QIA asked Baffinland to assess the potential risk to fish in Tote Road streams from metals and chemicals released by rubber particulates from vehicle tires. This was to be achieved by sampling representative road dust and stream sediment upstream and downstream of the road. In response, a pilot sediment monitoring program using sediment traps was initiated at the CV-099 culvert crossing in 2023 and continued in 2024. The 2023 results indicated no statistically significant difference in sediment mass between upstream and downstream locations. However, the 2024 program encountered significant challenges, including data contamination from large bedload movement, equipment loss due to extreme weather events, and unrepresentative or missing samples. Baffinland hired an unknown and unidentified third-party reviewer to review the methodology and results of the sediment trap study and concluded that sediment traps are not a feasible approach for assessing the impact of tire-derived contaminants in these streams.	Given that the current sediment trap-based program cannot effectively assess the potential risk to fish from tire-derived metals and chemicals, QIA requests that Baffinland develop and implement an alternative, scientifically robust monitoring program to meet this objective. A specific timeline to proposal review and implementation is requested as a component of the response.	This comment extends beyond the scope of annual reporting requirements under Schedule B of the Water Licence and but is within the scope of the Project Certificate. Please refer to the attached Table 1 for more details.
37	FFH#3	As recommended following the September QIA inspection, LGL advised that the accumulation of fine materials in the short channel section downstream of the culverts at CV-216 and upstream of	Baffinland is requested to explicitly commit to monitoring fine sediment accumulation at CV-216 and to conducting an assessment to	This comment is based on QIA consultant inspection findings that were not discussed with Baffinland while onsite, limiting opportunities for clarification. This comment extends beyond the scope of annual reporting requirements under Schedule B and the Water licence. In addition,

No.	Intervener Cmt. No.	Intervener Comment	Intervener Recommendation	Baffinland's Response
		Muriel Lake be monitored over time, and that an assessment be conducted to determine whether any impacts to fish habitat in Muriel Lake have occurred. Baffinland's response—stating that CV-216 is a priority for additional remediation in winter 2025 and is subject to ongoing performance monitoring—does not address the specific recommendation. No commitment has been made to assess the presence or impact of fine materials on fish habitat.	determine whether current or potential impacts to fish habitat in Muriel Lake exist. A clear timeline for this assessment must also be provided.	this comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
38	FFH#4	Results from the CREMP suggest that a higher fish density in Camp Lake relative to the reference lake since mine operations began in 2015 may be associated with higher primary and secondary productivity. This increase in productivity is used as rationale to explain greater abundance of Arctic char. The same rationale is used to explain density in the nearshore area of Sheardown Lake NW relative to the Reference Lake. Yet gill net CPUE is lower despite higher chlorophyll-a concentrations. In spite of an IR to this effect in 2023, the same rationale is being used to explain the increased Arctic char density. This rationale is used in several sections of the report. Also, while a significant difference was observed for phytoplankton, none was observed for benthic invertebrates for either baseline or reference. To state that the observed change in char abundance is a direct correlation is simplistic and based on the literature, has not been adequately supported at the project. Other factors are likely in play and should be considered.	Provide hypotheses to explain increased density of Arctic char that provide a more fulsome rationale than a direct correlation between primary productivity and Arctic char abundance. Or conversely, reduce the reliance on the explanation relating primary productivity and Arctic char abundance throughout the report.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.
39	FFH#5	Arctic char YOY were distinguished from older age classes using a fork length cut-off of 5.0 cm for Sheardown Lake NW and 4.0 cm for Reference Lake 3 based on the evaluation of LFD coupled with supporting length and weight measurements and age determinations. In 2024 fewer than ten YOY were captured in Sheardown Lake NW. Numbers for Reference Lake 3 were not reported. The low numbers of Arctic char YOY reported could be cause for concern as it relates to reproductive success and further recruitment into higher age classes. Figure 4.11 shows even distribution through several age classes, but there could be an effect and subsequent cause for concern with such low numbers of Arctic char YOY.	Have reproductive success and recruitment into higher age classes been considered in the Arctic char health assessment and how would these compare to Reference Lake 3 and baseline? These parameters can and should be analyzed using previous reports to identify any trends. Also, can Reference Lake 3 be relied upon for comparison of results as the dominant size classes are different than in Sheardown Lake NW?	Numbers of young-of-the-year (YOY) arctic charr captured annually from Reference Lake 3 and Sheardown Lake Northwest (NW) are summarized in the following table: **Table FFH#5: Numbers of Young-of-the-year Arctic Charr Captured from Sheardown Lake Northwest (NW) and Reference Lake 3, Mary River Mine** Dataset / Reference Lake 3 / Sheardown Lake NW Baseline - 0 2015 0 4 2016 31 9 2017 26 12 2018 8 10 2019 0 4 2020 21 15 2021 11 3 2022 15 8 2023 11 4 2024 12 0 Note: - = no data.

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				• As shown in the table, numbers of arctic charr captured from Sheardown Lake NW have frequently been below n = 10, and catches in both lakes have occasionally been n = 0. Fish size endpoints, including fork length and fresh body weight, are used as the basis for evaluating key response categories of survival, growth, reproduction, and energy storage, consistent with Environmental Effects Monitoring (EEM) guidance (Environment Canada 2012). To assess potential differences in reproductive success between paired study areas, the proportion of YOY arctic charr in the mine-exposed and reference areas was evaluated. Additionally, results of statistical analyses were compared both with and without the inclusion of YOY individuals in the datasets to determine if there was an approach-based impact on results and conclusions regarding reproductive success. Data related to fish survival, specifically age data and length-frequency distributions, which are analyzed as part of the Core Receiving Environment Monitoring Program (CREMP) can be used to make inferences about reproductive success and recruitment. The length-frequency distribution for nearshore arctic charr from Sheardown Lake NW has consistently been significantly different from that of Reference Lake 3 since 2015 (i.e., Sheardown Lake NW had a greater proportion of larger fish). However, there have been no consistent patterns in the relative frequencies of fish lengths between the lakes. Reference Lake 3 continues to be an appropriate point of comparison for Sheardown Lake NW, given robust statistical temporal comparisons are completed and interpretation of data considers how differences in fish endpoints between Sheardown Lake NW and Reference Lake 3 change over time. Reference: Environment Canada. 2012. Metal Mining Technical Guidance for Environmental Effects Monitoring. ISBN 978-1-100-20496-3.
40	FFH#6	The report states that "Arctic char captured at Sheardown Lake NW in 2024 were significantly longer (19%) but not significantly different in weight and therefore exhibited lower condition (-16%) compared to individuals captured during the baseline period" The report also states that the observed difference in condition between the 2024 samples and baseline exceeded the CES_C of ± 10% and indicates an ecologically meaningful difference. The report emphasizes that no consistent pattern in fork length or body weight is apparent over time and that if they were different, the metrics were frequently not significant. Overall, the report states that "no consistent changes in non-YOY condition have been observed in Sheardown Lake NW relative to Reference Lake 3 since 2015 although body condition has consistently been lower than baseline at MODs near or outside of the CES_C except in 2023. Also, potentially ecologically meaningful differences have not been consistently observed in recent	The report should identify the inconclusive evidence and discuss the absence of any consistent changes rather than rely on an invalid conclusion.	Population and health endpoints, including condition, for arctic charr in Sheardown Lake Northwest (NW) are assessed annually as part of the Core Receiving Environment Monitoring Program (CREMP; Minnow 2025). For fish condition specifically, a Critical Effect Size (CES) of 10% (expressed as a percentage of the reference mean) is used to identify effects that may be indicative of greater environmental risk, consistent with Environmental Effects Monitoring (EEM) guidance (Environment Canada 2012) and industry standards. Power analyses completed annually as part of the CREMP have demonstrated that sample sizes are sufficient to detect a CES of 10% for fish condition. Further, a weight-of-evidence approach was used to interpret potential mine-related effects to arctic charr (e.g., including consideration of productivity). For the 2025 CREMP report, patterns in arctic charr condition will be interpreted in consideration of habitat quality, food availability, thermal or oxygen stress, and contaminant

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		study years. In conclusion, no adverse mine-related effects were determined on the health of non-YOY Arctic char at Sheardown Lake NW." While no consistent pattern has been identified in condition factor relative to baseline, the observed difference in condition in 2024 between samples and baseline indicated an ecologically meaningful difference. Also, condition factor has consistently been lower than baseline at MODs near or outside of the CES_C. This may be cause for mine-related influence. Even if not, saying that no adverse mine-related effects are indicated when compared to Reference Lake 3 is not substantiated. Furthermore, to say that ecologically meaningful differences have not been consistently observed in recent study years when only 2023 did not show a significant difference is not substantiated. Even though the report states that the no mine-related effects conclusion will be verified through ongoing annual assessment of fish health, the report should still not provide such a conclusion on the basis of the evidence presented.		exposure, as data allow. Additionally, data will be evaluated within the framework of the Trigger Action Response Plan (TARP) described in Rev 2 of the Aquatic Effects Monitoring Plan (AEMP) to identify whether thresholds for implementation of management actions/additional targeted studies are warranted. Uncertainties in the assessment and the presence/absence of consistent differences in fish condition over time or relative to reference will be discussed, as appropriate, for Sheardown Lake NW. References: Environment Canada. 2012. Metal Mining Technical Guidance for Environmental Effects Monitoring. ISBN 978-1-100-20496-3. Minnow. 2025. Mary River Project 2024. Core Receiving Environment Monitoring Program Report. Prepared for Baffinland Iron Mines Corp. March. Project 247202.0075.
41	FFH#7	"Similarity in body size was reflected in a dominant size class of fish between 6 and 7 cm in both 2024 and the baseline period. Fork length and body weight of non-YOY nearshore Arctic char in Sheardown Lake SE have been inconsistent relative to baseline between 2015 and 2024. While body size has varied over the mine operational period, condition of fish from Sheardown Lake SE has frequently been lower than during the baseline period, though the MODs in 2023 and 2024 did not indicate a consistent directional difference from baseline over the length range of fish captured (i.e., the condition of smaller fish in 2024 was greater than during the baseline period while the condition of larger fish was lower. The study measures size classes using both fork length and body weight and identifies an inconsistency relative to baseline between 2015 and 2024. Comparing condition between years would be a useful measure as it would compare the same year class of fish as it aged.	Consider assessing condition factor of fish on a year-over-year basis e.g. where the size class of 6-7 cm fish is compared to one year class older in the next year to identify any changes to the same group of fish as they age.	Thank you for the recommendation. As noted in the response to comment FFH#6, population and health endpoints, including condition, for arctic charr in the mine-exposed lakes are evaluated using approaches consistent with Environmental Effects Monitoring (EEM) guidance (Environment Canada 2012) and industry standards. References: Environment Canada. 2012. Metal Mining Technical Guidance for Environmental Effects Monitoring. ISBN 978-1-100-20496-3.
42	FFH#8	The report states that "Water quality at Mary River in 2024 where parameter concentrations were within applicable FEIS significance rating magnitude predictions also meant that FEIS predictions for (absence of) effects on Arctic char health and condition were also met. Therefore, Arctic char health and condition at Mary River in 2024 conformed with predictions made in the Baffinland FEIS." No data for Arctic char health could be found in the report.	Where are the data for Arctic char health?	No studies of arctic charr in the Mary River were completed in 2024. However, fish population surveys were completed in the mine-exposed area of the Mary River in 2023, as part of the Phase 3 Environmental Effects Monitoring (EEM) program. It was concluded that, based on the EEM work completed in 2023, no effluent-related influences on fish community composition or arctic charr abundance were apparent at the receiving environment in Mary River (relative to reference). Further, fish health endpoints did not differ significantly between mine-exposed and reference areas in 2023 (e.g., growth), or differences were not outside Critical Effect Sizes (CES) (e.g., condition), suggesting that, overall, there were no adverse effluent-related influences on the health of artic charr at the Mary River in 2023. The results of the 2023 EEM lend support to the conclusions made in the 2024 CREMP report. The effects assessment in Section 5.1.4 of the 2024 Core Receiving Environment Monitoring Program (CREMP) report concluded that there were no mine-related changes in water chemistry or biota (specifically, phytoplankton and benthic invertebrates) in the Mary River in 2024.

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				Additionally, it concluded that water quality in the Mary River conformed with predictions made in the Final Environmental Impact Statement (FEIS) for the Mary River Project. The conclusion that "arctic charr health and condition at Mary River in 2024 conformed with predictions made in the Baffinland FEIS" was drawn based on the absence of mine-related changes in water chemistry and biota in 2024 and conformity of water quality results with FEIS predictions. Monitoring of arctic charr in the Mary River will be completed again in 2026, as part of the Phase 4 EEM program for the mine.
43	FFH#9	Gill netting CPUE for Arctic char in 2024 was more than twofold higher than in 2023 but was consistent with the range of earlier mine operation years. In general, fish density in Mary Lake has often been greater than both reference and baseline results. Mary Lake is also substantially larger than the other study lakes which the report states, may influence the home range size and movement patterns of the resident fish community. The broader range of habitats and greater spatial extent which results in more extensive movements and home ranges is used as rationale to explain the increased densities. These parameters however, would result in an expectation of lower density as fish would be more dispersed over the area of the lake. While we agree that the catch rates could be more variable because of the broader range of habitats and greater spatial extent, they are likely to result in fewer fish, not more. There is no evidence to assume that this variability is due to factors other than mine-related impacts.	The hypothesis of no indication of mine-related impacts should be changed and should instead reflect the uncertainty of the sampling methodology. More applicable rationale should be considered.	Please note that the gill netting catch-per-unit-effort (CPUE) for arctic charr in Mary Lake in 2023 was twofold higher than in 2024, and the CPUE for 2024 was within the range of earlier mine operation years (see Figure 5.11 in Minnow 2025). Baffinland will continue to monitor CPUE and evaluate potential mine-related effects to fish densities in Mary Lake as part of the 2025 Core Receiving Environment Monitoring Program (CREMP). Uncertainties in the assessment and potential natural and mine-related factors affecting fish densities will be discussed, as appropriate. Reference: Minnow. 2025. Mary River Project 2024. Core Receiving Environment Monitoring Program Report. Prepared for Baffinland Iron Mines Corp. March. Project 247202.0075.
44	FFH#10	The report states that the LFD for nearshore Arctic char has remained consistently different between Mary Lake and Reference Lake 3 over the period of mine operations although there have been no consistencies in relative frequencies of fish lengths. The results from non-YOY indicate a meaningful difference based on MOD exceeding the CES_C of ± 10%. Also, YOY from Mary Lake were generally longer and heavier although again, no consistent directional differences in size or condition were observed compared to Reference Lake 3. The LFD for littoral/profundal Arctic char has also reflected higher relative frequencies of larger fish in Mary Lake. Although fork length, body weight and condition were greater than Reference Lake 3 between 2018 and 2024, in 2023 no significant differences were detected. In general, no ecologically relevant differences in conditions were detected compared with baseline either. While differences in LFD and condition are ongoing, the scale of difference appears to have no pattern.	Is it possible that calculating the range of difference over time between Mary Lake and Reference Lake 3 would reveal some pattern of difference over the years? Has the level of difference between the lakes remained the same? Has this been measured?	Thank you for your comment. As part of the 2025 reporting for the Core Receiving Environment Monitoring Program (CREMP), Baffinland is considering the utility of calculating differences in a subset of fish endpoints (i.e., Environmental Effects Monitoring [EEM] endpoints) between Mary Lake (mine-exposed) and Reference Lake 3 and examining whether observed differences change over time.
45	FFH#11	In 2023 QIA recommended "that Baffinland increase the timing flexibility of its field sampling programs for Arctic char in the project and reference lakes and Tote Road streams" (App. E.13, BIMC 31, QIA CREMP#24, p. 20-22). The recommendation was in response to QIA concerns that interannual comparability of catch data was being weakened by environmental conditions that reduced catches. This was particularly evident in the 2023 Reference Lake 3 gillnetting and Tote	QIA reiterates its recommendation that Baffinland increase the timing flexibility of its field sampling programs for Arctic char in the	This comment reflects assumptions that do not align with Arctic operational realities. In addition, the comment is a repetition of comments in other regulatory forum, and is out of scope for Water Licence requirements, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details.

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		Road electrofishing, where environmental conditions (e.g., cold, windy, high flow velocity) influenced fish movements and/or sampling efforts such that far fewer fish were caught than in past years (BIM 2023 NIRB AMR, App. G.2.6, s.3.3, p. 7). The 2023 catch data may not accurately reflect culvert use by various length classes of char or the health parameters of the Reference Lake 3 char population. Both issues may be related to the timing of sampling in relation to environmental conditions, possibly due to constraints in the field sampling schedule(s). In its 2024 response Baffinland states that it has added as much flexibility as possible to these fishing programs but prefers the approach of trying to conduct the studies at the same time each year rather than adjusting to environmental conditions (App. E.13, BIMC 31, QIA CREMP#24, p. 20-22). In response to QIA's recommendation that Baffinland consider adjusting the timing of its Tote Road surveys to improve their interannual comparability, Baffinland stated "*the annual surveys generally correspond to the period following peak flow in the streams along the tote Road*." (App. E.13, BIMC 62, QIA FFH#1, p. 36). QIA supports this approach but the low catch rates in 2023, which were attributed to high flows and low water temperatures, suggest the approach is not always followed. QIA recommends Baffinland increase the survey timing flexibility to ensure that fish passage studies are conducted under optimal conditions. Adding flexibility to these sampling programs, such that uncertain results can be revisited could help to confirm whether culverts still provide unobstructed fish passage-- as opposed to requiring further remediation, and provide a more accurate temporal record of fish health and survival in the lakes for comparisons. QIA understands the access limitations, particularly helicopter access to the Reference Lake 3. Are there sharing/scheduling workarounds that might enable culvert crossings to be revisited, or facilitate helicopter access during favourable weather?	project and reference lakes and Tote Road streams.	
46	FFH#12	In its 2024 QIA NWB Annual Report for Operations Baffinland repeatedly refers to the sediment thresholds that are currently used for Arctic char egg survival (e.g., App. E.9.1, p. vi; App. E.9.2, s..2.4.1, p.17 and 24). It is correct in stating that QIA proposed the current TARP action response thresholds (Low 0.15, Moderate 0.54, and High 1 mm). The objective was to replace the 1 mm threshold from the Final Environmental Impact Statement (FEIS) with thresholds that were gradated and more precautionary. The reason is that the scientific papers cited in support of the 1 mm threshold were not based on Arctic char or Project-generated sediment (e.g., Morgan et al. 1983, Fudge and Bodaly 1984, and Berry et al. 2011). The 1 mm threshold is based on the effects of other sediments on other species of fish--some of them marine, that have different egg morphology, habitat requirements, and incubation durations. Consequently, its validity for Arctic char is very uncertain. In 2024 the open water sedimentation rates for all three habitat sampling groups in Sheardown Lake NW (SL-SHAL-1, SL-SHAL-2, and SL-DEEP-1) were at or near the highest found since sampling began in 2014 (App. E.9.2, p. 21). There is a clear increasing trend since 2019. While ice cover helps limit direct exposure of Arctic char eggs from sedimentation, the increase in open water sediment may cause them to sink deeper into the sediment in the fall and affect larval feeding in	As in 2023, QIA recommends Baffinland take a precautionary approach to sediment deposition, given that the sediment thresholds for Arctic char have not been validated, and complete studies to validate sediment thresholds for Arctic char egg survival prior to the planned production increase.	Although Baffinland is proposing to increase production, proposed activities and infrastructure changes are expected to decrease dust and sediment mobilization. For example, the crusher is being redesigned to minimize product losses from transfer points, thereby greatly reducing dust emissions. Additionally, the reduction of vehicle traffic on the road will greatly reduce dust, and effluent discharges (contributing factor at SDLT-1) are not expected to change within increased production, given the Mary River Mine does not produce tailings. At Sheardown Lake Northwest (NW), the mean sediment accumulation thickness estimate for the sediment monitoring station considered representative of arctic charr food production habitat (SHAL-1) approached the low-action Trigger Action Response Plan (TARP) threshold (0.15 millimetres [mm]) during the 2022/2023 ice cover period (Minnow 2025a). This was attributed to one of the n = 5 sediment traps having an anomalously high sediment accumulation thickness estimate for the ice-cover season, relative to the other four traps deployed at the same location and over the same timeframe (Minnow 2024). During the open-water and ice-cover periods in 2022/2023, the mean sediment accumulation thickness estimates were lower than the low-action TARP threshold value for stations SHAL-2

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		the spring. Activities related to Baffinland's plans to increase ore production from 4.2 Mtpa to 18 Mtpa may increase dust and sediment mobilization sufficiently to test these thresholds.		(arctic charr egg incubation station) and DEEP-1 (station identified to represent the maximum lake sedimentation; Minnow 2024). The sediment accumulation thickness estimates for the 2023/2024 arctic charr egg incubation period (SHAL-1, SHAL-2, and DEEP-1) were five to seven times lower than the 1 mm/year threshold identified in the Final Environmental Impact Statement (FEIS) for the Mary River Project. This threshold corresponds to project-related sediment accumulation thickness estimates that are expected to have negligible effects on direct mortality of arctic charr and arctic charr eggs. Additionally, the mean sediment accumulation thickness estimates for all station were two times below the low-action TARP threshold during the 2023/2024 ice-cover (i.e., egg incubation and pre-emergence period) season, indicating no mine-related risk of smothering or reduced larval survival of arctic charr. Finally, in 2023/2024, there was no evidence of direct sedimentation-related impacts to arctic charr recruitment in Sheardown Lake NW, based on outcomes of the Lake Sedimentation Monitoring Program (LSMP) and the Core Receiving Environment Monitoring Program (CREMP). A literature review of the influence of lake sediment deposition on fish species (and arctic charr if possible) and egg survival will be conducted and included in the 2025/2026 Lake Sedimentation Monitoring Report. Following review of the literature and the additional CREMP fish data collected in 2025, the need for additional quantitative comparisons to characterize fish population and health in Sheardown Lake NW (e.g., evaluating temporal changes in the differences between mine-exposed and reference areas over time) will also be considered. Targeted studies to validate sedimentation-related thresholds for arctic charr are not proposed at this time. References: Minnow. 2024. Mary River Project – Lake Sedimentation Monitoring 2022/2023. Prepared for Baffinland Iron Mines Corp. March. Project 237202.0080. Minnow. 2025a. Mary River Project 2023 to 2024 Lake Sedimentation Monitoring Report. Prepared for Baffinland Iron Mines Corp. March. Project 247202.0075. Minnow. 2025b. Mary River Project 2024. Core Receiving Environment Monitoring Program Report. Prepared for Baffinland Iron Mines Corp. March. Project 247202.0075.
47	FFH#13	*"On January 19, 2024, DFO issued a Letter of Advice (LOA) for Baffinland's Tote Road Culvert Remediation proposal to implement a permanent crossing solution for ten (10) corrugated steel pipe (CSP) crossings along the Tote Road (DFO, 2024)." (BIM 2023 QIA NWB ARO, s.7.3.8, p. 36). "In parallel with the issuance of the LOA, DFO issued a new Correction Measure order on February 5, 2024 requiring all 20 previously identified culverts to be remediated and to be supported by new sediment and erosion control and environmental monitoring plans."* (Main Doc. 2024, s.2.4, p. 17). In February to May 2024, prior to the spring freshet, seven (7) of the ten (10) culvert crossings identified in the DFO LOA were removed and rebuilt (App. C.1.1, s.6, pdf p. 32 of 38). Following the	QIA requests Baffinland: • provide an update by the end of September 2025 on the remediation status of the ten (10) culvert crossings that are being re-designed by DFO and Baffinland, and another update by the end of March 2026 on progress prior to the 2026 freshet,	This comment is a repetition of comments in other regulatory forum and the fish passage monitoring data that is requested is not within the Water Licence Scope or Schedule B requirements, and as such, Baffinland considers this comment complete for the purposes of this report. Please refer to the attached Table 1 for more details. An update will be provided within the 2025 Annual report body on remediation efforts of culverts on the Tote Road

No.	Intervener Cmt. No.	Intervener Comment	Intervener Recommendation	Baffinland's Response
		spring freshet three (3) of these crossings (CV-102, Cv-106, CV-216) were found to have deficiencies and require further work related to settlement (CV-106 and CV-216) and sub-surface seepage (CV-102) (Main Doc. 2024, s. 10.1.4, p. 67; App. C.1.1, s.5.3, p. 20). One culvert (CV-216) was identified as a priority for re-construction in 2025, to improve fish passage and re-establish road integrity at the crossing. Between 21 and 24 September, overland flooding from an extreme rainfall event damaged six (6) culvert crossings, one (1) of which was completely washed out. These were repaired in the following weeks. Baffinland is working with DFO to re-evaluate geotechnical work and engineering for the remaining culvert crossings based on lessons learned from the 2024 construction program (App. C.1.1, s.6, p. 36). Following culvert installation Baffinland conducted environmental monitoring at each crossing to confirm fish passage during the open water season and identify issues requiring mitigation (App. C.1.1, s.5.2, p. 29). Current velocities were expected to be maintained as calculated during the design phase. Information on whether fish were able to pass upstream via the Tote Road culverts in the spring and downstream in the fall was not found in the documents provided for this review. Lack of this information limits QIA comments to the NWB on fish passage issues, which is unfortunate as they are flow related. Currently, Baffinland's annual monitoring study of culvert fish passage is only provided with the NIRB Annual Report, after the NWB annual report period has ended. QIA comments on 2024 culvert fish passage will be provided with the NIRB Annual Report review. Despite ongoing concern regarding fish passage and delays in cover crossing remediation, QIA recognizes Baffinland's 2024 culvert replacement and remediation work as a positive development, as is the cooperation between DFO and Baffinland to improve culvert designs (App. E.13, p. 36). QIA looks forward to completion the other 10 culvert installations and hopes these efforts solve the fish passage issues.	• provide information on whether in situ water velocities in the newly installed culverts are as designed QIA recommends Baffinland: • complete Tote Road culvert remediation prior to the 2026 freshet to ensure unobstructed fish passage by juvenile Arctic char, • continue to assess whether the culvert crossings offer safe and unobstructed passage upstream in spring and downstream in fall for a range of Arctic char year classes, and • provide its annual culvert fish passage study in the documentation for reviews of both the QIA NWB Annual Report for Operations and NIRB Annual Report. QIA recommends the NWB review comments on culvert fish passage provided during the 2024 NIRB Annual Report review.	
48	FFH#14	In Sheardown Lake NW "*the relative proportion of Chironomidae at the littoral BIC stations (DL0-01-4 and DL0-01-9) was significantly and strongly negatively correlated with both sedimentation rate and accumulation thickness estimates...*" (App. E.9.2, p. 30). Chironomid larvae are particularly important prey in the diet of small and large Arctic char in Baffin Island freshwater systems in July and August (Stewart and Bernier 1988a, b). So, as Baffinland noted, a shift in the benthic invertebrate composition (BIC) that reduces chironomid availability could negatively affect juvenile growth, reproduction, and overall survival of Arctic char. In the profundal zone of Sheardown Lake NW "*...results of the correlation analysis for DL0-01-2 (BIC) and DEEP-1 (sediment trap) stations indicated that, during the open water season and over the mine operational period (2015 to 2024), benthic invertebrate densities were significantly and strongly negatively correlated with sedimentation rate, whereas Simpson's Evenness exhibited a strong positive correlation with sedimentation rate (Table 3.2, Appendix Table C.1, Appendix Figure C.5)*" (s. 3.4.2, p.33). And, "*the relative proportions of the collector-gatherer FFG [functional feeding group] were significantly and strongly negatively correlated with the sedimentation rate,*	QIA recommends Baffinland: • continue collecting sediment trap and dustfall trap samples for chemical analyses and direct comparisons of their constituents, adding TOC to the current suite of analyses, and • continue the sediment monitoring program over the long term to improve understanding of factors that influence the BIC and Arctic char population in Sheardown Lake NW and provide early warning of Project-related impacts as the mine increases production.	This comment is a repetition of comments in other regulatory forum, and as such, Baffinland considers this comment complete for the purposes of this report. In addition, comments about management plans belong with the review process for the respective management plan. Please refer to the attached Table 1 for more details.

No.	Intervener Cmt. No.	Intervener Comment	Intervener Recommendation	Baffinland's Response
		whereas the relative proportions of the filterer FFG showed a similar (i.e., strong, negative) significant correlation with sediment accumulation thickness estimates (Table 3.2, Appendix Table C.1, Appendix Figures C.5 to C.8)." These results suggest "that as sedimentation rate/accumulation estimates increase, the relative abundance of these FFGs (i.e., filterers and collector-gatherers) decreases." (s. 3.4.2, p. 35) These ecological shifts are a concern given Baffinland's plans to increase ore production from 4.2 Mtpa to 18 Mtpa. Baffinland argues that the "*sedimentation rates and accumulation thicknesses were below the Low Action TARP thresholds and FEIS predictions in 2024, and do not appear to be affecting the total benthic invertebrate densities in Sheardown Lake NW*" (p. 33). However, the TARP thresholds were not developed based on Project-generated sediment or benthic freshwater invertebrates. and changes in important prey density—particularly chironomids, are likely more important than changes in total benthic invertebrate density. The benthic invertebrate program is also point-in-time, not spread throughout the open water season. These information gaps create uncertainty regarding the overall effects of increasing sediment accumulation thicknesses. Further monitoring is needed to enable direct comparisons of the chemical components of sediment trap and dustfall trap samples and better understand how they are related (App. E.9.2, s.3.3.4, p. 30). Only one year of sediment trap chemistry is currently available for comparison. Total organic carbon (TOC) should be added to the suite of analyses to better understand its relationship to relative abundance of chironomids (s. 3.4.1, p. 32 footnote 20). The Lake Sediment Monitoring Program is an important tool for gaining understanding of factors that influence the BIC and Arctic char in Sheardown Lake NW. It should be continued over the long term to provide early warning of Project-related impacts as the mine increases production.		

Attachment 2

Table A.2: Status of ECCC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

Table A.2: Status of ECCC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

Cmt. #	Reviewer's Detailed Comment	ECCC Recommendations	Reference Section	Baffinland's Response
Total Suspended Solids Freshet Exceedances at Camp Lake Settling Ponds Outfall				
1	Freshet sampling allows for the evaluation of the effectiveness of sediment and erosion control measures in place to reduce total suspended sediment (TSS) loads contributed by snowmelt from the Project's infrastructure. Results are presented for four sites: "The Camp Lake Settling Ponds Outfall (CLSP-OUT), the Camp Lake Tributary 1 Outfall (CLT-OUT), Sheardown Lake Landfill Gate Tributary Outfall (LDFG-OUT), and Sheardown Lake Tributary 1 Outfall (SDLT-OUT)." Measured TSS concentrations at CLSP-OUT range from 206 to 433 mg/L, above the water licence criteria of 30 mg/L for grab samples and 15 mg/L for average concentrations. Concentrations are consistently higher at CLSP-OUT than at the other three sites. The Annual Report states "pro-active measures were taken prior to freshet to ensure unimpeded flow through water conveyance structures" and reports on remedial works to the drainage feeding into culvert CV-187 and SDLT-OUT. Measures employed at CLSP-OUT were not sufficient to prevent high TSS loads, which can negatively impact the aquatic environment. Further measures should be considered.	• ECCC recommends the Proponent discuss what further measures at CLSP-OUT could help reduce TSS loads at freshet.	• Main Document: 2024 QIA-NWB Annual Report (Baffinland Iron Mines Corporation, March 31, 2025) Section 7.3.1.0 Freshet Monitoring ○ Table 7.6.3: Water Quality Results for Water Licence Monitoring Location - CLSP-OUT ○ Table 7.6.4: Water Quality Results for Water Licence Monitoring Location - CLT-OUT ○ Table 7.6.5: Water Quality Results for Water Licence Monitoring Location - LDFG-OUT ○ Table 7.6.6: Water Quality Results for Water Licence Monitoring Location - SDLT-OUT *incorrectly labelled as LDFG-OUT*	As part of Modification 13, Baffinland constructed the Camp Lake Settling Pond (CLSP) structure, which has consistently demonstrated effectiveness in limiting elevated total suspended solids (TSS) concentrations to short durations in the associated stream. It is also noted that the stream has become significantly smaller in volume and flow compared to pre-construction conditions. The low-flow characteristics of the site likely contribute to higher observed concentrations due to the low flow nature across the natural sandy beach., Each year, Baffinland implements sediment and erosion control measures in accordance with the Surface Water Aquatic Effects Management Plan. These include the deployment of flocculant blocks, spring berms, and the installation of silt fencing, which collectively work to minimize the mobilization of residual sediment into the stream. Further, prior to the 2024/25 winter season, select locations around the Project Site were identified as High Priority Snow Removal Areas and/or No Snow Push Areas, including the Camp Lake Sedimentation Pond Outfall location. An awareness campaign was completed with the Departments responsible for snow management and included receptive discussions with their equipment operators about why these changes in snow management are important. This educational approach, re-enforced with monitoring of snow clearing activities by the Environment Department, proved effective by reducing snow accumulation in proximity to the outfall locations, which contributes to increased TSS results during freshet. Given the transient nature of freshet, elevated TSS timeframes dramatically decreased, impact from low flow sampling conditions, and the monitoring of the lake itself through the Core Receiving Environment Monitoring Program (CREMP) continues, Baffinland believes the mitigation measures already in place are working to effectively reduce TSS. Baffinland will continue to monitor performance and assess the effectiveness of existing infrastructure and best management practices as part of its adaptive management approach.
Recommendations in Core Receiving Environment Monitoring Plan Report				
2	The Core Receiving Environment Monitoring Program (CREMP) Report contains recommendations at the end of each sub-section discussing a creek, river or lake. Further monitoring, temporal trend analysis and the development of an Aquatic Effects Monitoring	ECCC recommends the Proponent confirm which recommendations they plan to implement and provide a timeline for implementation. A	• NWB Appendix E.9.1/NIRB Appendix G.4.1: 2024 Core Receiving Environment Monitoring Program Report	Baffinland intends to implement each of the recommendations provided in the "Effects Assessment and Recommendation" sections and Table 6.1 of the 2024 Core Receiving Environment Monitoring Program (CREMP) report. Implementation of each of these recommendations is either underway or will be

Cmt. #	Reviewer's Detailed Comment	ECCC Recommendations	Reference Section	Baffinland's Response
	Program (AEMP) benchmark for uranium are recurring recommendations. It is not clear if the Proponent intends to action some or all of the consultant's recommendations.	discussion and justification should be provided for those recommendations which they do not plan to action.	(Minnow Environmental Inc., March 2025)	initiated in 2025, with updates reported in the 2025 CREMP report and/or Annual Report, as appropriate.
Biological Effects of Elevated Iron and Aluminium Concentrations				
3	The CREMP found elevated concentrations of iron, aluminium and uranium and the CREMP Report recommends "an analysis of total compared to dissolved aqueous concentrations of aluminum, iron, and uranium will be completed to investigate biological availability and further determine potential for effects on aquatic biota." Toxicity studies have indicated that "because of chemical speciation and solubility characteristics at different pH values", colloidal and precipitated forms of aluminium can cause toxic effects on aquatic biota. Particulate iron can also "cause ecological effects via physical effects, such as smothering."	ECCC recommends the Proponent consider effects from particulate metals in addition to biological uptake activity when determining potential for effects from elevated iron and aluminium concentrations on aquatic biota.	• NWB Appendix E.9.1/NIRB Appendix G.4.1: 2024 Core Receiving Environment Monitoring Program Report (Minnow Environmental Inc., March 2025) ○ Section 3.1.5.2: CLT1 Main Stem • Federal Environmental Quality Guidelines, Aluminium (Environment and Climate Change Canada, August 2022) • Federal Environmental Quality Guidelines, Iron (Environment and Climate Change Canada, May 2024)	Baffinland will review available, peer-reviewed toxicity studies/datasets that include consideration of colloidal/precipitated forms of aluminum and colloidal/particulate forms of iron as part of this assessment. Baffinland agrees with Environment and Climate Change Canada (ECCC) that this information will inform/support development of more robust conclusions regarding the potential for effects to biota from elevated aqueous concentrations of aluminum and iron.
Charr Health and Condition in the Mary River				
4	Data collected at stations along the Mary River are presented in Section 5.1 of the CREMP Report and cover water quality, phytoplankton and benthic invertebrate community. The effects assessment at the end of the section includes the conclusion: "*arctic charr health and condition at Mary River in 2024 conformed with predictions made in the Baffinland FEIS*". It is not clear how this conclusion was reached since no data on fish health or condition was presented for stations on the Mary River.	ECCC recommends the Proponent clarify what studies were conducted on arctic charr in the Mary River and how the conclusion on their health and condition was reached.	• NWB Appendix E.9.1/NIRB Appendix G.4.1: 2024 Core Receiving Environment Monitoring Program Report (Minnow Environmental Inc., March 2025) ○ Section 5.1 Mary River	No studies of arctic charr in the Mary River were completed in 2024. However, fish population surveys were completed in the mine-exposed area of the Mary River in 2023, as part of the Phase 3 Environmental Effects Monitoring Program (EEM). It was concluded that, based on the work completed in 2023, no effluent-related influences on fish community composition or arctic charr abundance were apparent at the receiving environment in Mary River (relative to reference). Further, fish health endpoints did not differ significantly between mine-exposed and reference areas in 2023 (e.g., growth), or differences were not outside Critical Effect Sizes (CES) (e.g., condition), suggesting that, overall, there were no adverse effluent-related influences on the health of artic charr at the Mary River in 2023. The results of the 2023 EEM lend support to the conclusions made in the 2024 CREMP report. The effects assessment in Section 5.1.4 of the 2024 Core Receiving Environment Monitoring Program (CREMP) report concluded that there were no mine-related

Cmt. #	Reviewer's Detailed Comment	ECCC Recommendations	Reference Section	Baffinland's Response
				changes in water chemistry or biota (specifically, phytoplankton and benthic invertebrates) in the Mary River in 2024. Additionally, it concluded that water quality in the Mary River conformed with predictions made in the Final Environmental Impact Statement (FEIS) for the Mary River Project. The conclusion that "arctic charr health and condition at Mary River in 2024 conformed with predictions made in the Baffinland FEIS" was drawn based on the absence of mine-related changes in water chemistry and biota in 2024 and conformity of water quality results with FEIS predictions. This conclusion was not based on fish health data from 2024 because, as noted above, none were collected from Mary River that year. Monitoring of arctic charr in the Mary River will be completed again in 2026, as part of the Phase 4 EEM program for the mine.
Waste Rock Facility Thermal Model				
5	Appendix E.10 (Reclamation and Research) – is the WSP Technical Memorandum "Assessment of Active Zone Depth Considering SSP1-2.6 Climate Change Projections At Mary River Mine" (October 4, 2024). ECCC reviewed and provided comments to the NWB on this Technical Memorandum on February 27, 2024. ECCC notes that the comments and recommendations by ECCC on the technical memorandum, now presented as Appendix E.10 (Reclamation and Research) of the 2024 Annual Report, have not been addressed.	ECCC recommends the Proponent update Appendix E10 (Reclamation and Research) to include ECCC's comments and recommendations as outlined in the February 27, 2024 letter to the NWB "RE: 2AM-MRY1325 – Baffinland – Mary River Water Licence – ICRP Ver 6 and Thermal Model Reviewed".	• NWB Appendix E.10: Assessment of Active Zone Depth Considering SSP1-2.6 Climate Change Projections at Mary River Mine (WSP, October 4, 2024) ○ RE: 2AM-MRY1325 – Baffinland – Mary River Water Licence – ICRP Ver 6 and Thermal Model Reviewed (ECCC to NWB, February 27, 2025)	Baffinland would like to clarify that comments were received on January 27, 2025, not 2024. Responses to ECCC's comments were provided in a letter dated July 11, 2025 (Borcsok to Karatyan). These responses will be integrated to the next version of Appendix E.10 of the QIA-NWB annual report, as appropriate.

Attachment 3

Table A.3: Status of DFO Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

Table A.3: Status of DFO Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

Cmt. #	Reviewer's Detailed Comment	Reference Section	Baffinland's Response
1	In 2022, DFO took enforcement action and issued a *Corrective Measures Order,* pursuant to the *Fisheries Act*, requiring Baffinland to develop and submit a targeted Sediment and Erosion Control Plan and a Permanent Crossing Plan for crossings where sediment deposition and barriers to fish passage have previously been reported and identified. Baffinland had remediated 7 of the 20 crossings identified in the Corrective Measures Order in the winter of 2024. In the spring of 2024, it was determined by Baffinland that 2 of the rehabilitated crossings required complete re-designs while others required additional rehabilitation work in the summer of 2024. DFO conducted site visits of the Mary River Mine Site in July 2024, including inspections of crossings along the Tote Road. DFO found that many watercourse crossings on the Tote Road remain out of compliance with the federal *Fisheries Act* with sediment and erosion and fish passage concerns. DFO is planning site visits of the crossings in the summer of 2025.	• 7.3.8 Tote Road Monitoring Program • Appendix C1.1.; and • Appendix C1.2.	Baffinland will provide a response or update in the 2025 Annual Report.
2	At the NWB Hearing for the renewal of Baffinland's Type A water licence, Baffinland committed to providing an updated SWAEMP, including an updated crossing list, within six months of the licence approval. DFO would like to note that renewal for water licence 2AM-MRY1325 was approved on June 09, 2025. DFO anticipates the updated SWAEMP to be shared prior to December 09, 2025.	Surface Water and Aquatic Ecosystems Monitoring Plan (SWAEMP)	Baffinland will adhere to the timelines to update management plans as stated in the renewed water licence and aim to provide an updated list of all water crossings by December 9, 2025.
3	At the NWB Hearing for the renewal of Baffinland's Type A water licence (2AM-MRY1325), Baffinland Iron Mines committed to the development of **an erosion and sediment control training program for the** Mary River Mine. Baffinland indicated that the program would be rolled out in Q2 of 2025. DFO would like to request an update on this program.	Development of an Erosion and Sediment Control Training Program	The Erosion and Sediment Control Training was delivered by Baffinland to a cohort of 127 personnel on site. This cohort consisted of relevant Department Personnel who will, over the course of their employment, find themselves involved in installing, maintaining, or developing ESC controls. A Memo summarizing the training is attached to this distribution.

Attachment 4

Table A.4: Status of CIRNAC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

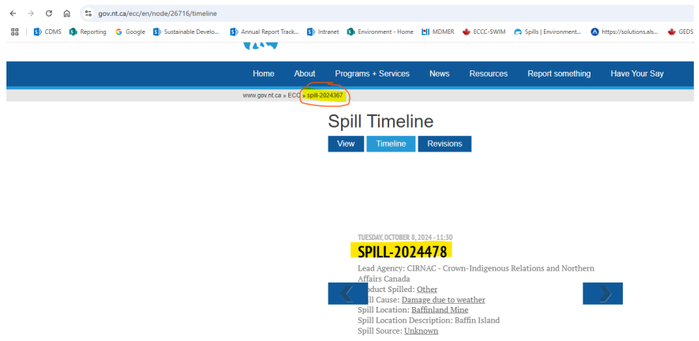
Table A.4: Status of CIRNAC Comments on Baffinland's 2024 QIA-NWB Annual Report for Operations

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
R-01	Review of Previous CIRNAC Annual Report Recommendations (2021 to 2023)	A summary of previous CIRNAC recommendations from QIA-NWB Annual Report reviews from 2021, 2022, and 2023 are provided in the attached Table A. For each recommendation CIRNAC has provided a status to indicate if a past recommendation was Addressed, Not-Addressed, Carried Forward to subsequent Annual Report Recommendations, or considered In Progress. A "In Progress" status refers to action items that have been acknowledged by Baffinland, however additional detail is required in the interim, such as providing committed schedule for delivery and/or providing additional rationale.	CIRNAC recommends Baffinland address all outstanding "Not Addressed" or "In Progress" recommendations by October 15, 2025 (i.e. 90 days from this review). Failure to do so will results in non-addressed recommendations being forwarded to field operations to be further assessed during compliance audit(s).	Baffinland will provide a response or update on October 15 2025
R-02	Revisions to Plans/ Reports/ Studies	Per Type 'A' Water Licence; Schedule B Annual Report Requirements, revisions are to be provided as addendums with an indication of where changes have been made for Plan, Reports, and Manuals. Within Section 9.2 and Table 9.1, Baffinland has included revision numbers and dates to management plans. No reference to reports, studies, or manual revisions are provided. Furthermore, while a list of management plans and dates of revisions is provided, no additional context is included. Water Licence Annual Report condition (Schedule B, Item G, ix) asks for an update, where required under Part B Item 18 of the Water Licence, which requests that "Revisions to the Plans or Manuals are to be submitted in the form of an Addendum to be included with the Annual Report required by Part B, Item 4, complete with a revisions list detailing where significant content changes are made". This condition was not sufficiently met due to the lack of addendum and revision list detailing where content changes could be found.	(R-02) CIRNAC recommends Baffinland expand upon Section 9.2 and Table 9.1 to confirm what revisions have been made to studies, reports, or manuals associated with the Annual Report. Further it is recommended that Table 9.1 includes where content changes can be found and a description of the change.	Please refer to Section 9.2 where an explanation is clearly stated, "As the board requested on October 10, 2024, management plan updates will be submitted as standalone submissions for review and approval." Furthermore, all changes made to any submitted management plans updates are detailed in a summary table at the beginning of all submitted management plan updates. Select management plan revisions are scheduled to be completed for December 9th as per requirements set out within Water Licence No: 2AM-MRY2540 Part B Item 15.
R-03	Other Details (Schedule B, section I)	Per Section I of Schedule B, the Water Licence requires Baffinland to provide "Any other details on Water use or Waste Disposal requested by the Board by November 1st or the year being reported. In the concordance table, this is listed as N/A. No other information is provided in the Annual Report.	(R-03) CIRNAC recommends Including a section in the report to confirm if other details on Water use or Waste Disposal have been requested by the Board. It is also recommended to provide a summary of past requests of this nature and whether they have been completed.	Baffinland will provide a response or update in the 2025 Annual Report.
R-04	Quantities of Seepage/Runoff at the Waste Rock Facility (WRF)	Per Section B, Item 11, the Water Licence requires Baffinland to provide a "Summary of quantities and analysis of seepage and runoff monitoring from the Landfill Facilities, Landfarm Facilities, and any other relevant facilities including ponds embankment dam". Baffinland has provided the seepage/runoff water quality at the	(R-04) CIRNAC recommends Baffinland provide the monthly measured seepage/runoff volumes at the WRF, and all other relevant facilities.	Please refer to section 7.3 of the annual report for information related to measured water runoff and seepage volumes and sample analysis. With respect to CIRNAC's concern for WRF seepages volumes, seepage water at the WRF is accounted for through the final discharge point (FDP) discharge due to the fact

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		Waste Rock Facility (WRF) in Table 7.3.6 and Tables E.6.4 through E.6.6, but no water volumes.		that all seepage and runoff from the pile is captured by the ditching surrounding the facility, which all ultimately report to the MS-08 pond.
R-05	Results of the Thermal Monitoring	Per Section E, Item 2, the Water Licence requires Baffinland to provide the "Results of the thermal monitoring and/or research carried out in conjunction with the Waste Rock Management Plan and disposal of potentially acid generating and metal leaching materials, permafrost integrity along the railway alignment and other project sites". The Annual Report provides an updated list of instrumentation at the WRF in Appendix E.15.1 but monitoring results are not presented. It is also noted that CIRNAC provided recommendations related to thermistor monitoring data and thermal modelling following review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report); these included: R-05, R-24, R-25.	(R-05) CIRNAC recommends Baffinland provide the monitoring results for all the instrumentation in operation at the WRF. The results should be formatted in tables and graphs showing the evolution over time and depth. These elements should be included in the report to facilitate trend interpretation.	Baffinland will provide a response or update in the 2025 Annual Report.
R-06	Climate Change Scenario	Appendix E.10 provides a technical memorandum about the assessment of active zone depth at WRF considering Shared Socioeconomic Pathways (SSP) 1-2.6 climate change projections. The SSP1-2.6 scenario is the most optimistic, projecting significant reductions in greenhouse gas emissions and a sustainable future. However, it is essential to also consider more conservative scenarios to gain a comprehensive understanding of the potential impacts on the WRF future geochemical stability. Per recommendation R-26 following the review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), CIRNAC recommended: a) Evaluate the predicted ground surface temperatures and permafrost development considering the effects of climate change on the waste rock pile using recent climate change predictions. Within the Appendix E.13 response, Baffinland indicated: "A thermal model to predict the impact of climate change on the depth of ground subject to seasonal freezing and thawing (active zone) at the WRF is currently being developed. A memo summarizing the results of this investigation will be provided in the next update to the ICRP."	(R-06) CIRNAC recommends Baffinland to consider multiple climate change scenarios when forecasting the long-term temperature evolution in the non-acid generating (AG) cover at WRF. By evaluating a range of scenarios, a comprehensive understanding of the potential impacts of varying climate conditions on the site can be gained. This comprehensive approach will help ensure that predictions are robust and account for different possible futures. Furthermore, CIRNAC recommends a schedule for developing a thermal model to predict the impact of climate change on the depth of ground subject to seasonal freezing and thawing at the WRF.	Baffinland will provide a response or update in the 2025 Annual Report.
R-07	Construction Works at the WRF	Per Section G, Item 4, the Water Licence requires Baffinland to provide "A summary, including photographic records before, during and after construction activities, of any modifications and/or major maintenance work carried out on facilities and Infrastructure	(R-07) Provide a summary of the construction activities carried out at the WRF in 2024, including pictures that show the progression of the works. Additionally, include a list of the main	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		designed to contain, withhold, divert or retain Water or Wastes, and an outline of any work anticipated for the next year". Section 2 of the 2024 Annual Report does not include a summary of the construction activities at the WRF. Appendix D.1 provides a picture of the WRF area with a caption mentioning the completion of geotube replacement at the WRF water treatment plant (Photo 12). However, there are no pictures	construction activities planned for 2025 in this area.	
R-08	Construction Materials – Geochemical Properties, Used Volumes and Destination	Per Section G, Item 5, the Water Licence requires Baffinland to provide "A summary of the results of any geochemical analyses conducted on materials used to construct facilities and infrastructure under Part D, Item 13". In the 2024 Annual Report, it is mentioned that waste rock from Deposit 1 and material from Quarry Q1 located at Milne Port were used for construction purposes. Appendices E.6.2 and E.7 presents the results of the Deposit #1 waste rock and Quarry Q1 material testing respectively and their classification based on Baffinland's Acid Rock Drainage (ARD) classification. Results are presented in tables but not summarized. Summary figures and graphs with interpretation typically accompanies an Annual Report. The metal leaching and acid rock drainage (ML-ARD) properties of waste rock from Deposit 1 are analyzed during the operations and validated on a regular basis with off-site laboratory tests. The properties of the Quarry Q1 material should be monitored in the same manner.	i. (R-08) CIRNAC recommends Baffinland provide summary figures and interpretative graphs for the geochemistry results of the construction materials. As well, provide detailed analytical results of the geochemical properties of the material extracted from Quarry Q1 done in an off-site laboratory for validation.	Baffinland will provide a response or update in the 2025 Annual Report.
R-09	Waste Rock ARD Classification	Per Section G, Item 11, the Water Licence requires Baffinland to provide "The results of any further acid/base accounting conducted on potential acid generating and non-potential acid generated waste rock (PAG and NPAG)". The results of the 2024 operational testing as per Baffinland's ARD classification are provided in Appendix E.6.1 through E.6.3. The results of the 2024 QA/QC drilling program on the Non-PAG cover material at WRF are detailed in Section 9.6 and Table 9.2, based on Baffinland's ARD classification. However, the drilling depth is missing in Table 9.2, which is necessary to validate the cover thickness. Additionally, there are no summary figures or graphs with interpretation. The results for the acid base accounting (ABA) and shake flask extraction (SFE) testing conducted off-site are not provided. Furthermore, the report of the third-party consultant review, which compares on-site lab results and confirms the segregation criteria, is also not included.	(R-09) CIRNAC recommends the addition of the drilling depths in the information provided in Table 9.2. Provide summary figures and interpretative graphs for the geochemistry results obtained on-site for waste rock. Provide the results of the off-site laboratory validation analysis (ABA and SFE) and the report of the third-party consultant.	Baffinland will provide a response or update in the 2025 Annual Report.
R-10	Hazardous Waste Generation	Per Schedule B of the Water Licence, Baffinland is required to provide monthly and annual volume in cubic metres of hazardous waste	(R-10) CIRNAC recommends Baffinland include a waste backhaul report and provide a summary of	Please refer to Appendix E.4, specifically the outbound manifests, for a detailed listing of materials, including waste shipped off-site in 2024. The manifests

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		generated and transported from the Project sites to licenced facilities outside of Nunavut. Section 5.2.5 of the Annual Report states: "During 2024, there were four (4) sealift backhaul events for Project waste. The backhaul sealift vessels departed Milne Port in August, September and October 2024 carrying non-hazardous and hazardous waste (not regulated by the Transportation of Dangerous Goods Act) materials generated and stored on site by the Project since the previous sealift backhaul in 2023." Baffinland also states that "additional information pertaining to Baffinland's 2024 waste backhaul program, including inventories and shipping manifests identifying waste materials shipped off the Project in 2024 for disposal, treatment and/or recycling in Southern Canada will be available upon request following final disposal of the waste materials. No Project wastes were transported and deposited in communities located in Nunavut during 2024". Section 5.2.5 does not include any detail on volumes produced and only provide a "Typical List" of types of waste that may be generated (hazardous and non-hazardous). Furthermore, Appendix E.1, the waste backhaul report, was not included by listed as "available upon request". Baffinland has not met the requirements of the Water Licence, Schedule B, Part B, V.	monthly and annual hazardous waste volumes in cubic meters produced and transported from the project sites, per Schedule B of the Water Licence.	meets the requirements of Part B schedule V. To help clarify further in the future, a volume will be provided within the body of the report for shipments of hazardous waste generated and transported from the Project sites to Licensed facility outside of Nunavut for treatment. In the case of equipment shipments—such as skidsteers or pickup trucks—all remaining dangerous goods, including fuels like diesel, were removed from the machinery prior to transport. These items are assigned a UN number in accordance with the Transportation of Dangerous Goods Act solely to identify the last contained substance, as required for classification and documentation purposes.
R-11	Record of Progressive Reclamation Activities	The Water Licence requires Baffinland to include photographic records of site conditions before and after progressive reclamation activities. Further, the Water Licence requires Baffinland to include an outline of any work anticipated for the next year, including any changes to implementation and scheduling. A summary of progressive reclamation of the borrow sites along Tote Road was mentioned, however, no photographic records or details were provided. Furthermore, no indication of planned work, changes to implementation, or schedules were provided. In addition, Section 8.1 and Table 8.1 did not include any discussion or detail on progressive reclamation of the WRF. Section 9.6 of the Annual Report describes the QA/QC results for the WRF, however, no photographic records are included to confirm and review progressive reclamation activities.	(R-11) CIRNAC recommends Baffinland provide details including reclaimed areas (in square meters) and photographic records including before and after photos for all progressive reclamation activities. Furthermore, include a summary of planned work, changes to implementation, and anticipated schedules or changes to reclamation scheduling.	Baffinland will provide a response or update in the 2025 Annual Report.
R-12	Spill Description and Identification Number: 2024-367/478	Baffinland Water Licence Annual Report requirement (Schedule B, Item C, i-ii) asks for a description of unauthorized discharges, including volumes, spill identification numbers and summaries of follow up actions. Table 6.2 references spill event '2024-367/478'. A spill report for 2024-478 is provided in Appendix E.8.3 (document 3 of	(R-12) It is recommended that Baffinland spill information is clarified for spill event '2024-367/478' to ensure that the Annual Report condition (Schedule B, Item C, i-ii) was sufficiently met. It is further recommended that the date	The 24-hour spill report that was reported concerning the unprecedented rainfall event and Tote Road washouts was initially designated with the Spill ID #367 on the online Northwest Territories and Nunavut Spills Database. At the time of submittal of the 30 day follow up report, Baffinland noted the spill ID had changed on the online database website and was assigned ID #478.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		3); however, a spill report for 2024-367 is not provided. To confirm spill events reported in the Annual Report, the Northwest Territories and Nunavut Spills Database was reviewed to assist with data clarifications, and the following observations were noted: • Spill Report ID 2024-478 is filed in the Spill Database and relates to a spill event in the North Slave region of the NWT, pointing to a potential error in the Annual Report, which reported this same spill event ID for the site; and • Spill Report ID 2024-367 is filed in the Spill Database and relates to the Sept 22, 2024 Baffinland spill event noted in Table 6.2, but this spill report was not found in the Annual Report. A Spill Report for 2024-366 was provided in in Appendix E.8.3; however, following this review, it was unclear if Baffinland spill reporting regarding event ID '2024-367/478' was completed accurately in relation to Annual Report condition Schedule B, Item C, i-ii. In addition, the date column of Table 6.2 does not specify the date type (e.g., date of spill, date reported).	column heading for Table 6.2 be revised in future reports to differentiate between the date of the spill event and the date that the event was reported.	Therefore, Baffinland was unsure of the correct ID # to report the event under and chose to identify the spill with both so as not to cause further confusion for regulators. See the below snip of the website showing the spill ID# as 478:  Spill Report 2024-366 is the resulting spill event from the September rain event in which an overtopping event occurred at Sedimentation Pond MP-05. Baffinland's annual report Table 6.2 follows the established QIA lease ops guide template for the list of reported spills and unauthorized discharges which includes: date of occurrence, quantity, product spilled, approximate location, project area, specific location, proximity to water body, sill line ID No., and whether the location is an engineered lined facility.
R-13	Actions to Address Inspection Reports - Spills	In the February 14, 2024, Water Licence Inspection Report, stained soil and 'strong fuel odor' was observed at the Light Vehicle Refueling Station. It was noted by the Inspector that the spill had been remediated and Baffinland was working toward spill prevention at the refueling site. No spill information or follow-up actions are disclosed about this spill event/location under Table 6.2 in relation to this spill event or in Appendix E8.3.	(R-13) It is recommended that Baffinland spill information is clarified for spill events summarized in Section 6.1 and Table 6.2 to ensure that the Annual Report condition (Schedule B, Item C, i-ii) is sufficiently met.	The spill in question was not classified as reportable because it was within a lined facility and because the small quantity released was below well below external reporting limits. The spill was remediated and corrective actions were relayed internally to the respective departments.
R-14	Mine Site Explosive Magazine Area – Water Quality Monitoring	Section 22 of Part I states "The licencee shall establish additional Monitoring Stations, as may be required, to effectively and adequately monitor surface runoff from the Mary River Project site(s) or discharge from Site Drainage and Surface Water Management System water associated with the Mary River Project. Within thirty (30) days of establishment of additional Monitoring Stations, the licencee shall inform the Board and the Inspector." In Photograph 22, Appendix D.1, a culvert was observed connecting a pond at the Explosive Magazine area to a suspected discharge	(R-14) CIRNAC recommends the surface water pond located at the Explosive Magazine be added to the annual Monitoring Program and be sampled for Groups 1, 5, 7 and 8 as described in Schedule I, Table 12. If this location is MS-13 it is recommended that it be included in the annual monitoring program.	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		location to the Mary River with visible iron staining (red) on the substrate of the channel. This may be a recycled water monitoring location, but the location identifier was not provided in Figure 5. Table 7.1 describes MS-13 as the "Mine Site Explosive Magazine Pond" as describes its status in 2024 as "Not Constructed". Table 2.3 states MS-13 is no longer required because the water is diverted away from this location by re-routing water to the KM105 Dam. However, based on the imagery provided by Baffinland this does not appear to be effective as water is clearly visible in Photograph 22. Photograph 26 shows an open culvert leading from the water collection pond to an iron-stained channel above the Mary River.		
R-15	Water Quality Blank and QAQC Issues	In 2022, twenty-six (26) and in 2023 fourty-six (46) water quality parameters in the field, travel and equipment blanks had values greater than their respective parameter's lower detection limit (LDL). In 2024, 160 water quality parameters in the field, travel and equipment blanks collected as part of the stream and lake sampling had values greater than their respective parameter LDL. Baffinland has shown the detectable concentrations are not related to their deionized water but linked to preparation of the blanks. In Appendix E.9.1 it is stated that the blank sample contamination is other sources that would have been likely to influence field collected samples and that water chemistry data is considered acceptable for this study.	(R-15) CIRNAC recommends Baffinland provide additional comments on what the other sources of contamination are and how they are not likely to influence field collected samples. It is also recommended standard operation protocols for sampling be reviewed to prevent further quality control and assurance issues.	Baffinland will provide a response or update in the 2025 Annual Report.
R-16	Unauthorized Discharge Reporting for Spills – Water Quality Exceedances	Water Licence Annual Report conditions (Schedule B, Item C, i-ii) require that all unauthorized discharges are disclosed via a list and description, which is to include volumes, spill report ID and summary of follow up actions. In the concordance table, these items are provided in Section 6.1, Table 6.1, Table 6.2 and Appendix E.8.3. Based on review of these materials, Water Licence Effluent Discharge Criteria exceedances and lab data at monitoring stations were not disclosed related to the spill events described in Section 9.2 or in Table 6.2. For example: • Appendix E.8.3 (2 of 3): It was noted that Spill ID 2024-193 released seepage water on May 27, 2024 at the Crusher Facility onto the tundra. The Spill was reported and is shown on Table 6.1; however, it doesn't appear that the event is described relative to exceedance of applicable criteria at monitoring stations MS-C-E or MS-06. In addition, the supporting laboratory results (Table 7 series) were not	(R-16) To understand unauthorized discharges related to exceedances of water quality criteria for all stations implicated by the spill events documented in Table 6.2, CIRNAC recommends Baffinland provide a tabular summary of Water Licence or Metal and Diamond Mining Effluent Regulations (MMER) exceedances by spill event, including: spill event ID, sample location ID, sample date/time, lab result reference and relevant parameters exceeded.	With respect to Spill ID 2024-193, the original follow-up spill report in Appendix E.8.3 (which is referenced) and section 7.3.4 include the information being requested. Sampling results from monitoring station MS-C-E are also provided in Table 7.3.12. The seepage water quality sample collected on May 27, 2024, was compliant with all analysed parameters, including acute lethality, with the exception of Total Suspended Solids (TSS). The TSS concentration measured 16 mg/L, below the applicable Metal and Diamond Mining Effluent Regulations (MDMER) criterion of 30 mg/L, but marginally above the site-specific Water Licence criterion of 15 mg/L in place at the time. The first sample of the open-water season as frozen conditions subsided at MS-C-E was collected on May 30, 2024, three days following the incident, and indicated no exceedance of applicable TSS criteria at that location. With respect to Spill ID 2024-151, as stated in section 6.1. please refer to Section 7.3.6 and Appendix E.8.3 for the information.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		referenced in Section 6.1 or Table 6.2, which impeded review of the Annual Report. • Appendix E.8.3 (1 of 3): It was noted that Spill ID # 2024-151 related to seepage release events at KM 105, which caused a variety exceedances at monitoring stations, as was summarized in the LGL Limited June 10-12, 2024 Environmental Inspection Report. While the spill(s) were described in Section 6.1 via Table 6.2 of the Annual Report, it does not appear that instances of exceedances above applicable criteria are reported.		Baffinland acknowledges CIRNAC's recommendation; however, the information requested is already presented in Appendix E.8.3 of the Annual Report and is succinctly summarised per incident within Appendix E.8.3.
R-17	Tote Road Priority Actions	Per recommendation R-07 following review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), Baffinland indicated "A third-party re-assessment of the Tote Road borrow areas was completed and will inform the detailed action plan for addressing geotechnical risks associated with all identified borrow areas. The full detailed plan will be presented in the 2024 NWB QIA Annual Report for Operations". Baffinland provided the 2023 Tetra Tech Canada Inc. (Tetra Tech) report and a preliminary summary of the action plan. However, the detailed action plan has not yet been completed.	(R-17) CIRNAC recommends Baffinland provide a schedule for completion of the detailed action plan for addressing geotechnical risks associated with all identified borrow areas.	Baffinland will provide a response or update in the 2025 Annual Report.
R-18	KM105 Surface Water Management Pond Performance	Per recommendation R-09 following review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), Baffinland notes that implementation of effective mitigation measures to address seepage from the KM105 facility was unsuccessful. Baffinland and Tetra Tech determined that the preferred strategy was to cease the grout curtain approach attempted in early 2024 and focus on water management measures with the KM105 valley. A preliminary conceptual mitigation plan was provided in the January 22, 2025 letter included in Appendix E.8.3; however, a detailed mitigation plan has not yet been developed and final As-built are not complete.	(R-18) CIRNAC recommends Baffinland provide a detailed mitigation plan and associated water management measures being completed in lieu of the grout curtain approach. It is also understood Baffinland will provide detailed reporting on any modifications and/or major maintenance work carried out on all water and waste related structures as required by the Water Licence. It is understood these modifications are still development with the third-party engineer; in the interim please provide a schedule for completing the associated plans and a schedule for implementation.	As discussed in our January 22, 2025 letter, the following mitigations have been put in place and as observed by QIA, CIRNAC, and NIRB inspectors in summer 2025, are working extremely well. No concerns were presented with Baffinland's water management improvements and mitigation plan within the km 105 valley infrastructure. 1. Chemical dosing with Polymer at the inlet from the Mine Haul Road ditch to the first part of the KM 105 facility; has resulted in increased flocculation and settling within the first portion of the former pond. 2. Installation of a proof-of concept non-engineered filter berm mid-way in the KM 105 facility; has resulted in effective filtering of solids during both high and low flows, and is informing the design of a potential engineered filter berm should it be evaluated that the existing 2025 filter berm installed prior to Freshet needs external engineering to improve water quality within the facility. 3. Further polishing and settling in the downstream pond including the installation of mid-pond silt curtains. This sedimentation mitigation measures installed within the pond maintain water quality at the monitoring/compliance location as submitted within the modification request within Appendix E.12 of the 2024 Annual Report. This monitoring location has been sampled as per water licence MDMER required monitoring frequencies in 2025 and results will be

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
				provided within the 2025 Annual report to support the improvements within water quality sourcing from the facility. Engineering for the design for the engineered final discharge point to monitor flow under the MDMER is underway. The monitoring of the discharge continued throughout 2025 and is not impacted as the expected weir structure is designed. . Reporting including final as-built reports will also follow requirements of our Water Licence, commercial Lease, and Project Certificate.
R-19	Alternative Remediation Methods for Hydrocarbon-Impacted Soils	Per recommendation R-18 following review of the 2023 Annual Report, Baffinland acknowledged and will continue to prioritize the investigation of alternative remediation methods for the treatment and disposal of hydrocarbon impacted soils. Further, Baffinland notes that "Due to various operational issues sufficient details are not yet available for inclusion in the 2024 Annual Report".	(R-19) CIRNAC recommends a schedule for delivery of a remediation plan and/or study work plan for ongoing investigation of alternative remediation treatment and hydrocarbon disposal be provided.	Baffinland will provide a response or update in the 2025 Annual Report.
R-20	Schedule I Monitoring Requirements	Per recommendation R-19 and R-22 following the review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), CIRNAC requested: a) (R-19) Water quality samples should be analyzed per the Group 7 parameters listed in Schedule I, Table 12 of the Water Licence, which includes both total and dissolved parameters. b) (R-19) Flow rates should be measured from seepages and collection ditches to refine the water balance and support the geochemical review of the WRF performance; and c) (R-22) That Baffinland provide all results of the Schedule I monitoring parameters required by the Water Licence no later than September 30, 2024, and in all future Annual Reports. A review of 2024 monitoring reports and tables provided in the Annual Report identified total and dissolved metals do not appear to be collected at the required frequency. For example, location MS-07 should be sampled monthly during the summer for Groups 1 and 7 parameters. A review of the tables includes analysis of Groups 1 and 7 parameters for one September 2024 sample, and one October 2024 sample. However, flow volumes and analysis of other parameters (e.g., TSS and oil and grease) were collected between the months of June and August (i.e., summer). As such, it appears all Group 1 and 7 parameters were not sampled during the summer months, as required by the Water Licence, Schedule I.	(R-20) CIRNAC requests: a) Include methodology and back-up data for how flow rates and/or discharge volumes are calculated at each monitoring location. b) A summary table of sampling locations to confirm Schedule I monitoring and sampling requirements are being met. This should include confirmation sampling/ monitoring was completed at the required frequency and analysis was completed for the required parameters for each applicable location listed in Schedule I of the Water Licence. Clear rationale for any deviations should be included.	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		Table 7.1 within the Annual Report provides a summary of sample locations, however, limited detail is provided to confirm sampling frequency and analysis requirements under Schedule I of the Water Licence have been met. Flow rate/ volume measurements are presented in the Tables appended to the Annual Report and are generally reported as cubic metre per day. It was not clear how these flow measurements were derived.		
R-21	Performance of P-SWD-3 Surface Water Collection Ditch	Per recommendation R-10 following the review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), CIRNAC recommended: a)Continue to monitor the P-SWD-3 to ensure that the improvement work was effective (if it was reconstructed) and that it meets the required intent to convey surface runoff, as part of the follow up action. Provide a detailed update regarding efficacy of the redesign in the 2024 Annual Report. b) Implement the recommendation in the 2023 Annual Geotechnical Inspection Reports which include: i. Redesign and reconstruct the ditch to drain the large amount of surface water arising from the snow stockpile located to the north-east. ii. A perimeter diversion berm be provided around the snow stockpile area and that the surface water generated by the melting snow be conveyed to the P-SWD-3 ditch in a separate new drainage ditch. iii. Ditch reconstruction should consider reinstalling a culvert beneath the access road to the snow stockpile to the correct invert levels. iv. A rock-fill check dam be installed at the discharge point of the upgraded ditch. c) Assess the thermal and freeze/thaw stability of all drainage ditches and its slopes to ensure the ditches meet the design intent of conveying surface runoff. Baffinland's response indicated: "The 2024 Geotechnical Inspection was completed (Appendix C.2 of the 2024 NWB QIA Annual Report for Operations), and the geotechnical engineer has provided new recommendations. Baffinland has committed to take the following action: Drainage improvement initiatives will be considered in 2025	(R-21) CIRNAC retains the recommendation from 2023 until geotechnical engineer recommendations from the 2024 Geotechnical Inspection are implemented and a response to recommendation point c) is provided by Baffinland's geotechnical engineer.	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		with intent to improve the drainage capability of the P-SWD-3 ditch. Damaged or impacted culverts will be evaluated to consider if it still effectively passes water." Baffinland also indicated in response to recommendation point c) above: "Baffinland will review this recommendation with the geotechnical engineer for assessment during the 2025 annual Geotechnical Inspection."		
R-22	Seepage monitoring	As per Part I of the Water Licence it is the responsibility of Baffinland to monitor and report seepage from all facilities designed to contain, withhold, divert or retain water or wastes. The current groundwater monitoring program only focuses on the landfill facility and select hazardous waste berm facilities. There are no groundwater wells to monitor any potential seepages from other areas of the Site including but not limited to the pit (Mine Workings Area), waste rock facility, ore storage pads, etc. There appears to be no way to assess if liners are performing as intended outside of observing if they are retaining water and that no seepage is observed at the toe of the berms. Additionally, several division features are unlined. At the waste rock facility based on the LGL Limited inspection completed in September it was noted that there is still concern that the liner within the collection pond may be leaking. Seepage is being monitored through visual observations but there is no current or mention of future monitoring of groundwater to determine if seepage is discharging through the subsurface.	(R-22) CIRNAC recommends that the groundwater monitoring plan be expanded to the WRF and other areas of the site to assess for potential subsurface seepage in the active zone. This should include any areas where seepage as defined by the licence may be present.	Baffinland will provide a response or update in the 2025 Annual Report.
R-23	Rainfall/ Climate Change	There was an unprecedented rainfall event at the site on September 20, 2024 (App C1.2; Construction Summary Report Tote Road Emergency Remediation September 2024). It has resulted in significant damage to the roads and surface runoff management infrastructure. An unprecedented rainfall event calls for a special engineering inspection of all earthworks (dams, dikes, spillways) associated with the surface water management systems. This event may require re-examining the hydrology design criteria for the project and the climate change predictions at the site incorporating site climatic historic data.	(R-23) CIRNAC recommends the site climatic database be updated, the hydrology design criteria be re-evaluated, surface water management infrastructure adequacy be re-evaluated, and all dykes, dams & related earthworks are inspected by the Engineer of Record.	Baffinland will provide a response or update in the 2025 Annual Report.
R-24	Acidification in ML/ARD Samples	Per recommendation R-27 following the review of the 2023 Annual Report (Appendix E.13 of the 2024 Annual Report), CIRNAC recommended: a) List the concentration range of the melanterite measured in the waste rock samples;	(R-24) CIRNAC has retained last year's comment while the Pit water Quality model is being developed. Please provide a schedule for completing the Pit Water Quality Model.	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		b) Correlate SFE iron and sulphate concentrations for waste rock samples with low paste pH; and c) Evaluate if melanterite dissolution could provide the required acidity. Baffinland's response indicated: "Baffinland has engaged Stantec to develop a comprehensive Pit Water Quality Model that will take into consideration all aspects of the listed recommendation, including modelled Melanterite concentrations and potential dissolution mechanisms. The Pit Water Quality Model will evaluate all inputs and considerations affecting ARD potential and other mechanisms that could contribute to the dissolution of metals from the mine ore and wastes and the resulting short and long term effects on water quality."		
R-25	Management Plan Updates – Baffinland Spill Contingency Plans	Section 9.2 of the Annual Report and Table 9.1 address Baffinland management plan updates, regarding Annual Report condition Schedule B, Item C, iii. Table 9.1 indicates that no updates were provided for the three Spill Contingency Plans associated with the operation, which include the: Spill at Sea Response Plan (2015); Spill Contingency Plan (2021); and Exploration Spill Contingency Plan (2021). Table 9.1 indicates that the site Spill Contingency Plan (2021) may be reviewed and revised if applicable in 2025. A review of Baffinland spill data via the Northwest Territories and Nunavut Spill Database was conducted to review all available spill data since 2010, and all available spill data from 2021 to present. There were 44 spill events noted for the period of 2021 to present. In relation to 'Product Spilled', 36 of the 44 spills (82%) constituted categories of 'Other', 'Wastewater/Impacted Water' and 'Petroleum – Fuel Oil (jet A, diesel, turbo A, heat)'. In relation to 'Spill Cause' data, 24 of the 44 spills (55%) were caused by 'Breakage' (6), 'Other' (3) and 'Unknown Cause' (5). The current Spill Contingency Plan (2021) does not appear to address all spill scenarios related to the currently understood spill risks for the mine site. As an example, the current Spill Contingency Plan (2021) does not identify 'Wastewater/Impacted Water' as a key spill substance nor does it include this substance under spill scenarios and response protocols of Section 8. While the data extracted from the Spill Database was not validated by CIRNAC, these data trends are considered to be a reasonable snapshot of spill activity. These details	(R-25) CIRNAC recommends that the Spill Contingency Plan(s) include prevention measures and response protocols related to known or trending spill risk scenarios based on review of site spill data (e.g., Wastewater / Impacted Water) to more thoroughly satisfy the intent of Annual Report conditions Schedule B, Item C, i-iii.	Baffinland will provide a response or update in the 2025 Annual Report.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		are provided as justification context for Baffinland to consider future updates to the Spill Contingency Plan(s) which should address realistic spill risk scenarios that are noted by data trends, in addition to risk assessment and other forms of analysis that inform the Spill Contingency Plan(s). For all spill scenarios outlined in the Spill Contingency Plan (2021) Section 8, preventive actions that can mitigate trending spill risks from occurring should also be added to compliment spill response protocols.		
R-26	Risk-Based Screening Criteria for Groundwater Monitoring	CIRNAC has provided recommendations for Risk-Based Screening Criteria for Groundwater Monitoring in 2023 (R-16 following review of the 2022 Annual Report), and 2024 (R-14 following review of the 2023 Annual Report). These past recommendations are considered to be not addressed. The following data gaps are noted: • A different risk ranking criteria has been applied for the Milne Port and Mine Site. Discrepancies within the ranking system have not been addressed. • Baffinland has acknowledged increasing trends in surface water bodies which should be considered changing conditions which requires a reanalysis of the ranking system. • Baffinland has not yet provided the test-pit coordinates and rationale on how they are sufficient to characterize groundwater conditions across the entire WRF.	(R-26) Past Recommendations from CIRNAC are re-iterated below: a) Provide additional rationale as to how facilities are scored and how the levels of classification are chosen. If based on the ranking criteria used in Knight Piesold (2024b) the landfill facility and hazardous waste berm facility are considered medium risk, then groundwater monitoring should be implemented at all medium risk facilities. Furthermore, risk ranking methodologies between Milne Port and the Mine Site differ. Provide rationale for this discrepancy. Based on the proximity of the Ore Stockpile to the freshwater river to the west and marine environment to the north, groundwater monitoring and an expanded surface water monitoring network is recommended. b) Provide additional rationale on why the risk ranking has not been reevaluated following the identification of various changing conditions including increasing trends related to mine impacts, potentially leaking waste rock facility collection pond liner, increasing trends due to the emulsion plant, etc. c) Provide additional detail regarding the 2021 test pit program, including test pit locations, test pit logs and rationale on why two test pits are deemed to be sufficient for assessing the presence of groundwater in an area over 50 hectares. Rationale should also be provided for	Baffinland will provide a response or update on October 15.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
			why the use of a drill rig for monitoring well installation within the WRF was not followed. CIRNAC recommends Baffinland address these outstanding recommendations by October 15, 2025 (i.e. 90 days from this review).	
R-27	Waste Rock Management (WRF)	Following review of the 2022 Annual Report, CIRNAC made the following recommendations in 2023 (R-08) pertaining to Waste Rock Management at the WRF: *"a. Provide:* *i) Operational details and figures on waste rock placement (e.g. how and where, etc.) to allow for comparison of actual activities versus requirements of the Waste Rock Management Plan.* *ii) Cumulative information on waste rock stored to date.* *iii) Additional supporting information for Baffinland's conclusion that 17% of seepage samples from the Waste Rock Facility (WRF) being acidic is not an issue for concern.* *b. Consider the following as part of that process to better inform WRF performance:* *i) Measurement of dissolved concentrations in addition to total concentrations.* *ii) Examination of trends for metals and metalloids of environmental concern. Several of these metals and metalloids reported total concentrations greater than the detection limit and are possibly associated with neutral mine drainage from the WRF. These include dissolved aluminium, iron, manganese, cadmium, chromium, copper, lead, mercury, nickel, selenium, and zinc* *c. Investigation of total dissolved solids concentrations well above 1000 mg/L which in the absence of explained alternate source of salinity suggests the waste rock may be a significant point source of salinity and potential adverse effects on revegetation of the final landform at closure and what mitigation measures need to be in place.* *d. Provide a comment about the amount of potentially acid generating material (PAG) remaining well above expected levels as this has potential WRF construction implications, particularly at*	(R-27) CIRNAC recommends: a) Baffinland provide additional supporting information for Baffinland's conclusion that 17% of seepage samples from the Waste Rock Facility (WRF) being acidic is not an issue for concern. b) Baffinland provide an examination of trends for metals and metalloids of environmental concern for the WRF, including figures. Several of these metals and metalloids reported total concentrations greater than the detection limit and are possibly associated with neutral mine drainage from the WRF. These include dissolved aluminium, iron, manganese, cadmium, chromium, copper, lead, mercury, nickel, selenium, and zinc. c) Baffinland complete an investigation of total dissolved solids concentrations above 1000 mg/L at the WRF which in the absence of explained alternate source of salinity suggests the waste rock may be a significant point source of salinity and potential adverse effects on revegetation of the final landform at closure. It is also recommend that Baffinland provide mitigation measures the source of salinity. CIRNAC recommends Baffinland address these outstanding recommendations by October 15, 2025 (i.e. 90 days from this review).	Baffinland will provide a response or update on October 15.

	Subject	Reviewer's Detailed Comment	CIRNAC Recommendations	Baffinland's Response
		closure (i.e. greater than anticipated volume may require significantly greater cover thickness, etc).” Following a review of historical CIRNAC recommendations (See R-01 of this report), it was noted that this recommendation has only been partially addressed. The following outstanding items were noted in reference to the 2023 Recommendations above: • For recommendation a), all sub-recommendations except iii) are considered addressed; • For recommendation b), ii) was not provided for the WRF; and • Recommendation c) is considered not addressed.		

Attachment 5

Table B.1: 2024 Annual Report QIA Comments no response

Table B.2: - 2024 Annual Report QIA Comments No Response

	Comment or Recommendation	Justification for Recommended Exclusion from 2024 Intervenor Comments		
		Repetition of Comments in Other Regulatory Forum	**Details Regarding Repetition**	**Outside of Annual Report Requirements – Baffinland's Suggested Approach & Notes for QIA**
QIA NWB GGC #1	**Recommendation:** "Please provide available documentation, photographs of proposed and applicable repairs discussed within Appendix C.2, as well as estimated timing of referenced routine maintenance"	2024 NIRB GC #1	Repetitive question previously responded to. Incorrect appendix referenced in the NIRB Annual Report comment.	Geotechnical inspections are not included in Schedule B of the Water Licence, which specifies the items to be included in the Annual Report. Therefore, Baffinland suggests that QIA requests this information prior to onsite visits or through an information request. Baffinland includes the annual geotechnical inspection report as an appendix to annual reports; therefore, an update is provided annually on the status of the third-party engineer's recommendations.
QIA NWB GGC #3	**Recommendation:** "Provide documentation of the lab testing data or literature which supports the material characteristics used in the stability assessment. To better understand risks associated with potential variations in materials, it is recommended sensitivity analyses be completed at lower strengths to verify that minimum recommended Factors of Safety are met."	2024 NIRB GGC #3 2024 QIA Environmental Audit Report QIA-1 and 5 2023 QIA Environmental Audit Report QIA-2	Repetitive question previously responded to (NIRB comment includes additional commentary). QIA has requested information associated with the stability of the Waste Rock Pile slope in Environmental Audit Reports from 2024 and 2023. These comments were addressed fulsomely.	Baffinland would like to note that comments or recommendations of this nature can be appropriately addressed through an information request.
QIA NWB GGC #4	**Recommendation:** "Please provide an outline of the recommended repairs outlined in (Tetra Tech, 2024) which are to be completed for each planned repair and a high-level schedule of when they will occur."	2024 NIRB GGC #4	Repetitive question previously responded to, while there is no formal requirement to provide a schedule; nevertheless, Baffinland provides an annual plan within the Annual report.	There is no formal requirement for Baffinland to supply this level of detail within the annual report. However, Baffinland includes the Tote Road Priority Item Action Schedule as an appendix to annual reports; therefore, an update is provided annually on the schedule and status of repairs. A summary of the remedial work planned for 2025 was included in Table C.3.1: 2024 Updated Tote Road Priority Item Action Schedule in Appendix C.3 of the 2024 QIA-NWB Annual Report. Borrow pits remediation methods are detailed in the Tetra Tech report: 2023 Inspection of the Milne Inlet Tote Road and Associated Borrow Sources also provided in Appendix C.3.
QIA NWB GGC #5	**Recommendation:** "Please provide commentary to support the basis for the selected climate change scenario. To better understand risks and potential outcomes, it is recommended that sensitivity analyses be performed for other climate change scenarios."	Licence Renewal (QIA-TR-4) **2AM-MRY2540 ICRP Revision 6 and WRF Thermal Model Review Comments Responses**	Baffinland has previously explained its choice of approach when incorporating climate change predictions into the Interim Closure and Reclamation Plan, specifically the Waste Rock Facility thermal model.	Comments about changing aspects of management plans belong within the review process for the respective management plan (ICRP in this instance), and not within the Annual Report review process. Baffinland committed to using multiple scenarios during the Water Licence renewal process, details are available in Appendix D4 of the ICRP. Specifically, the model will consider three climate change scenarios as defined by the IPCC Sixth Assessment Report on climate change

	Comment or Recommendation	Justification for Recommended Exclusion from 2024 Intervenor Comments		
		Repetition of Comments in Other Regulatory Forum	Details Regarding Repetition	Outside of Annual Report Requirements – Baffinland's Suggested Approach & Notes for QIA
				(IPCC, 2021). These scenarios are as follows: 1.S SP1-2.6 (Global CO2 emissions cut to net zero ~2075) 2.S SP2-4.5 (Global CO2 emissions around current levels until ~2050, then falling but not reaching net zero until 2100) 3.S SP5-8.5 (Global CO_2 emissions continue to rise throughout the 21st century, with no net zero achieved by 2100) In addition to the multiple climate scenarios to be included in the 2D model, other model inputs and boundary conditions to be considered during the model formulation will include parameters such as ground temperature, freeze thaw cycle, thermal profiles and geochemical and thermophysical conditions.
QIA NWB AE #16 and FFH #2	**Recommendations:** (AE#16) "QIA requests Baffinland provide a copy of the reports (or more detailed updates) from the Pilot Study of aquatic effects of dustfall and sediment on Tote Road streams and the Pilot study of rubber tire contaminants along the Tote Road, along with any plans or alternative approaches for related future work." (FFH#2) "Given that the current sediment trap-based program cannot effectively assess the potential risk to fish from tire-derived metals and chemicals, QIA requests that Baffinland develop and implement an alternative, scientifically robust monitoring program to meet this objective. A specific timeline to proposal review and implementation is requested as a component of the response."	NIRB 2024 Annual Report Comment DF #12	The first part of QIA/NWB Annual Report comment AE#16 and NIRB 2024 Annual Report comment DF#12 are asking for the same thing in different wording. While the second request from NWB/QIA Annual Report comment AE#16 is repeated again in FFH#2.	This is not a requirement under the Water Licence; however, it is within the scope of the Project Certificate and Management Plans required under the Project Certificate. There is no formal requirement for Baffinland to conduct the monitoring program and conclusions of the study support discontinuation of the study. Sediment sampling within erosional environments is not Industry standard and not included within Federal Environmental Effects Monitoring (EEM) Studies.
QIA NWB AE #1	Comment: "QIA-7 from the inspection reports recommended that turbidity controls be installed along uncontrolled areas of the Tote Road, to minimize sediment load in the surrounding water bodies (P. 42). Baffinland's response indicated that sediment and erosion controls were implemented per the SWAEMP, and that water quality monitoring (for suspended solids) continued to be conducted at select crossings along the Tote Road, as per the Roads Management Plan, which was reported to meet guidelines in 2024. Further, QIA had requested in 2023 that ditches along the Mine Haul Road be reconstructed and rock check dams be installed to accommodate higher flows and reduce velocities (thereby reducing erosion) (P. 91). It was reported by LGL Limited in 2024 that no action had occurred to address the 2023 recommendation. Additionally, LGL Limited highlighted that high amounts of road sediments were entering stream channels and lakes throughout the	NWB/QIA 2023 Annual Report comment GC#1 2024 September QIA Environmental Inspection Report #1 Item #1 2023 June QIA Environmental Inspection Report LGL-1 and QIA-4	Repetitive question previously responded to. The comment from QIA has been responded to previously.	This comment is within scope; however, we have already provided comprehensive responses on this topic several times. If there are remaining questions, it would be more effective to raise them through an information request or in a meeting, rather than continuing to include them in the Annual Report review process.

	Comment or Recommendation	Justification for Recommended Exclusion from 2024 Intervenor Comments		
		Repetition of Comments in Other Regulatory Forum	Details Regarding Repetition	Outside of Annual Report Requirements – Baffinland's Suggested Approach & Notes for QIA
	project area, exacerbated by rain and snowmelt, and recommended that an effective (and high-resolution) ESC plan be implemented, including increased use of coir logs and sediment curtains (for example) along roadside margins and adjacent to water bodies." Recommendation: "Baffinland should commit to reconstructing the ditches along the Mine Haul Road to accommodate higher flow volumes, and rock check dams as recommended by QIA in 2023. Once implemented, Baffinland should commit to conducting higher-resolution monitoring in the downstream environment, to ensure that ditch reconstruction and rock check dams have been successfully installed and are performing as intended. Additionally, Baffinland should prepare/implement more robust ESC measures along roadside margins and adjacent to water bodies, as recommended by LGL Limited. A higher resolution ESC monitoring program should be implemented to ensure that routine monitoring occurs at a sufficient temporal scale, and includes measures to respond to sediment and erosion issues in a timely, proactive manner. Baffinland should provide a timeline for developing and implementing a monitoring program (i.e., Special Effects Study) for assessing effectiveness of any newly-implemented ESC measures along roadside margins, Mine Haul Road ditches, and adjacent to downgradient water bodies."	2023 September QIA Environmental Inspection comment #11		
QIA NWB AE #3	**Comment:** "Under the freshet monitoring programs several non-compliant releases were documented by BIM. These non-compliant releases occurred at Sheardown Lake Tributary 1 outfall (SDLT-OUT), Camp Lake Tributary 1 outfall (CLT-OUT), Sheardown Lake Landfill Gate Tributary outfall (LDFG-OUT) and Camp Lake Settling Pond outlet (CLSP-OUT). The Camp Lake Settling Pond outfall was measured on four dates between June 3 and June 12, 2024 and concentrations of TSS ranged between 206 mg/L and 433 mg/L. Concentrations at the other four outfall locations ranged between 1.3 mg/L (LDFG-OUT) and 62.1 mg/L (CLT-OUT) on the same dates. It is understood that water was discharged from the Camp Lake Settling Pond outfall for a shorter period of time compared to the other four sites. The elevated concentrations measured, however are of concern as it appears current management plans are not sufficient to maintain TSS concentrations below water license criteria at this location." **Recommendation:** "Describe the unique characteristics of site CLSP-OUT that lead to TSS concentrations greatly above the water licence criteria and indicate management techniques that can be applied to address the characteristics of this site and maintain TSS concentrations below water license criteria during spring freshet. Provide a timeline when these management techniques will be implemented to curtail noncompliant discharges."	NWB/QIA 2022 Annual Report Comment WQ# 6, 9, and 10 2024 Licence Renewal QIA-TR-12	In the NWB/QIA 2024 Annual Report comment AE#3, QIA singled out CLSP, however in 2022 QIA commented on all freshet sites. In the Licence renewal, comment QIA-TR-12 QIA mentions the Mary River Project as a whole will experience sedimentation issues during freshet.	It should be noted that Freshet monitoring IDs are not associated with licence compliance locations and do not constitute non -compliances. The monitoring data discussed forms verification and adaptative management monitoring data that is used to inform on sedimentation and erosion mitigation measures during Freshet. The FEIS predicted impacts within mine site drainages and Baffinland continues to mitigate them through ongoing improvement to water management infrastructure, snow management and Project drainage while installing erosion and sedimentation controls. Baffinland remains committed to implementing our current mitigations governed by our various applicable management plans, and to implement adaptive management to make improvements where warranted, and where possible.

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QIA NWB AE #6	**Recommendation:** "Undertake and complete establishment of a uranium benchmark."	2024 NIRB WQ #8	Intervener Recommendations are exactly the same for both NWB and NIRB reports, despite differences in comment wording.	Baffinland wishes to emphasize that comments or recommendations which reiterate existing commitments do not add substantive value. The creation of a uranium benchmark was committed to during the relicensing hearings process.
QIA NWB AE #12	**Recommendation:** "QIA recommends Baffinland collect sediment cores during the winter or summer 2026 field seasons from Project exposed and Reference lakes to establish clearer temporal records of pre-Project deposition quantity and quality and provide context for ongoing deposition of iron and other metals. Sediment cores should be extruded at 0.5cm intervals and dated using radio isotopes of lead to establish a chronology and put changes in sediment chemistry into temporal context. Each discrete sediment layer should be examined for sediment chemistry of key variables."	NWB/QIA 2023 Annual Report comments CREMP #22 and 25 2024 Licence Renewal QIA-TR-14	In their 2023 intervener comments, QIA requested that Baffinland explore the feasibility of collecting sediment core samples. Baffinland responded that such sampling was not feasible and provided supporting rationale. In both the 2024 licence renewal comments and the 2024 NWB/QIA Annual Report comments, QIA reiterated this request. For the licence renewal comments, Baffinland again explained that sediment core sampling was not feasible/practical and did not provide additional value to the current monitoring program.	Comments about changing aspects of management plans belong within the review process for the respective management plan (AEMP in this instance), not within the Annual Report review process. We would like to note that this request falls outside the scope. Our aquatic monitoring specialists, drawing on extensive collective experience, have carefully considered this matter and advised that it would not be practical or scientifically appropriate to pursue.
QIA NWB AE #13	**Comment:** "In its review comments on Baffinland's 2023 QIA NWB Annual Report on Operations (App. E.13, p. 22-23), QIA supported the Minnow Environmental Ltd. recommendation that Baffinland conduct temporal trend analyses to evaluate changes in the aqueous concentrations of sulphate (CLT1, SDLT1, SDLT12); molybdenum, sodium, and uranium (SLDT1, SLDT12); aluminum, nitrate, chloride, lithium, magnesium, manganese, potassium, and strontium (SLDT1) in Camp Lake Tributary 1 (i.e., CLT 1 Mainstem), and Sheardown Lake tributaries 1 and 12 (i.e., SLDT 1 and, SLDT 12). QIA also supported their recommendation to conduct temporal trend analyses to evaluate changes (i.e., since 2017) in the sediment quality and metals of Camp Lake Tributary 1 (North Branch), Sheardown Lake tributaries 1 and 9, and Sheardown Lake (Northwest and Southeast) and assess mine-related influence. In response, "Baffinland commits to a one-time submission of usable, sorted data and metadata for statistical analyses by July 31, 2025. The submission will include all the sediment and water quality data collected from Sheardown and Camp catchment (e.g., lake and tributary). QIA's analysis of this data will be completed at their expense. The outcomes of QIA's analysis will be shared with Baffinland in draft for review and to discuss in relation to any further action to be undertaken as part of the adaptive management framework." (App. E.13, p. 22-23). QIA looks forward to Baffinland sharing these data but notes that it has not volunteered to conduct these trend analyses for Baffinland."	Licence renewal QIA-TR-14/15	As a part of the WL hearing renewal, BIM and QIA agreed that Baffinland would provide QIA with the data and that QIA would do the analyses at their own cost. Baffinland has provided this data on July 31 to QIA.	Baffinland submitted the dataset to the QIA on July 31, 2025.

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QIA NWB AE #15	**Recommendation:** "QIA requests Baffinland: 1) include information on the amount of calcium chloride applied to the Tote Road each year in its QIA NWB Annual Report on Operations, and 2) assess whether there is any evidence of frequent application of calcium chloride dust suppressant on the adjacent Tote Road crossing producing measurable changes in the calcium and chloride levels of streams monitored for water quality."	NWB/QIA 2023 Annual Report comment WQ #10	The first component of the recommendation requests that Baffinland include information on the quantity of calcium chloride applied to the Tote Road within the Annual Report. This information is currently reported in the Terrestrial Environment Annual Monitoring Report appended to the NIRB Annual Report, rather than within the main text of the NWB/QIA Annual Report. The second component of the recommendation is comparable to QIA's comment on the 2022 NWB Annual Report, which asked whether a buffer zone should be established near waterbodies to mitigate potential impacts and changes to water quality. This comment was responded to previously via NWB/QIA 2023 Annual Report comment WQ #10.	The requested information is supplied in one of the appended reports required under the Project Certificate. This report is not generated through the Water Licence requirements; however, Baffinland can include the total amount (with context) of CaCl in the 2025 Annual Report.
QIA NWB AE #17	**Comment:** ""*Additional site visits are recommended throughout future seasons to verify the operation of data loggers and perform flow measurements. It is recommended that future hydrometric monitoring continue to target low flow and/or high flow periods to maintain and further validate the rating relationships. Peak flows tend to occur in the spring but not always when the channels are ice-free or when conditions permit safe access for gauging. Following the extreme rainfall observed in September 2024, peak flows that occur in summer and fall months continue to be a good to target. In future programs, if they occur, precipitation events of greater than 4 mm per day should continue to be noted as they typically result in an appreciable increase in flow, especially at the stations with smaller catchments. Precipitation events that last for more than one day, with cumulative precipitation over 10 mm, can result in much higher flow, especially earlier in the summer (mid-July to mid-August) before the active layer of permafrost fully develops.*" (App. E.9.3, s.6, p. 8) Monitoring of stream flow through the open water season is important for understanding Arctic char access to and from juvenile summering habitats upstream of the Tote Road crossings, and to inform the design of culvert stream crossings." **Recommendation:** "QIA supports the recommendations for additional hydrometric site visits throughout future seasons to verify the operation of data loggers and perform flow measurements and continued targeting of low flow and/or high flow periods--particularly extreme peak flow, to maintain and further validate the rating relationships."	NWB/QIA 2023 AEMP #2 NWB/QIA 2022 SNP #1	This comment repeats concerns already raised in 2022 and 2023 regarding site visit frequency, logger verification, and flow monitoring during high/low periods. Baffinland has previously provided detailed responses outlining monitoring methods, station setup, seasonal reconnaissance, site visit schedule, third-party quality control, and the practical/safety limitations of accessing sites during high flows. The hydrometric program has not materially changed since those clarifications, and the information provided in 2022 and 2023 remains applicable.	Comments about maintaining the status quo and not changing aspects of management plans belong within the review process for the respective management plan (SWAEMP in this instance), and not within the Annual Report review process.

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QIA NWB TE #1	**Comment:** " Table 1 recommendations from QIA's Environmental Audit Report (2024) prepared by Okane included addressing uncontrolled seepage to the surrounding environment observed near the ore crusher pad/landfill, identified on August 21, 2024. The source of the seepage was reported to be inconclusive, but was determined to not be coming from the ore crusher pad as it was consistent with runoff (due to its temperature, conductivity, and general field parameters). Baffinland has asserted that the landfill is not designed to hold or contain any infiltration water (P. 42), holds non-hazardous waste, and that comprehensive groundwater quality monitoring surrounding the landfill will continue, to characterize potential impacts from the facility. However, it was unclear whether Baffinland had a plan for responding to the uncontrolled seepage near the landfill. It is also unclear whether seepage from the crusher pad contributed to that which was observed. As Baffinland has asserted that the uncontrolled seepage is likely surface runoff (i.e., from active layer mobilization or seasonal permafrost melting), what mitigative measures (such as erosion and sediment control measures) are being taken to control runoff in this area?" **Recommendation:** Please clarify how Baffinland has responded to (and mitigated) uncontrolled seepage near the ore crusher pad/landfill (i.e., what ESC measures have been implemented in the short-term and long-term to control runoff). What specific protocols does Baffinland follow to respond to observations of uncontrolled seepage to the surrounding environment? Please provide reference to a specific section of the Spill Response Plan (or other relevant reports) which includes a proactive response plan. We note it is unclear whether the Spill Response Plan was triggered by this incident.	2024 QIA Environmental Audit QIA-8 2023 QIA Environmental Audit QIA-9	QIA has repeated the unfounded concerns regarding "uncontrolled seepage" from the landfill and crusher pad. It is important to clarify that the non-hazardous landfill was not designed as a water-retaining structure. As such, surface water runoff adjacent to the facility is as per design ed during periods of flow, and this is monitored through sampling. The landfill is designated for inert, non-hazardous waste, and surface water monitoring downgradient of the facility is compliant. With respect to seepage observed at the crusher pad, what has been identified is the natural mobilization of the active thaw layer rather than contact water. This process cannot be prevented, nor does it represent an environmental concern. Accordingly, no corrective action is required. Baffinland has explained this previously, which illustrates a fundamental misunderstanding of the reviewer(s) of site conditions.	The referenced observations are not seepage, and stem from a fundamental misunderstanding of site conditions. This, and other items related to consultant misconceptions of site conditions can be qualified through inspection discussions and reports with QIA and their consultants during the process of finalizing their report. It becomes repetitive and unnecessary to answer recommendations that have a foundation in assumptions of site conditions.
QIA NWB TE #2	**Comment:** The geochemical stability of exposed pit walls is uncertain, and may present a future water quality concern. Okane states in the Environmental Audit Report that "*while the risk of water quality issues associated with the pit walls is low compared to the WRF due to the substantial decrease in contact surface area, the same constituents of concern that lead to low observed pH values in WRF seepage in 2017 are likely present in exposed pit walls.*" (P. 7). Further, it is stated that "To meet water quality objectives of the closure plan, exposed pit walls may require a cover system to inhibit oxygen ingress and the production of ARD products. BIM has not proposed updating pit wall water quality modelling until 2029." (P. 31) Additionally, Okane stated that assumptions made in previous geotechnical analysis did not appear to be consistent with the conditions that were observed during the Audit site visit in 2024.	2024 June Environmental Audit Report #2	Repetitive question previously responded to through the environmental audit report.	This is a follow-up question to an audit report, which can and is qualified through audit discussions and reports with QIA and their consultants during the process of finalizing their report. It should be noted that Baffinland continues to monitor runoff from the waste rock stockpile to proactively identify low pH seepage concerns, as part of the Phase 1 Waste Rock Management Plan.

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	Baffinland stated in their response that an update to the water quality predictions for the pit had been proposed in the updated Phase I Waste Rock Management Plan (2023), and that pit source terms would be developed, for use in developing a predictive water quality model for operational water quality and "early closure" scenario water quality to support closure planning development. Baffinland stated that Appendix D-7 of the ICRP Revision 6 included the timeline for this work, however this document was not included within the 2024 Annual Report for Operations package. **Recommendation:** As previously stressed by Okane and QIA in the 2024 Environmental Audit Report, Baffinland should further investigate the geochemical stability of the exposed pit walls, to ensure that low-pH seepage will not occur. A timeline for the completion of updated pit wall water quality modelling should be provided. Updated water quality predictions and modelling should be reviewed by QIA and other interested third parties, when available, to determine that updated water quality modelling and long-term monitoring of exposed pit runoff is sufficient, in advance of the scheduled 2029 pit wall water quality modelling update. Baffinland should also provide a copy of Appendix D-7, for third-party review of timelines for developing pit source terms and updating water quality predictions.			
QIA NWB TE #3	**Comment:** Dust suppression continues to be a concern for Baffinland. The effectiveness of dust suppression methods was called into question by LGL Limited in their 2024 inspection, as excessive amounts of dust from heavy equipment and haul trucks was observed throughout project areas, and particularly along the Tote Road (P. 93). LGL Limited noted in their July 2024 site visit that fugitive dust from haul truck activities continued to be observed (and that the number of water trucks and volume of water being sprayed for dust suppression on the roads was far below what was needed), and therefore recommended that Baffinland increase the number of water trucks available, and implement an effective early notification system to alert managers when dust levels are increasing (P. 89, 93). It was unclear whether Baffinland had committed to implementing these recommendations. **Recommendation:** Baffinland should commit to implementing the recommendations for increasing the number of water trucks and implementing an early notification system for responding to increased dust levels.	2023 June QIA Inspection Report QIA-3 2023 September QIA Environmental Inspection Item #3 Licence Renewal comment QIA-TR-6	QIA has repeatedly requested that Baffinland increase the number of water trucks used for dust suppression. Baffinland has consistently responded that the combined use of calcium chloride and water is the most effective method for reducing dust emissions. Furthermore, water use for dust suppression has already increased more than fourfold between 2021 and 2024 (from 22,697 m^3 to 103,126 m^3). It is also important to note that, during the recent water licence renewal process, QIA requested that the Nunavut Water Board impose limits on Baffinland's water withdrawals for dust suppression. This request appears to be inconsistent with QIA's current recommendation to increase the number of water trucks, which would necessarily require water use. The language contained in the June 2024 QIA Inspection Report should also be considered, as it directly contrasts with QIA's July 2024 site visit comments. Specifically, the Inspection Report states: *"While driving on the Tote Road, significant airborne dust was noted at different periods and sections.*	These are follow-up questions, which can be and are qualified through inspection discussions and reports with QIA and their consultants during the process. Dust suppression application values increased in 2024 which QIA has not acknowledged within the comment.

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			However, the Environmental Inspectors also observed increased use of water trucks, which appear to be new. Mrs. Babin indicated there is one water truck designated for 25 km. In addition to greater quantities of water trucks, there was also increased use of road grading equipment including tire drags and graders." (page 89 of PDF, Appendix E.8.2)	
QIA NWB TE #4	**Comment:** In their 2024 Environmental Inspection Report, LGL Limited noted that snow with high sediment load was observed in the Sheardown Lake Tributary, and recommended that snow clearing operations should avoid pushing snow into the stream channel, which could be accomplished by clearly marking the area (visible during the winter). **Recommendation:** Baffinland should explicitly commit to taking steps (i.e., clearly marking the snow clearing/storage area) to prevent sediment-laden snow from being pushed into the Sheardown Lake tributary, as recommended by LGL Limited.	2024 June QIA Environmental Inspection Report #7 2024 September QIA Environmental Inspection Report #6	This concern was directly addressed within the response to the inspection reports and the appended photos provided to QIA prior to submittal of the annual report.	This is a question to an inspection report, which was explained and addressed through the inspection process and should be excluded as duplication.
QIA NWB TE #5	**Comment:** As an outcome of QIA's 2024 inspections, QIA requested Baffinland complete the leak detection investigation of the waste rock facility water treatment plant at the top of mine site scheduled for the snow-free period of 2024, or provide an alternate plan to ensure the Sediment Containment Pond contents are not released to the environment. In response, Baffinland stated that for the 2025 operational year, they will continue monitoring and implement suitable controls, including containment via ditching and pumping seepage back to the lined facility. However, Baffinland's response does not explain why the 2024 leak detection investigation was not completed, nor does it provide a revised schedule or justification for abandoning the investigation. **Recommendation:** Baffinland is requested to clearly confirm whether the leak detection investigation will be rescheduled. If it is no longer considered necessary, Baffinland to provide a detailed rationale and present an alternate plan that ensures no release of SCP contents to the environment. A specific timeline and commitment are expected in the response.	2024 QIA September Inspection Report Item #7	Intervener comment and inspection report recommendation are the same. Baffinland has already responded to this comment via the letter appended in Appendix E.8.2 which was sent directly to QIA.	If the QIA wishes to continue discussions, this can be done during the inspection process. BIM has committed to monitoring potential seepage and potential seepage is captured though a retention ditch and pumped back to the lined containment facility. It should be noted that no seepage was observed in 2025. This has been reported on and investigated in depth through historical follow up regulatory reporting and mitigation measures continue to function which supersede the initiative of a leak detection investigation.
QIA NWB TE #7	**Comment:**	NWB/QIA 2022 – TE#1	Repetitive question previously responded to.	This comment is within scope; however, it appears that QIA's comments are based on inaccurate assumptions regarding Baffinland's Reclamation Studies. Baffinland maintains the trial

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	"QIA's comment on the 2023 annual report noted a concern with the proximity of reclamation study control sites to potential disturbances like the Tote Road at sites KM52, KM16, KM18 (i.e. sites other than KM58). BMC's response appears to have misunderstood this concern and subsequent request. QIA reiterates their concern that for reclamation study sites KM52, KM16, and KM18 there appears to be a lack of information on initial site conditions/baseline at survey locations pre-disturbance (e.g. road construction, borrow site use), and the adjacent control may be influenced by indirect effects of Tote Road use (e.g. dustfall), which could influence vegetation amounts and composition, thereby influencing recommendations based on revegetation observations. QIA recognizes that the current adjacent control provides useful inferences on adjacent conditions where initial disturbance activities did not take place, however potential indirect effects from Tote Road may influence the vegetation levels at control sites. Exploring additional reference locations for documenting baseline conditions is warranted." **Recommendation:** "QIA requests that before deriving recommendations on revegetation based on observations at revegetation study sites KM52, KM16, and KM18, BIMC determine baseline site conditions pre-project disturbance (e.g. before the borrow site use) or use a similar site reference site for comparisons that is beyond the zone of influence of any adjacent activities which could impact the accuracy of results (e.g. dustfall from the Tote Road)."			provides data that is not significantly impacted by the control location. We believe the most constructive path forward would be to discuss this directly with our Subject Matter Experts within the Terrestrial Environmental Working Group or within the ICRP.
QIA NWB FFH# 1	**Comment:** QIA-6 indicated that concerns with culvert crossing inhibiting fish passage in low flows at KM33 needed to be addressed. Baffinland's response stated that they were working with DFO during on-site inspections, and that rip rap that could potentially impact fish passage in low flows had been removed. Baffinland committed to reporting on fish passage in the 2024 NWB QIA Annual Report for Operations. However, QIA's concern was primarily regarding fish strandings on areas placed above grade (i.e., the culverts installed at KM33). Baffinland's response did not indicate that any work had been conducted/planned to address the grade of these culverts. **Recommendation:** Please provide a summary of additional plans for preventing fish strandings at above-grade culverts. Additionally, please provide a copy in the 2025 NWB QIA Annual Report for Operations, for third-party review, to ensure that rip rap removal was successful, and if additional work for improving fish passage had been committed to.	NA	Baffinland submitted the 2024 Annual Tote Road Fish Habitat Monitoring Report as appendix G.2.8 to the 2024 NIRB Annual Report	Baffinland is working with DFO under Federal regulatory frameworks and is prohibited from doing any in-water work prior to design amendment approvals. Baffinland continues to work diligently to address culvert and fish passage concerns, in consultation with DFO, and undertake fish salvage as required. Engineering and hydrotechnical studies continued in 2025 to support design amendments in the future. Information on fish stranding and fish passage is not included in Schedule B of the Water Licence, which specifies the items to be included in the Annual Report. Therefore, Baffinland suggests that the QIA requests this information prior to onsite visits or through an information request. Also note that Baffinland includes the Annual Tote Road Fish Habitat Monitoring Report as an appendix to annual reports; therefore, an update is provided annually on the status of fish passage and remedial work.

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QIA NWB FFH# 3	**Comment:** As recommended following the September QIA inspection, LGL advised that the accumulation of fine materials in the short channel section downstream of the culverts at CV-216 and upstream of Muriel Lake be monitored over time, and that an assessment be conducted to determine whether any impacts to fish habitat in Muriel Lake have occurred. Baffinland's response—stating that CV-216 is a priority for additional remediation in winter 2025 and is subject to ongoing performance monitoring—does not address the specific recommendation. No commitment has been made to assess the presence or impact of fine materials on fish habitat. **Recommendation:** Baffinland is requested to explicitly commit to monitoring fine sediment accumulation at CV-216 and to conducting an assessment to determine whether current or potential impacts to fish habitat in Muriel Lake exist. A clear timeline for this assessment must also be provided.	QIA 2024 September Inspection Report Question #9 QIA 2023 June Environmental Inspection Report LGL-4	Repetitive question previously responded to through inspection process. It should be noted that Baffinland already has a monitoring program associated with CV 216 as part of the Roads Management Plan and is meeting obligations to monitor fine sediments at the crossing under the Tote Road Monitoring Program which includes CV 216. Elevated parameters were not noted in 2024.	These are follow-up questions to inspection reports. In this case QIA has requested a program that is out of scope of the Tote Road Monitoring Program. The Crossing will also be subject to a detailed monitoring program associated with conditions of fish passage following the remediation of the crossing as per DFO reporting requirements. In addition, LGL assumed that fine-grained sediments are atypical for this crossing. However, Baffinland has multiple years of data confirming that the streambed at this location is naturally composed of fine-grained sediments. In addition, long-term monitoring along the full length of the Tote Road demonstrates that mobilization of both fine and coarse-grained sediments is a natural process in these highly erodible stream channels during high-flow and freshet conditions, independent of project activities. Baffinland encourages that, in the future, such concerns be discussed directly with project staff during site inspections or close-out meetings to ensure they can be resolved collaboratively with accurate information.
QIA NWB FFH #4	**Comment:** Results from the CREMP suggest that a higher fish density in Camp Lake relative to the reference lake since mine operations began in 2015 may be associated with higher primary and secondary productivity. This increase in productivity is used as rationale to explain greater abundance of Arctic char. The same rationale is used to explain density in the nearshore area of Sheardown Lake NW relative to the Reference Lake. Yet gill net CPUE is lower despite higher chlorophyll-a concentrations. In spite of an IR to this effect in 2023, the same rationale is being used to explain the increased Arctic char density. This rationale is used in several sections of the report. Also, while a significant difference was observed for phytoplankton, none was observed for benthic invertebrates for either baseline or reference. To state that the observed change in char abundance is a direct correlation is simplistic and based on the literature, has not been adequately supported at the project. Other factors are likely in play and should be considered. **Recommendation:**	QIA NWB Annual Report CREMP #6	These two comments are expressions of the same critique.	This matter is within scope; however, we have already provided a comprehensive response on this critique. It seems possible that our response may not have been fully reviewed. If there are remaining questions, we believe the most constructive path forward would be to discuss this directly with our Subject Matter Experts in a dedicated meeting.

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	Provide hypotheses to explain increased density of Arctic char that provide a more fulsome rationale than a direct correlation between primary productivity and Arctic char abundance. Or conversely, reduce the reliance on the explanation relating primary productivity and Arctic char abundance throughout the report.			
QIA NWB FFH #11	**Recommendation:** "QIA reiterates its recommendation that Baffinland increase the timing flexibility of its field sampling programs for Arctic char in the project and reference lakes and Tote Road streams."	NIRB 2024 Annual Report Comment MAE #10 NWB/QIA 2023 Annual Report comment CREMP #24	As part of the NIRB 2024 Annual Report, comment MAE #10 the comment suggests that there may be advantages to having greater flexibility in Tote Road stream char sampling and gives the suggestion to sampling during freshet. Baffinland has previously explained to the QIA in the NWB/QIA 2023 Annual Report comment CREMP#24 we do the best we can and schedule surveys as early as possible.	This comment represents a lack of understanding of site conditions and the defined studies that require consistent temporal analyses. Baffinland will continue to plan monitoring programs endeavoring to account for site conditions while accounting for remote Arctic logistics.
QIA NWB FFH#13	**Comment:** *"On January 19, 2024, DFO issued a Letter of Advice (LOA) for Baffinland's Tote Road Culvert Remediation proposal to implement a permanent crossing solution for ten (10) corrugated steel pipe (CSP) crossings along the Tote Road (DFO, 2024)." (BIM 2023 QIA NWB ARO, s.7.3.8, p. 36). "In parallel with the issuance of the LOA, DFO issued a new Correction Measure order on February 5, 2024 requiring all 20 previously identified culverts to be remediated and to be supported by new sediment and erosion control and environmental monitoring plans."* (Main Doc. 2024, s.2.4, p. 17). In February to May 2024, prior to the spring freshet, seven (7) of the ten (10) culvert crossings identified in the DFO LOA were removed and rebuilt (App. C.1.1, s.6, pdf p. 32 of 38). Following the spring freshet three (3) of these crossings (CV-102, Cv-106, CV-216) were found to have deficiencies and require further work related to settlement (CV-106 and CV-216) and sub-surface seepage (CV-102) (Main Doc. 2024, s. 10.1.4, p. 67; App. C.1.1, s.5.3, p. 20). One culvert (CV-216) was identified as a priority for re-construction in 2025, to improve fish passage and re-establish road integrity at the crossing. Between 21 and 24 September, overland flooding from an extreme rainfall event damaged six (6) culvert crossings, one (1) of which was completely washed out. These were repaired in the following weeks. Baffinland is working with DFO to re-evaluate geotechnical work and engineering for the remaining culvert crossings based on lessons learned from the 2024 construction program (App. C.1.1, s.6, p. 36). Following culvert installation Baffinland conducted environmental monitoring at each crossing to confirm fish passage during the open water season and identify issues requiring mitigation (App. C.1.1, s.5.2, p. 29). Current velocities were expected to be maintained as calculated during the design phase. Information on whether fish were able to pass upstream via the Tote Road culverts in the spring and downstream in the fall was not found in the documents provided for this review.	NIRB 2024 Annual Report Comment MAE#4 NIRB 2024 Annual Report Comment MAE#10 NWB/QIA 2023 Annual Report comment FFH #1 NWB/QIA 2022 Annual Report comment – FH #1	Annual Report comments between NWB and NIRB for 2024 are in repetition regarding culvert work and were responded to within the NIRB process. 2024 NIRB MAE#10 comment references non-CMO culverts as well: The first request of FFH #13 is identical to that of NIRB MAE #4, however in FFH #13 QIA asks for an update on the culverts identified in the DFO CMO by the end of September and at the end of March. In NIRB MAE #4 QIA only asks for an update in the annual report. (March) QIA also repeatedly requests updates outside of the annual report as identified by the 2023 annual report comment FFH #1) and the 2022 annual report comment FH #2.	Baffinland would like to note that comments or recommendations are outside of schedule B reporting requirements and can be appropriately addressed through an information request. Baffinland continues to work with external engineers and DFO to design culvert retrofits and replacements on the Tote Road. Progress will be reported on within the body of the 2025 Annual report.

	Comment or Recommendation	Justification for Recommended Exclusion from 2024 Intervenor Comments		
		Repetition of Comments in Other Regulatory Forum	Details Regarding Repetition	Outside of Annual Report Requirements – Baffinland's Suggested Approach & Notes for QIA
	Lack of this information limits QIA comments to the NWB on fish passage issues, which is unfortunate as they are flow related. Currently, Baffinland's annual monitoring study of culvert fish passage is only provided with the NIRB Annual Report, after the NWB annual report period has ended. QIA comments on 2024 culvert fish passage will be provided with the NIRB Annual Report review. Despite ongoing concern regarding fish passage and delays in cover crossing remediation, QIA recognizes Baffinland's 2024 culvert replacement and remediation work as a positive development, as is the cooperation between DFO and Baffinland to improve culvert designs (App. E.13, p. 36). QIA looks forward to completion the other 10 culvert installations and hopes these efforts solve the fish passage issues. **Recommendation:** QIA requests Baffinland: provide an update by the end of September 2025 on the remediation status of the ten (10) culvert crossings that are being re-designed by DFO and Baffinland, and another update by the end of March 2026 on progress prior to the 2026 freshet, provide information on whether in situ water velocities in the newly installed culverts are as designed QIA recommends Baffinland: complete Tote Road culvert remediation prior to the 2026 freshet to ensure unobstructed fish passage by juvenile Arctic char, continue to assess whether the culvert crossings offer safe and unobstructed passage upstream in spring and downstream in fall for a range of Arctic char year classes, and provide its annual culvert fish passage study in the documentation for reviews of both the QIA NWB Annual Report for Operations and NIRB Annual Report. QIA recommends the NWB review comments on culvert fish passage provided during the 2024 NIRB Annual Report review.			
QIA NWB FFH #14	**Recommendation:** "QIA recommends Baffinland: continue collecting sediment trap and dustfall trap samples for chemical analyses and direct comparisons of their constituents, adding TOC to the current suite of analyses, and continue the sediment monitoring program over the long term to improve understanding of factors that influence the BIC and Arctic char population in Sheardown Lake NW and provide early warning of Project-related impacts as the mine increases production."	NIRB MAE #9	Annual Report comments between NWB and NIRB for 2024 are in repetition with exception to the first paragraph of NIRB 2024 Annual Report comment MAE#9. Further, is recommending that we continue with programs we have already committed to continuing under Management Plans.	Comments about maintaining the status quo and not changing aspects of management plans belong within the review process for the respective management plans (AEMP), and not within the Annual Report review process.

Attachment 6

250731 ESCA Update

Baffinland

Memo

To:	Nunavut Water Board, Fisheries and Oceans Canada
From:	Baffinland Iron Mines Corporation
Title:	**Erosion and Sediment Control Training**
Date:	July 31, 2025

EROSION AND SEDIMENT CONTROL TRAINING

As part of Commitments under the Water Licence 2AM-MRY1325 Renewal process, and feedback received from DFO, Baffinland developed an In-house Erosion and Sediment Control Awareness training and completed its delivery to applicable staff, prior to freshet 2025.

> **DFO Commitment # 2 in response to concern and/or recommendation by DFO (DFO-TRC-02):**
> *Baffinland will implement erosion and sediment control training as required for personnel involved with the planning, installation, and maintenance of erosion and sediment control measures. In-house Erosion and Sediment Control Awareness training will be rolled-out during winter 2024-25.*

This memo provides an update on the development of an Erosion and Sediment Control Awareness training, undertaken to fulfil this commitment. We trust that the implementation of this training satisfies the recommendation provided by DFO.

STATUS

Baffinland developed an In-house, Erosion and Sediment Control Awareness (ESCA) training, during Q4-2024 and Q1-2025. Delivery of the ESCA was completed during May 03 and June 14 2025, with a target audience of:

- Relevant Department Superintendents, Supervisors, Equipment Operators, monitoring staff, and Labourers

A total of 127 personnel received the training.

TRAINING OUTCOMES

Developed as an introduction to erosion and sediment control, the ESCA covered the following topics:

- Legislation that governs erosion and sediment control
- Types of erosion
- Factors that influence erosion
- Erosion and sediment control Best Management Practices (BMP's)
- Installation of Best Management Practices

The ESCA was derived from the Canadian Certified Inspector of Sediment and Erosion Control (CAN-CISEC), certification training, to ensure consistency with regulatory requirements and current industry knowledge and practices. Further customization of the training content was necessary to reflect the specific conditions encountered at the Mary River Project.

In particular, emphasis was placed on:

- Water erosion and how to identify it on site (rill, gully, channel erosion)
- Understanding the different qualities between cohesive soils found in more southern locations and the non-cohesive, rock and granular substrate present at the Project.
- Understanding the challenges associated with erosion and sediment control of non-cohesive soil
- Understanding how to use slope length and gradient as an erosion and sediment control BMP
- Choosing the right BMP for site-specific conditions and understanding the limitations of BMP's commonly used at the Project
- Installation of silt fences, coir logs, check dams and rock armouring

The training was well received and attendees acknowledged they underestimated the complexity of erosion and sediment control and that they had gained insight on how to better respond to active erosion and sedimentation at the Project.

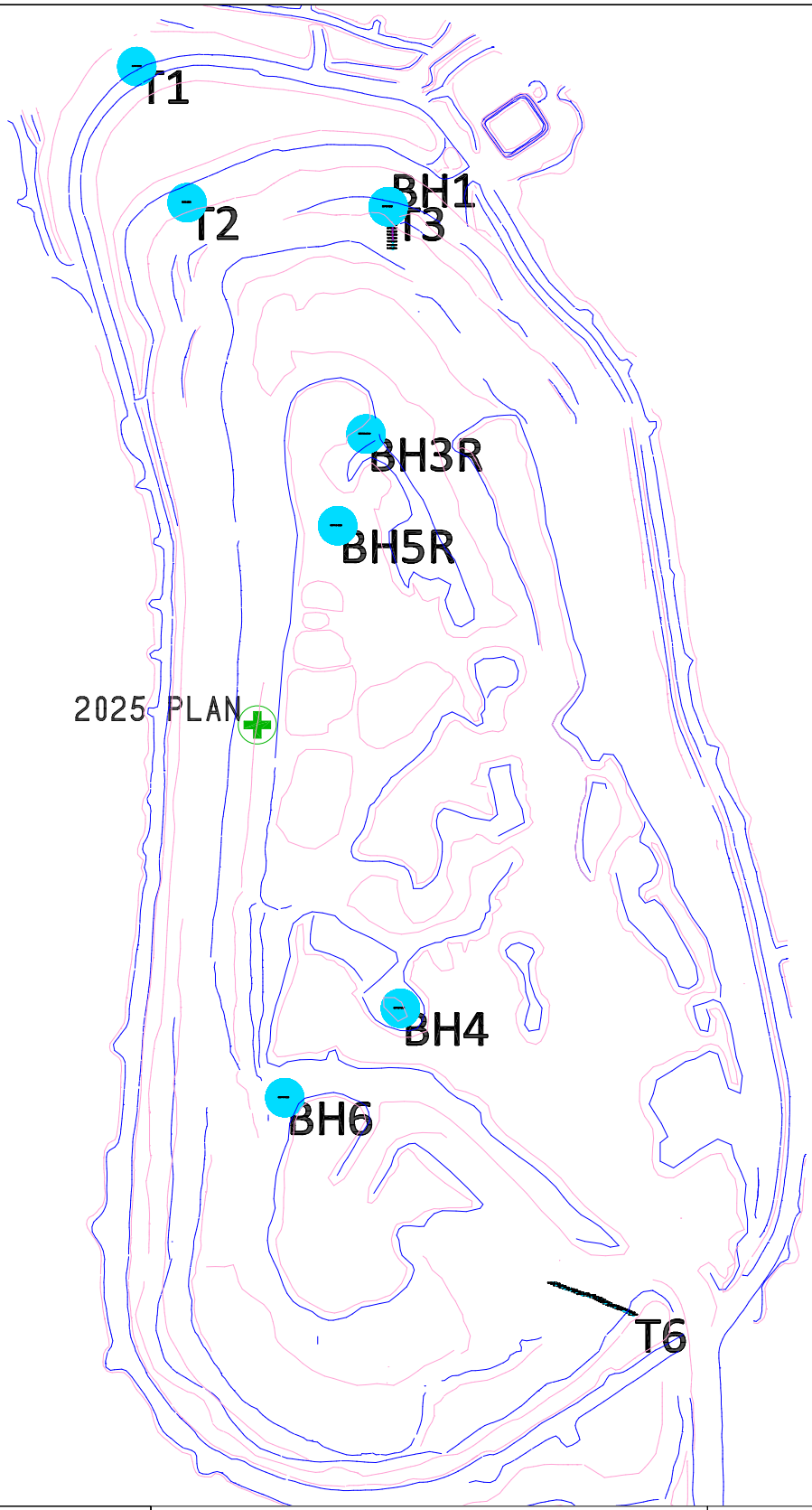
Attachment 7

July 2025 Waste Rock Facility Thermistor Monitoring R1

WRD Instrumentation Status, Thermistor Location Map & 2025 Installation Plan

Waste Rock Facility Instrumentation Status – July 2025			
Station / Sensor	**Sensor Status**	**Last Data Download**	**Damaged Sensors / Missing Data / Comments**
BH1 - Thermistor	Up	June 2025	• No known damage • Data missing between Nov 2021 and April 2022 (dead battery replaced) • Data missing between Dec 2024 and February 2025 (dead battery replaced)
BH1 - Vibrating Wire Piezometer	Up	June 2025	• No known damage • Same records as BH1 - Thermistor
BH1 - Oxygen	Permanently Down	May 2020	• Permanently down May 2020
BH3R - Thermistor	Up	June 2025	• New install October 2024 in similar location to replace previously damaged BH3 • No known damage
BH4 - Thermistor	Up	June 2025	• New install April 2024 • Nodes at 608.96m, 606.96m damaged since April 2025
BH5R - Thermistor	Up	June 2025	• New install April 2024, damaged July, reinstalled October 2024 similar location.
BH6 - Thermistor	Up	June 2025	• New Install in PAG cell October 2024 • No known damage
T1 - Thermistor	Up	June 2025	• No known damage • Data missing between July – Aug 2019 (disconnected for pond raise) • Data missing between April 2022 and July 2022
T2 - Thermistor	Up	June 2025	• Bead at 0.93m damaged since August 2019 • Missing data between April 2020 and August 2020 • Bead at 1.93m functioning inconsistently between February 2021 and June 2021. • Bead at 2.93m damaged since May 2021. • Beads at 3.93 and 4.93m functioning inconsistently since May 2021
T3 - Thermistor	Up	June 2025	• No known damage. • Data missing between June 2023 and January 2024 (dead battery replaced) • Data missing between November 2024 and February 2025 (dead battery replaced)
T6 - Thermistor	Up	June 2025	• New install October 2024 • No known damage

WASTE ROCK FACILITY: THERMISTOR LOCATION MAP



SURVEY DATE	JUNE 2025
PRINT DATE	JULY 2025

1 : 6000

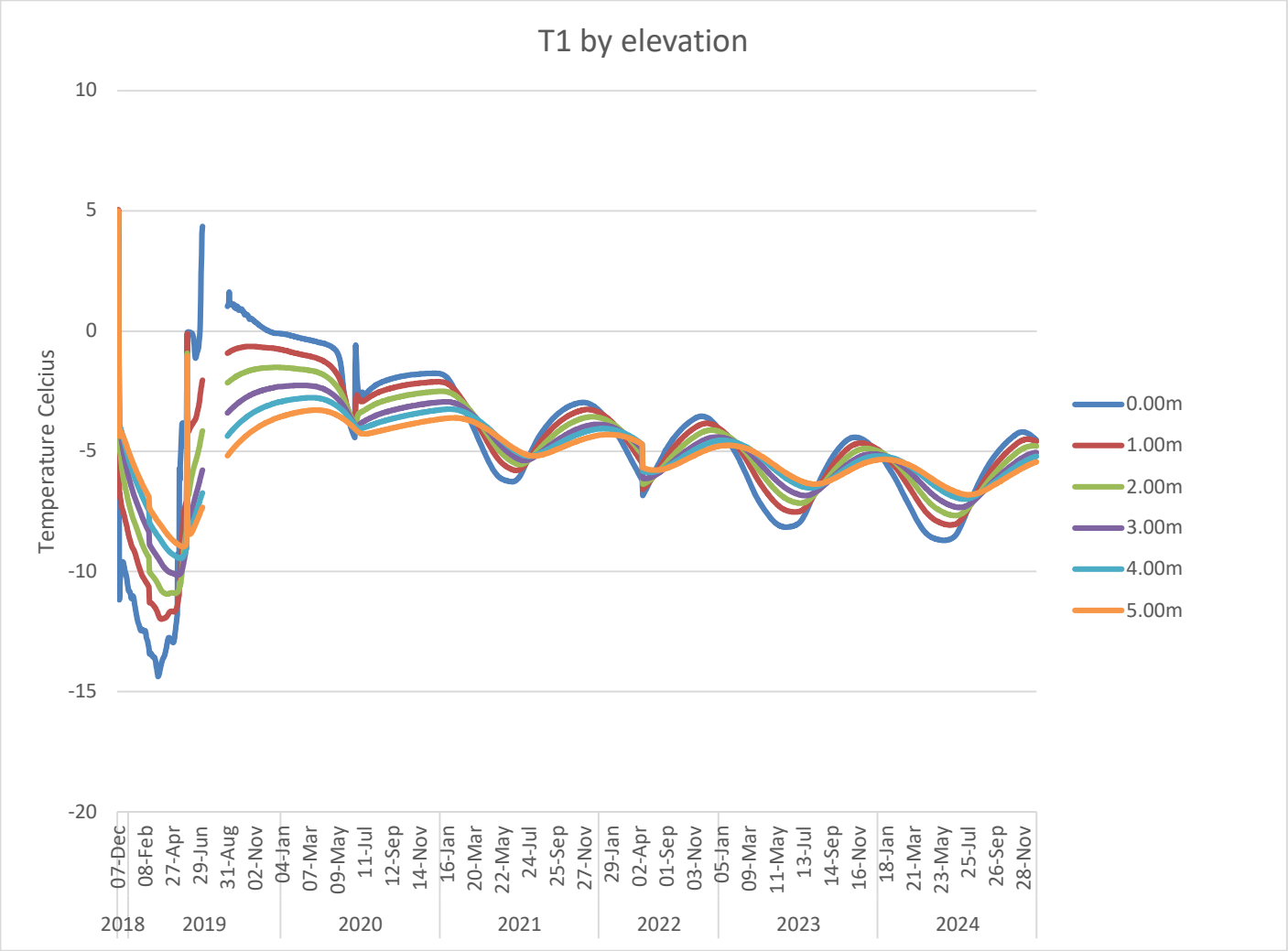
0 100 200 300

LEGEND

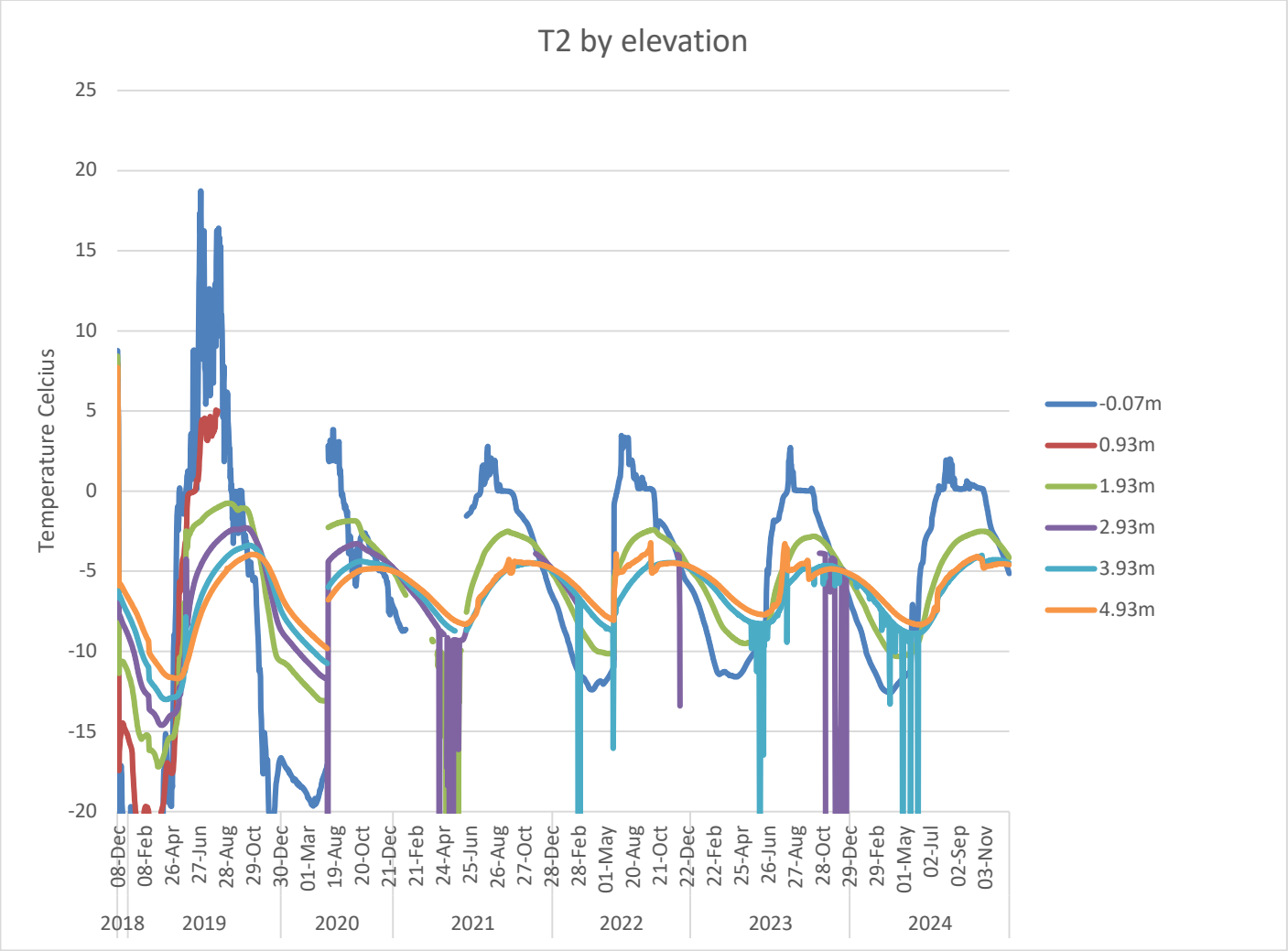
- Vertical Thermistor
- Horizontal Thermistor
- Proposed Thermistor
- Crest
- Toe

Baffinland

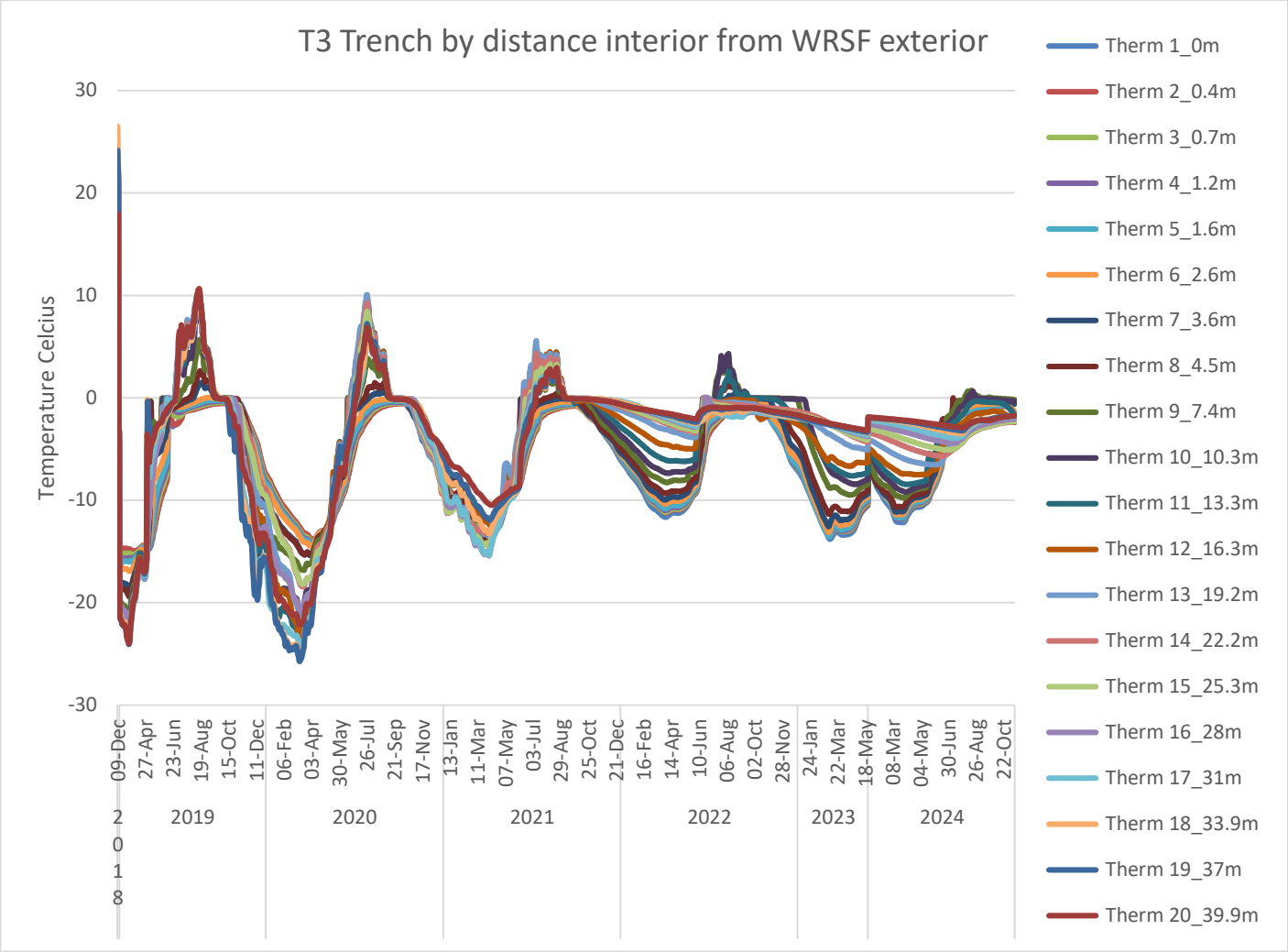
Thermistor Results for 2024



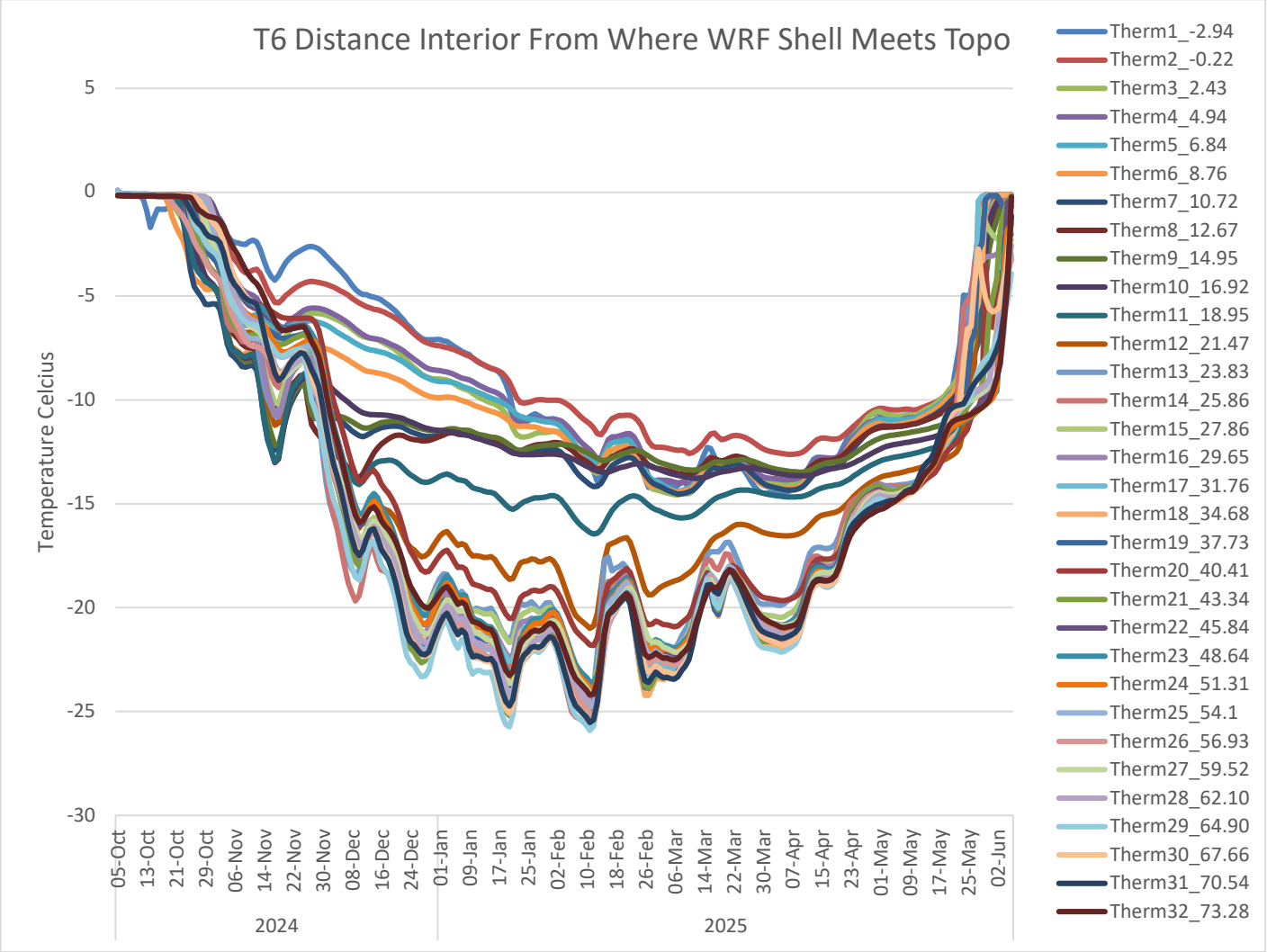
T1: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Waste rock temperatures at T1 have generally continued to cool over time along the thermistor stringsince additional rock was placed in the area in September 2019. The slight increase near surface during Q3 of 2024 compared to Q3 of 2023 can be attributed to warmer air temperatures and precipitation.



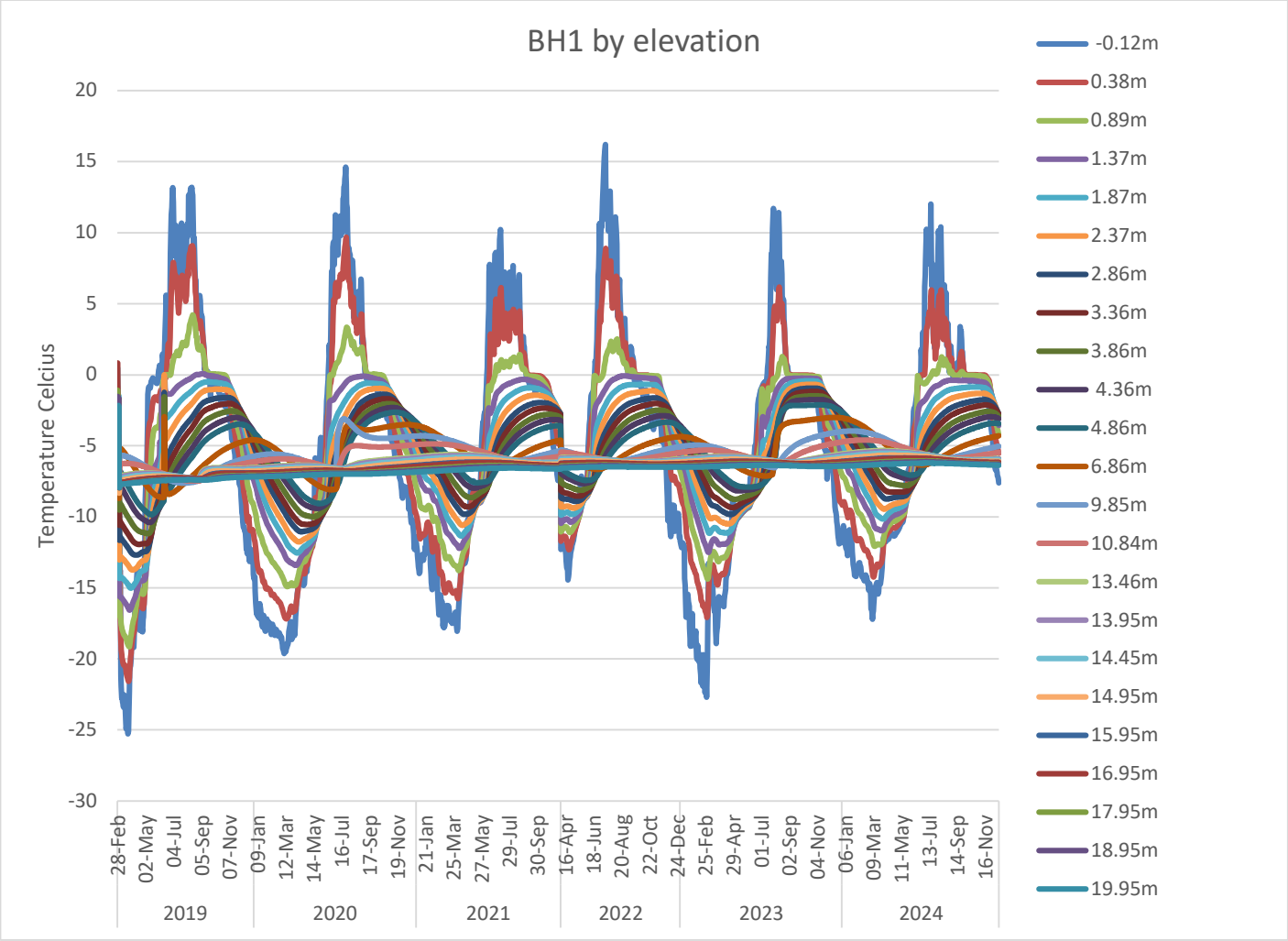
T2: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Data gaps and errors are consistent in T2 after April 2020. Data provided at internals without errors indicate that rockfill ≥ 1.93 mbgs remains frozen year-round. Waste rock temperatures at T2 have cooled since the addition of ~ 0.8 m of waste rock placed in the area in summer 2020.



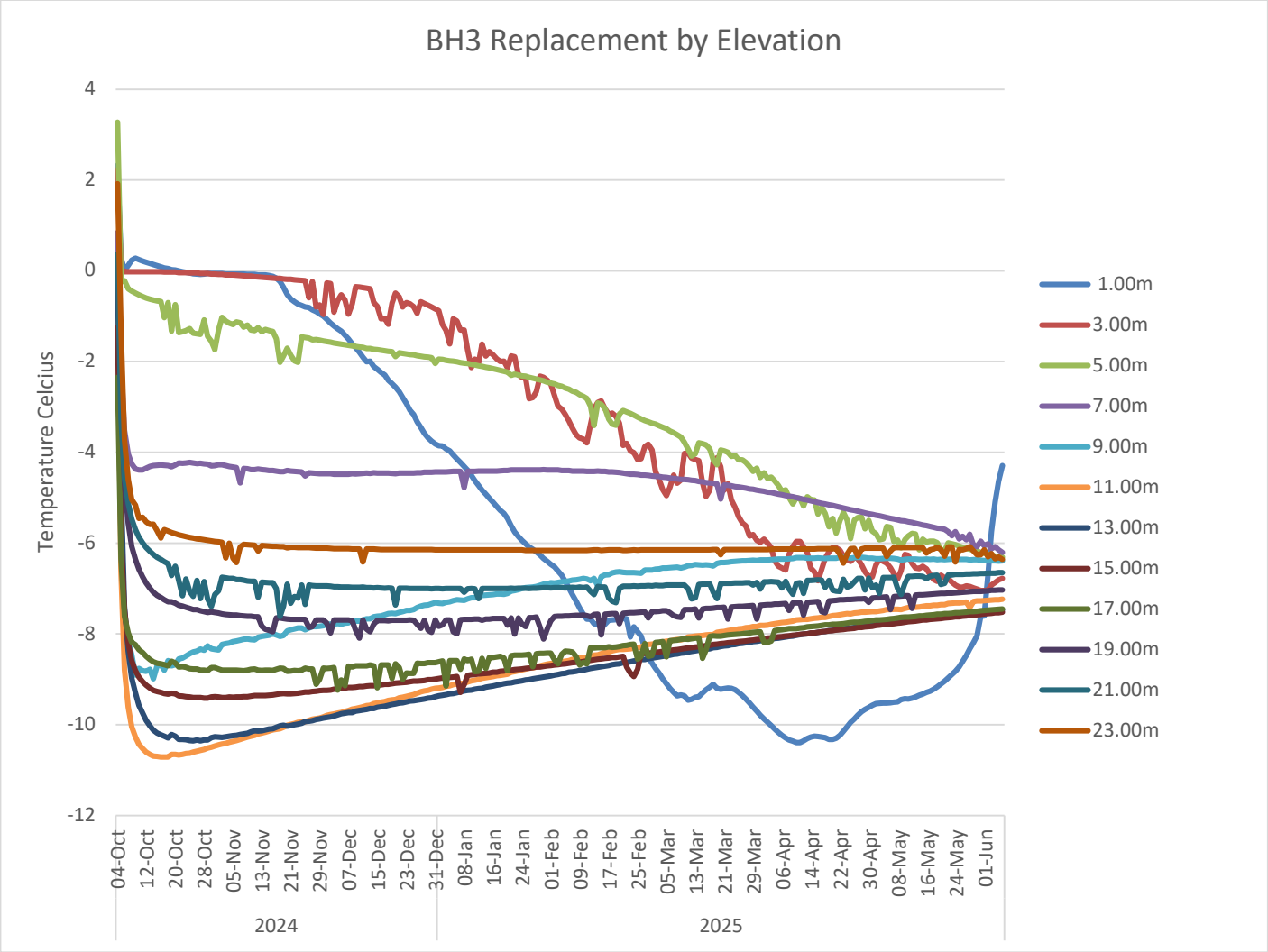
T3: (Legend provides node distance, in meters, along the thermistor string, where zero is at the edge of the pile). Waste placement occurred in 2021 between 16.3 m and 40 m along the length of the thermistor string, and the timing of this waste placement correlates with much of the thermistor data remaining below 0°C and exhibiting much smaller seasonal variations. Overall material placement is allowing the pile to freeze and remain frozen, supporting the overall objective of the WRMP.



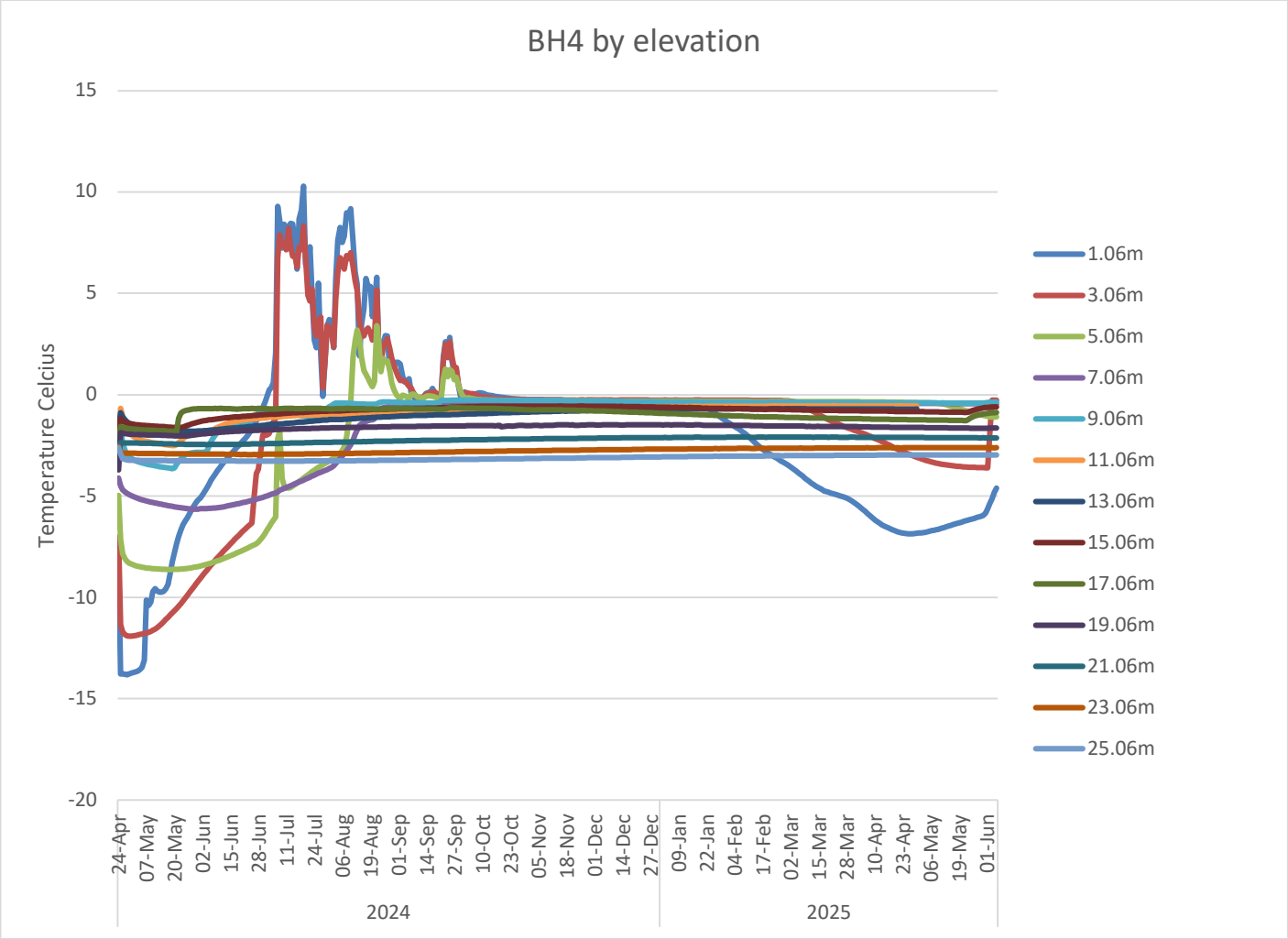
T6: (Legend provides node distance, in meters, along the thermistor string, where zero is at the edge of the pile). Installed in October 2024. The majority of nodes are within the active layer due to frozen ground and the inability to dig below the active layer at the time of installation (this itself points to the success of the WRMP). Additional lifts will be placed during 2025 to provide more valuable data.



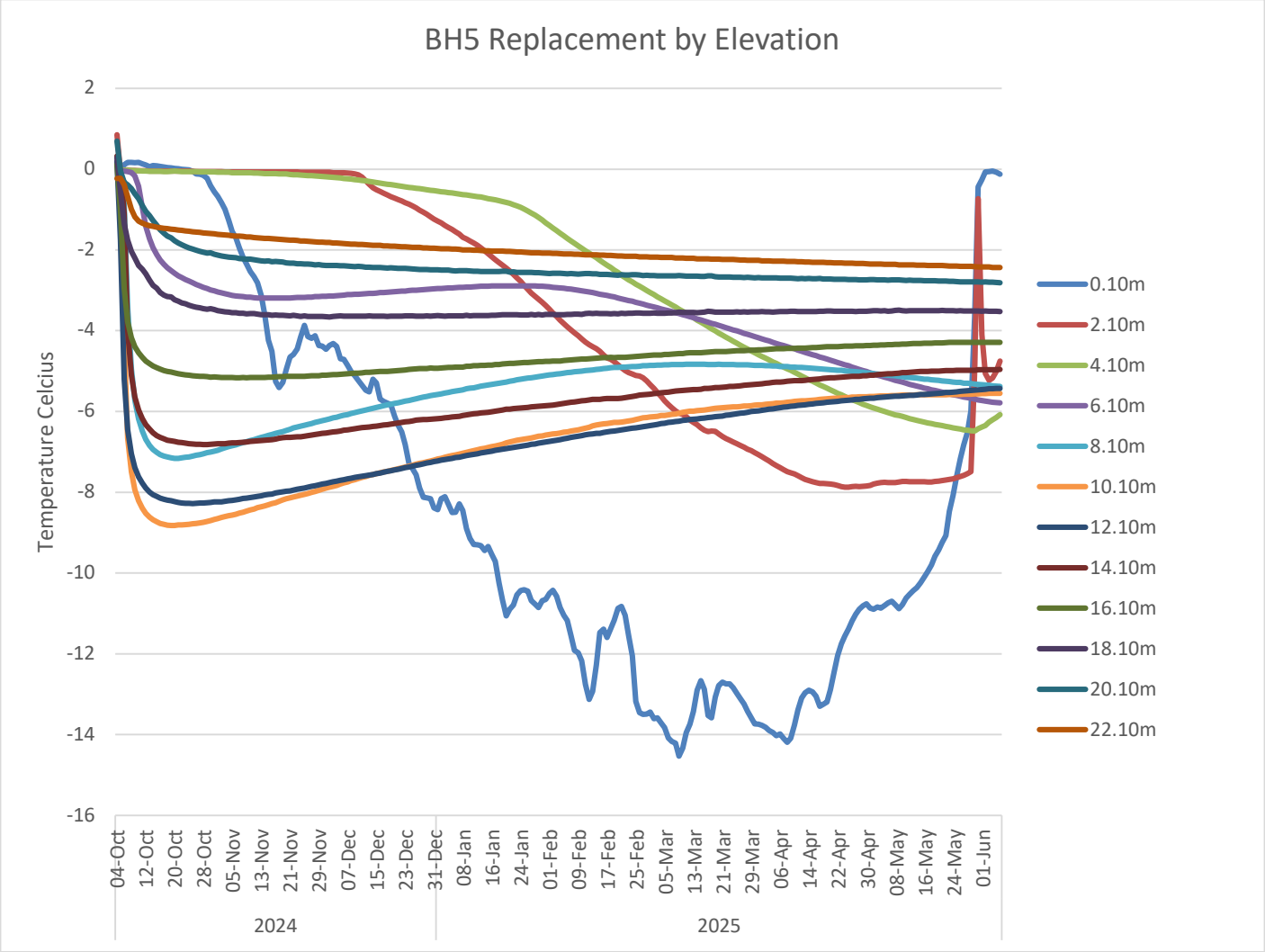
BH1: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). No material placement has occurred on top of BH1 since its installation. Thermistor data at BH1 continues to support the conclusion that the active layer subject to seasonal freezing and thawing is < 3 m, with BH1 data indicating everything below 2 m is frozen year-round.



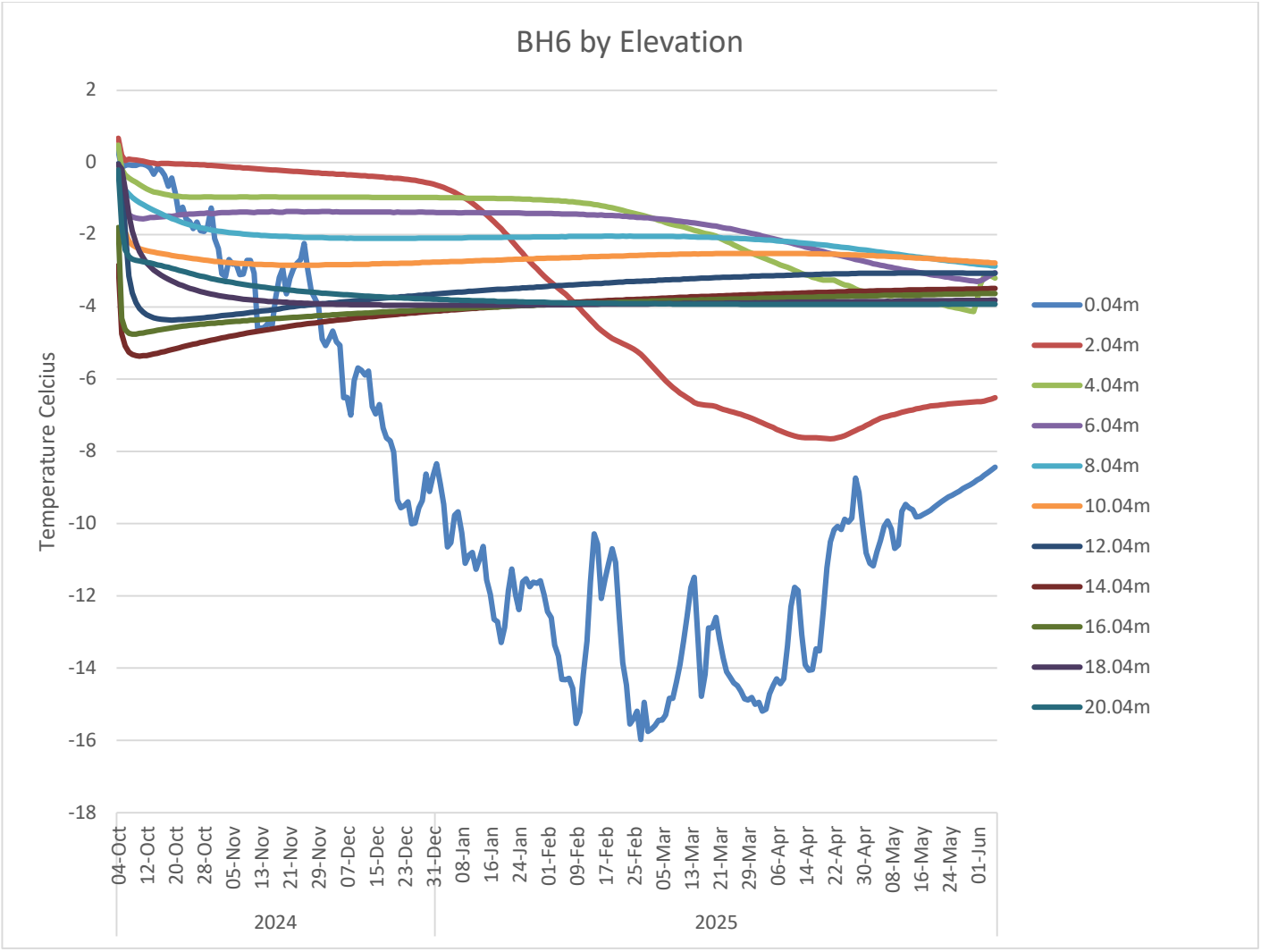
BH3R: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Installed in October 2024. No material placement has occurred on top of BH3R since its installation. Thermistor data at BH3R is in its infancy, data collection will continue throughout 2025.



BH4: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Installed in April 2024. Material has been placed on top of BH4 during Q2 of 2025. The thermistor is still stabilising, data collection will continue throughout 2025.



BH5R: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Installed in October 2024. No material placement has occurred on top of BH5R since its installation. Thermistor data at BH5R is in its infancy, data collection will continue throughout 2025.



BH6: (Legend provides thermistor node depths, presented in m below ground surface (mbgs) at time of installation). Installed in October 2024, solely in Potentially Acid Generating rock, as an additional test. No material placement has occurred on top of BH6 since its installation. Thermistor data at BH6 is in its infancy, data collection will continue throughout 2025.