

Water Resources Division Nunavut Regional Office P.O. Box 100 IQALUIT, NU X0A 0H0

December 18, 2013

Phyllis Beaulieu
Manager of Licensing
Nunavut Water Board
P.O. Box 119
GJOA HAVEN, NU X0A 1J0

Your file 2AM-MRY1325/PART C

Our file IQALUIT- #760488

Re: Water Licence #2AM-MRY1325, Mary River Project: Annual Security Review under Part C and Schedule C of the Type 'A' Water Licence

Dear Ms. Beaulieu,

Thank you for your email of October 11, 2013, concerning the above mentioned Annual Security Review that is being completed pursuant to Part C and Schedule C of Water Licence #2AM-MRY1325.

Aboriginal Affairs and Northern Development Canada has conducted a review of Baffinland Iron Mines Corporation's 2014 Work Plan and 2014 Marginal Reclamation and Closure Security Estimate. Comments have been provided for the Nunavut Water Board's consideration.

Should you have any questions or comments, please do not hesitate to contact myself at <a href="mailto:david.abernethy@aandc-aadnc.gc.ca">david.abernethy@aandc-aadnc.gc.ca</a> or Jean Allen at <a href="mailto:jean.allen@aandc-aadnc.gc.ca">jean.allen@aandc-aadnc.gc.ca</a>.

Regards,

David Abernethy A/Manager of Water Resources

Cc. Jean Allen, Water Management Specialist, AANDC-NU
Murray Ball, Manager of Water Resources, AANDC-NU
Erik Allain, Manager of Field Operations, AANDC-NU
Natalie Plato, A/Director of Resource Management, AANDC-NU
Karen Costello, Director of Resource Management, AANDC-NU



## **Technical Review Memorandum**

To: Phyllis Beaulieu – Manager of Licensing, Nunavut Water Board

From: David Abernethy – A/Manager of Water Resources, AANDC-NU

Re: Licence #2AM-MRY1325, Mary River Project: Annual Security Review under Part C and Schedule C of the Type 'A' Water Licence

## 1.0 Introduction

AANDC appreciates the opportunity to participate in the Annual Security Review (ASR) required under Part C and Schedule C of Baffinland Iron Mines Corporation's (BIMC's) Type 'A' Water Licence #2AM-MRY1325 (Type 'A' Mining Licence) for the Mary River Project.

The following advice has been provided pursuant to AANDC's responsibilities under the Nunavut Waters and Nunavut Surface Rights Tribunal Act and the Department of Indian Affairs and Northern Development Act.

In conducting this analysis, AANDC has relied on the following documentation:

- Nunavut Water Board (NWB) Annual Security Review Process Guidance (dated October 11, 2013);
- BIMC Work Plan 2014 (dated October 31, 2013);
- BIMC 2014 Marginal Reclamation and Closure Security Estimate (dated October 31, 2013);
- NWB Water Licence #2AM-MRY1325 (July 15, 2013);
- NWB Water Licence #2BB-MRY1114, Amendment #1 (December 4, 2013);
- NWB Water Licence #8BC-MRY1314 (May 24, 2013);
- Nunavut Impact Review Board (NIRB) Project Certificate #005 (approved December 28, 2012)
- BIMC 2013 Work Plan Marginal Closure Cost Summary (dated April 4, 2013);
- BIMC Preliminary Mine Closure and Reclamation Plan (dated February 2012); and
- BIMC Responses to AANDC Questions Regarding 2014 Work Plan and Security Estimate (dated December 6 and 13, 2013)

# 2.0 Scope of AANDC's Review

AANDC's submission is a desktop review of the reclamation cost estimate provided by BIMC and primarily focuses on the 2014 Work Plan and 2014 Marginal Reclamation and Closure Security Estimate (2014 MRCSE) for the approved project as defined by NIRB Project Certificate #005.

The 2014 Work Plan and 2014 MRCSE contain reclamation cost estimates for anticipated work that will be conducted under the proposed Early Revenue Phase (ERP). ERP activities that do not appear to be within the scope of the Type 'A' Mining Licence include ore stockpiles and stockpile settling ponds at Milne Inlet. However, the NWB cannot order security for activities that

are not authorized by a water licence. As a result, the scope of our review was initially limited to activities contained within the approved project.

We recognize that it would be helpful to have AANDC's analysis of the Work Plan in its entirety, since (i) the NWB will be basing security on aggregate reclamation costs and (ii) the Qikiqtani Inuit Association (QIA) can secure reclamation costs associated with project components that are not yet approved. For that reason, AANDC intends to provide additional evidence at the upcoming ASR Meeting regarding reclamation cost estimates for those ERP activities that are both within and outside the scope of the currently approved project. This will help ensure that the total 2014 reclamation cost estimate (for approved and unapproved ERP activities) is sufficient to cover the highest anticipated reclamation liability for 2014-15. This review will apply to the 2014 Work Plan and 2014 MRCSE as submitted on October 31, 2013.

Although we understand BIMC submitted a renewal or amendment application for Water Licence #2BB-MRY1114 (Type 'B' Exploration Licence), we do not know whether the NWB will be processing that application in tandem with the ASR for the Type 'A' Mining Licence. Therefore, for the purposes of this memo, we have assumed that the security quantum for the Type 'B' Exploration Licence will be addressed through a renewal or amendment processes. For that reason, this submission does not consider Type 'B' Exploration Licence activities but focuses only on activities that are already within the scope of the Type 'A' Mining Licence, or would be expected to be within that scope pending ERP approval processes.

Review of the cumulative and legacy reclamation or management costs has been deferred to future ASRs.

### 3.0 Results of our Review

As per the NWB's correspondence dated October 11, 2013, AANDC has provided the following comments and recommendations for the NWB's consideration.

## 3.1 Existing Total Security Amount

## 3.1.1 Security Amount Required by the NWB

Part C, Item 1.a. of the Type 'A' Mining Licence requires BIMC to post security in the amount of \$4,311,784, which in combination with security held under other water licences, and that held by the QIA outside of the licensing scheme, was intended by the NWB to aggregate to the NWB's estimate of the then-applicable total reclamation cost of \$36,000,000 (representing the 2013 year estimate of anticipated mine closure and reclamation costs).

Based on our analysis, the 2013 total reclamation cost estimate of \$36,000,000 is no longer adequate to reflect the updated scope of activities and undertakings proposed in the 2014 Work Plan.

## 3.1.2 Security Amount held by Minister

The AANDC Minister currently holds financial security for BIMC's Mary River Project pursuant to three different water licences (Table 1). The quantum ordered by the NWB

under the Type 'B' Exploration Licence was recently decreased, and the Type 'B' Construction Licence, #8BC-MRY1314, is expected to expire and be cancelled. Both of these factors need to be taken into account when considering the value of the security currently held by AANDC.

Table 1: Financial Security Held by AANDC

Licence #	Amount Required by the NWB	Amount Held by AANDC	Explanatory Note	Amount Included in Notional Aggregate AANDC Holdings
2AM-MRY1325	\$4,311,784	\$4,311,784	This LC mistakenly refers to both the Type A and a Type B licence, and needs to be replaced. BIMC has agreed to do so. This does not affect the value of the LC.	\$4,311,784
2BB-MRY1114	\$1,250,000	\$6,738,216	Amendment # 1 decreased the security quantum, resulting in requirement to return \$5,488,216. BIMC plans to replace this LC.	\$1,250,000
8BC-MRY1314	\$122,019	\$122,019	We understand that this licence is slated to expire on May 23, 2014 and that BIMC's October 10, 2013 cancellation application is being processed by the NWB.	\$0
			Notional Aggregate AANDC Holdings	\$5,561,784

## 3.1.3 Change in the Type 'B' Exploration Licence Security

In setting the original security quantum for the Type 'A' Mining Licence, the NWB took into account the \$6,738,216 that was then required under the Type 'B' Exploration Licence. Since that time, the NWB has amended the Type 'B' Exploration Licence, and substantially reduced the security quantum. It appears that the reduction of the Type 'B' Exploration Licence security by \$5,488,216 needs to be rebalanced by a corresponding

increase in the Type 'A' Mining Licence, assuming that the NWB's objective at the time of the amendment was to remain at a steady level of licence-based security.

## 3.2 Estimated Reclamation Cost for 2014-15

BIMC estimates that an additional amount of \$3,959,000<sup>1</sup> is required to ensure reclamation of the approved Type 'A' Mining Licence activities proposed for 2014-15. AANDC is satisfied that the aggregate reclamation cost estimate of \$39,959,000 (made up of \$36,000,000 proposed in the 2013-14 estimate and \$3,959,000 proposed for 2014-15) is adequate to ensure reclamation of the overall project (excluding Type 'B' and ERP activities).

#### 3.3 Estimated Reclamation Cost for Crown Land

The reclamation estimate proposed by BIMC for Crown lands (including water on Crown lands) in the amount of \$166,000 appears to be adequate. However, it is unclear how this number was derived because BIMC has indicated that all approved activities in 2014-15 will occur on IOL (Page C-2 of 2014 MRCSE).

## 3.4 BIMC Responses to AANDC Questions

To streamline the ASR review process, AANDC accepted BIMC's offer to assist in clarifying issues during the designated review period prior to the formal submission of comments to the NWB. To this end, AANDC submitted requests for clarification to BIMC on November 22, 2013 and December 6, 2013. BIMC provided responses on December 6, 2013 and December 13, 2013 respectively. AANDC comments and BIMC responses are provided in Appendix 1.

# 3.5 Miscellaneous

The 2014 Work Plan and MRCSE have no water-related liabilities associated with the 2014 work program. Water-related liabilities in the Total Project-Wide Security estimate for 2014 are carry-overs from previous Type 'A' Mining Licence and Type 'B' Exploration Licence and 2013 reclamation cost estimates. Review of the 2014 Work Plan did not identify any activities and/or infrastructure which were not accounted for in earlier water-related reclamation cost estimates.

### 4.0 Conclusion

AANDC is satisfied that \$39,959,000 is a reasonable estimate of the total costs associated with the reclamation of currently approved components of the Mary River Project. This is an increase from the \$36,000,000 that the NWB used as a total reclamation cost estimate at the time of issuing the Type 'A' Mining Licence.

<sup>&</sup>lt;sup>1</sup>On December 13, 2013, BIMC proposed \$3,958,000 for approved activities but the sum of the October 31, 2013 estimate of \$3,315,480 and \$643,280 (\$614,108 and \$29,172 based on changes to assumptions related to explosives liability and Jet-A fuel tank reclamation) is \$3,958,730 or \$3,959,000 when rounded to the nearest 1000's.

AANDC is satisfied that a proposed total reclamation cost estimate of \$39,959,000 appears to be adequate to cover reclamation for the approved project up until the end of the 2014-15 fiscal year. However, it is important to recall that (i) this number does not include the components secured under the Type 'B' Exploration Licence; (ii) this number does not include the unapproved components of the 2014-15 Work Plan (i.e., ERP activities); and (iii) AANDC deferred review of legacy reclamation or management costs as a matter to be considered in future ASRs.

In the coming weeks, AANDC will increase the scope of this review to include the as-yet unapproved ERP activities and will confirm at the ASR Meeting whether the total reclamation cost estimate for Type 'A' Water Licence activities (approved and as-yet unapproved ERP activities) is adequate to reflect the planned activities.

Recommendations pertaining to BIMC's security estimate for the Type 'B' Exploration Licence will be provided during our review of the renewal application.

# **APPENDIX 1**

# TABLE 1 - November 22, 2013 AANDC Issues and BIMC Responses

# • Response to Issues Regarding the 2014 Work Plan

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
1	List of proposed activities appears to be complete.	N/A	N/A
2	Section 2.3 – "Infrastructure Layout at End of 2014" (pg. 9 of 19) is not very useful: drawings referenced in Appendix B do not differentiate 2014 works/infrastructure from total site development and what is already existing; Milne Port Drawing is for ERP showing ore dock and ore stockpiles and not for the "approved" project (this is not a major issue since 2014 works are described in the text elsewhere in the document. In the future it may be appropriate to ask that the Proponent provides drawings differentiating new works: this would be very useful for individuals conducting on-site inspections).	Understood. Drawings were provided to provide better context to discussion of site layout if ERP approval was granted. Baffinland recognizes this layout is subject to ERP approval.	AANDC recognizes BIMC's dilemma of not having appropriate drawings representative of the approved project given that efforts are now being directed towards ERP approvals. AANDC recommends that BIMC submit drawings identifying old works vs new works in future ASR submissions.

# • Response to Issues Regarding the 2014 Marginal Reclamation and Closure Security Estimate

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
1	Approach and presentation used is generally sound	N/A	N/A
2	As in the Work Plan 2014, the Milne Port Drawings are for the ERP and do not reflect the "approved" project.	Understood. Drawings were provided to provide better context to discussion of site layout if ERP approval was granted. Baffinland recognizes this layout is subject to ERP approval.	AANDC recognizes BIMC's dilemma of not having appropriate drawings representative of the approved project given that efforts are now being directed towards ERP approvals. AANDC recommends that BIMC submit drawings identifying old works vs new works in

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
3	The Interim Closure and Reclamation Plan (H349000-1000-07-126-0012) has not been approved yet or amended for the 2014 Work Plan. This may introduce procedural issues where it is being referenced in the 2014 Marginal Reclamation and Closure Security Estimate. While the "approved" 2014 infrastructure was addressed in the Preliminary Closure and Reclamation Plan, some aspects related to the ERP have not been addressed, specifically the ore handling facilities and the ore dock.	The Interim Closure and Reclamation Plan (H349000-1000-07-126-0012) was updated in June 2013 taking into consideration activities that would be dependent on ERP approval prior to being conducted including discussion of closure and reclamation strategies for the ore dock, ore stockpiling, and ore loading equipment (see Section 3.2.1 of the Interim Closure and Reclamation Plan). It should be noted however that in section 8.6 of the Interim Closure and Reclamation Plan it is stated that the docks and infrastructure at Milne Port will be removed and either recycled or shipped offsite to an appropriate facility for disposal. This strategy has since been updated to reflect the project closure and reclamation strategy proposed and approved for Steensby Port in the Preliminary Closure and Reclamation Plan in which all dock structures will be left intact but infrastructure will be removed. The 2014 Marginal Reclamation and Closure Security Estimate reflects this updated strategy and Baffinland recognizes that the Interim Closure and Reclamation Plan will have to be updated upon ERP approval.	AANDC agrees that the Interim Closure and Reclamation Plan will have to be updated and approved by the NWB upon ERP approval. Rather than being based on the approved Preliminary Closure and Reclamation Plan, the 2014 Security Estimate is based on reclamation activities in the Interim Closure and Reclamation Plan which has not yet been approved by NIRB or NWB. AANDC recommends that the reclamation activities in an approved reclamation activities in an approved reclamation plan in future ASRs. Additionally, AANDC requests clarification from the NWB on whether they intend to approve updated A&R plans as part of the security review in the future, or if they intend to calculate security based on unapproved plans.
4	According to the Inspection Report (August 2013), it appears as though one of the laydown areas at Milne Inlet was constructed using crushed ore (possibly left over from bulk sampling) instead of quarried rock from Q1 Quarry at Milne Inlet. The implications, if any, of this from a closure perspective have not been addressed in the security estimate. Clarification of this should be	A ore stockpile remaining from the bulk sample was used for the construction of a laydown area at Milne Port as identified in the Inspection Report (August 2013). This stockpile was monitored for run off since the Bulk Sampling Campaign. Based on monitoring results of the stockpile and test results of the parent ore body the use of this material in this fashion is not expected to have any additional cost implications on the security estimate.	Clarification accepted. AANDC recommends that any modifications to the previous work plan be identified in the new work plan in future ASR submissions.

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
5	On page C-2, paragraph 1 the Proponent states "To best estimate the total closure and reclamation security, some actions were modified or adapted to the strategies defined in the Preliminary Mine Closure and Reclamation Plan (February, 2012)." No further details are provided. Specifically what actions were modified or adapted?	To ensure this is the case, this laydown area, as with all project facilities/ components left at Milne Port in a closure scenario, would be subject to post mine closure monitoring for physical, chemical, and biological stability as described in Section 9 of the Interim Closure and Reclamation Plan (H349000-1000-07-126-0012). It should be noted however the cost for reclaiming a stockpile at Milne Port is still included in The Carry Over to Type A Closure Cost as described in 2013 Work Plan Marginal Closure Cost Summary (H349000-1000-07-245-0001) in the case ERP would be approved and ore will be hauled along the Tote Road and stockpiled at Milne Inlet. Specifically, the cost is listed as \$182,256.  This statement was included to indicate that in the 2014 Marginal Reclamation and Closure Security Estimate project specific unit costs were used whenever possible. However, when project specific unit costs are unknown, pre-determined RECLAIM 'unit' costs based on defined actions associated to reclaim the project component are used. The use of RECLAIM 'unit' costs based on defined actions was a more prevalent methodology used to establish the reclamation and closure security estimate in the Preliminary Mine Closure and Reclamation Plan (February, 2012). Baffinland recognizes this statement may be redundant as this is stated more clearly on page C-3, paragraph 3. For specific cases where RECLAIM unit costs based on	Clarification accepted.
		defined actions was used, see Appendix C and Appendix E of the 2014 Marginal Reclamation and Closure Security Estimate.	
6	On page C-7, Section C.2.5.1 Rock Pile Assumptions it is stated that the approximate footprint of the Milne Inlet Stockpile is 68,500 m <sup>2</sup> as described in the 2013 Work Plan Marginal Closure Cost Summary (H349000-1000-07-245- 0001). However in Figure B4 (page B-4) an allowance for Ore Stockpile pad contouring at Milne Port of 235,241 m <sup>2</sup> is listed. What is the reason for the discrepancy in the cited areas? Does this address the issue of the laydown area	2014 Marginal Reclamation and Closure Security Estimate includes a cost for reclaiming the proposed ore stockpile pads, not any actual stockpiles. The previous stockpile at Milne Port is addressed in the Carry Over to Type A Closure Cost as described in 2013 Work Plan Marginal Closure Cost Summary (H349000-1000-07- 245-0001). A total area of the ore stockpile pad contouring at Milne Port is 235,241 m², with a proposed associated cost of \$616,167.	Clarification accepted.

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
7	In each of Figures B3, B4 and B5 (pages. B-3 to B-5) a large "Credit for 2013 Break Basement Slabs" has been applied. What is the reason for 2014 basement slab footprint estimates to be much lower than 2013 estimates? For example, in Section C.2.6.4 Objective: Break Basement Slabs at Mine Site the sum of the cited footprints is equal to 6,875 m² while the total footprint considered in the 2013 Marginal Cost was significantly higher at 13,577 m².	In the 2013 Work Plan Marginal Closure Cost Summary, it was assumed any building which had any type of foundation would be subject to the 'Break Basement Slabs' unit cost as the level of detail to differentiate foundation types was not available at the time of estimate. For 2014 Marginal Reclamation and Closure Security Estimate, project definition has increased and the type of foundation for each building was available. Based on this available information, only buildings with precast piers and precast footing types of foundation were applied the 'Break Basement Slabs' unit cost. This cost difference is essentially the result of the strategy to apply as a credit the cost of breaking basement slabs for all buildings identified as being constructed with a foundation in 2013 in return for applying a reclamation cost of all building with precast piers and precast footing type of foundation in 2014 as reflected in the Master Building Matrix which is inclusive of all building on-site regardless of construction date. This strategy was chosen to simplify the estimate process due to the major revisions in the Master Building Matrix.	Clarification accepted.
8	On page C-13 under sub-heading Disposal Mobile Equipment it is stated that "based on the Mechanical Equipment and Motors List (H349000-1000-50-144-0001), 372 pieces of mechanical equipment (from 2013 and 2014) will be onsite upon completion of the 2014 Work Plan project-wide. It is assumed all the mechanical equipment listed on the Mechanical Equipment and Motors List will be disposed on-site (exact disposal location to be determined)." In the Preliminary Mine Closure and Reclamation Plan (February. 2012), page 29, Section 8.4 Removal of Machinery, Equipment, and Storage Tanks it states "Salvageable machinery, equipment and other materials will be dismantled and taken offsite for sale or reuse if economically feasible; if not, they will be cleaned of oil and grease, where appropriate, and deposited within onsite landfills	The 2014 Marginal Reclamation and Closure Security Estimate was developed under the assumptions that salvage value of equipment cannot be claimed and 3rd Party contractors would be responsible for the execution of reclamation work. Based on this, it was assumed that all mechanical equipment listed on Mechanical Equipment and Motors List (H349000-1000-50-144-0001) would be disposed of on-site. This assumption was chosen because it would be the most economically efficient disposal method of the stated options in the approved Preliminary Mine Closure and Reclamation Plan for a 3rd Party Contractor if salvage could not be claimed. In practice, Baffinland will endeavour to salvage machinery, equipment and other materials, if economically feasible, in a closure scenario.	Clarification accepted.

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
	or the open pit. Gearboxes or other equipment containing Baffinland Iron Mines Corporation – Mary River Project hydrocarbons that cannot readily be cleaned will be removed and sent to either Milne Port or Steensby Port for sea-lift to an approved disposal facility." The Proponent is asked to clarify whether their assumed disposal of the 372 pieces of mechanical equipment on-site is consistent with what is stated in their Preliminary Mine Closure and Reclamation Plan and whether appropriate security has been set aside to sealift a portion of this equipment for sale, reuse or recycling off-site.		
9	In Figure B8 (page B-8) a large \$3M credit has been applied for the 2013 Sealift which translates to an overall reduction in the security estimate. This seems to be largely attributed to the issue noted above concerning the ultimate disposal of the mobile equipment on-site (in the mine pit?) and not shipping it off-site. It is not clear whether this on-site disposal approach was properly vetted during the approvals process.	Disposal of decontaminated mobile/mechanical equipment on-site was stated as an option in the Preliminary Mine Closure and Reclamation Plan which was approved under Project Certificate #005. Specifically the Preliminary Mine Closure and Reclamation Plan (February, 2012), page 28, Section 8.4 under Removal of Machinery, Equipment, and Storage Tanks states "Salvageable machinery, equipment and other materials will be dismantled and taken offsite for sale or reuse if economically feasible; if not, they will be cleaned of oil and grease, where appropriate, and deposited within onsite landfills or the open pit".	Clarification accepted.
10	On page C-1, Section C.1 states that all work described in the 2014 Work Plan will not be completed in 2014; that the cost as presented only covers the cost of reclamation of activities scheduled to occur in 2014; and that activities that extend into 2015 are not considered to apply for 2014. The limitation to work within the calendar year of 2014 does not align with the period for the work plan or for the security review which runs to the end of the first quarter of 2015. If the security review only covers to December 31, 2014, and the next year's security would not take effect until the end of March, 2015, Baffinland would not be able to conduct additional work in January	Baffinland would like to clarify that the 2014 Marginal Reclamation and Closure Security Estimate covers all work described in the 2014 Work Plan including any work scheduled in 2015.	Clarification accepted.

No.	AANDC ISSUE (November 22, 2013)	BIMC RESPONSE (December 6, 2013)	AANDC COMMENT ON RESPONSE
	through March of 2015 because the licence prohibits work not covered by security. Please clarify your understanding of the security review period and how that fits with the work plan.		
11	On page C-16, Section C.2.6.12 Landfill for Demolition Waste at Milne Port – it is stated that the estimate considers the cost to cover demolition waste at Milne Port (location to be determined). Given that no landfill is proposed at Milne Port (as indicated in the heading) what locations are being considered for disposal at Milne Port?	Specific disposal locations of demolition waste are under investigation but no specific locations have finalized.	AANDC notes that the water licence will need to be amended to provide for a landfill site at Milne Port. AANDC notes that the NWB cannot order security for activities that are not authorized by a water licence.

TABLE 2 - December 6, 2013 AANDC Issues and BIMC Responses

No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)	AANDC COMMENT ON RESPONSE
1	Milne Inlet Landfarm Issue - Section 3.1 of the 2014 Work Plan states that no progressive reclamation credits have been applied for in the reclamation estimate for any planned progressive reclamation conducted in 2014. However, Section C. 2.6.15 of the 2014 Marginal Closure and Reclamation Cost Estimate states that the value associated with	The 2013 Work Plan Marginal Cost Summary, Carry Over to Type A Cost, considered the following activities related to the bladder farm at Milne Inlet: - Milne Inlet fuel farm Oil Water Separation Operation (total cost of \$199,280) - Drain, fold, and containerize Milne bladder tanks (total cost of \$44,704)	Clarification accepted.
	decommissioning of the bladder farm (73 bladders were drained, folded, and containerized and shipped off site) has been applied as a credit.	<ul> <li>Remove all hazardous material/fuel storage geomembrane fuel liners and package for sealift (total cost of \$11,424)</li> <li>Execute civil works to convert the fuel farm to</li> </ul>	
	In Figure B4 on the 2nd last line entry a credit of \$243,984 is shown for "Decommission of existing bladder farm". This is equal to the first two itemized	hydrocarbon impacted soil land farm (total cost of \$54,432) - Execute civil works to transport potential	
	costs in Section C.2.6.15 (i.e., "Milne Inlet fuel farm Oil water Separation Operation" - \$199,280 and "Drain, fold, and containerize Milne bladder tanks" - \$44,704). The other itemized costs under Section 2.6.15 totaling \$129,678 are still carried forward from the 2013 estimate. The cost for the sealift	hydrocarbon contaminated soil from Milne Inlet non - bulk fuel farm lined containment areas to landfarm (total cost of \$34,740) - Re-contour surface (total cost of \$26,520 with \$2,562 as contingency)	
	does not appear to be a part of the itemized costs in this Section and it is unclear whether Baffinland took a credit elsewhere in the estimate for shipping the bladders offsite.	During 2013, the 73 bladders were drained, folded, containerized and shipped off-site thus, the value associated to this activity has been applied as credit. In addition the operation of the Oil Water Separation Facility will no longer require during 2014. Thus, the	
	Appendix F of the 2014 Marginal Reclamation and Closure Security Estimate includes 9 pages of manifests of "Hazardous Waste Shipped Off-site in 2013". These manifests indicate that 71 bladders were placed in sea containers. Unfortunately these	cost associated to the Milne Inlet fuel farm Oil Water Separation Operation (\$199,280) and drain, fold, and containerize Milne bladder tanks (\$44,704) was applied as credit from 2013.	
	manifests are not fully signed and dated to verify they have actually left the site.	A credit related to shipping the bladders offsite was not considered. No reclamation credits for planned work in 2014 is claimed in the 2014 Marginal	
	AANDC recommends that Baffinland clarify exactly what activities are associated with the reclamation credit; confirm what reclamation activities took place in 2013 and what reclamation activities	Reclamation and Closure Security Estimate as this work has yet to be conducted.  The nine (9) pages of documentation for "Hazardous Waste Shipped Off-site in 2013" are itemized list of	

No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)	AANDC COMMENT ON RESPONSE
	remain in 2014 (if any); provide signed manifests to confirm that the bladders were placed in sea containers; clarify whether the bladders were shipped offsite and whether this has been incorporated in the reclamation security estimate.	containers and material sent from Site to Valleyfield that were all consigned by Sanexen. Both the IMDG Declaration and the Shipping Manifest are fully signed off on and meet all regulatory requirements for transportation of hazardous materials. The provided annex's are supporting documentation of the signed documents and do not require signatures. As these documents are the actual documents that were used for the shipment of the hazardous materials, Baffinland is of the position this is the most appropriate evidence available to document these materials were shipped off-site.	
2	Milne Inlet Landfarm Issue - Section 6.0 of the Milne Inlet Preliminary Hydrocarbon Impacted Soil Storage and Landfarm Facility states that "soils that do not respond to bioremediation treatment may be disposed of off-site." AANDC recommends that this should be accounted for in the marginal reclamation and closure security estimate as a precautionary measure to ensure that shipping of all hydrocarbon impacted soil off site is accounted for, should it be determined that the soil does not respond to the treatment.	The landfarm on-site will be used to treat contaminated soils. Due to the primary nature of soil contamination (hydrocarbon-based), Baffinland does not expect to generate any contaminated soils that will not respond to bioremediation treatment.  In the unforeseen event contaminated soils do not respond to bioremediation treatment, these would only be small quantity and a cost allocation for shipment of these types of items is considered in the contingency cost for the sealift. Specifically, the contingency allocation in the sealift cost is an additional 8,700 t, with a total cost of \$1,000,500, for de-mobilization of misc-equipment, materials, waste, and consumables that have yet to be identified at the time of this estimate (see section C.2.9.4 of the 2014 Marginal Reclamation and Closure Security Estimate)	Clarification accepted. AANDC agrees that the proposed contingency allocation in the sealift cost could address removal from site of some contaminated soil which does not respond to bioremediation treatment.
3	Milne Inlet Landfarm Issue - Section C.2.6.8 states that hydrocarbon contaminated soil will be transported from Mary River bulk fuel farm to the Milne Inlet Landfarm. The Milne Inlet Landfarm was initially designed to treat soil impacted by hydrocarbons (Jet A fuel) when a fuel bladder	Baffinland is in the process of expanding the capacity of the Milne Port landfarm to accommodate additional project-wide soil. This expansion will double the remediation process capacity on-site. This is expected not to have any impact on additional security requirements and would only increase the	Clarification accepted.

No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)	AANDC COMMENT ON RESPONSE
	ruptured in 2008. Will the design of the landfarm sizing requirements be revised to accommodate soil from Mary River? And if so, in what way will this affect the remediation process with respect to additional security requirements?	conservatism of the 2014 Marginal Reclamation and Closure Security Estimate. Specific details of the landfarm expansion will be available once finalized.	
4	Waste Issue - Section C.2.7.2 states that removing hazardous waste is an annual activity that has been accounted for in the 2013 estimate. Appendix F of the 2014 Marginal Reclamation and Closure Security Estimate includes 9 pages of manifests of "Hazardous Waste Shipped Off-site in 2013". Unfortunately these are not fully signed and dated to verify they have actually left the site. AANDC maintains that credits for ongoing reclamation work be based on evidence of the work having been completed. In this case signed manifests should be provided to parties to confirm that all hazardous waste was removed from site	The nine (9) pages of documentation for "Hazardous Waste Shipped Off-site in 2013" are itemized list of containers and material sent from Site to Valleyfield that were all consigned by Sanexen. Both the IMDG Declaration and the Shipping Manifest are fully signed off on and meet all regulatory requirements for transportation of hazardous materials. The provided annex's are supporting documentation of the signed documents and do not require signatures. As these documents are the actual documents that were used for the shipment of the hazardous materials, Baffinland is of the position this is the most appropriate evidence available to document these materials were shipped off-site.  If additional documentation is needed, please advise specifically what is being requested as any additional	Clarification accepted.
	W	documentation would be above and beyond what is regulatory required for shipment.	
5	Waste Issue - Section C.2.7.4 states that the estimate includes the costs of removing 20% of the explosives brought on site. According to Mine Site Reclamation Policy for Nunavut and Water Licence 2AM-MRY1325, the total financial security amount must be sufficient to meet the highest reclamation liability in the upcoming year (2014-15). AANDC recommends that the cost estimate should account for the highest reclamation liability by including the costs of removing closer to 100% of explosives brought on site	The costs of removing 20% of the explosives brought on-site was based on an assumption that was used in the 2013 Work Plan Marginal Cost Summary and to which no concerns were raised.  Baffinland recognizes that although this assumption represents a conservative estimate of the amount of explosives that would remain on-site at the completion of the 2014 Work Plan for the purpose of a closure estimate, that it can be interpreted as a non-conformance to Mine Site Reclamation Policy for Nunavut and Water Licence 2AM-MRY1325 as it does not account for the highest reclamation liability for the time period the estimate covers with regard to explosives. Baffinland therefore proposes the 2014 Marginal Reclamation and Closure Security Estimate	Clarification accepted. AANDC agrees to the increase of \$614,108 to account for the highest amount of explosives onsite during the 2014 Work Plan.

No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)	AANDC COMMENT ON RESPONSE
6	Waste Issue - Section C.2.6.9 states that the 12 ML diesel fuel storage tank at Milne is allocated but the 750,000L (0.75 ML) Jet A fuel storage tank	increase by \$614,108 to account for the highest amount of explosives on-site during the 2014 Work Plan (see Note 1).  As an added contingency, a cost allocation is included in the sealift cost for an additional 8,700 t or \$1,000,500, for de-mobilization of misc-equipment, materials, waste, and consumables that have yet to be identified at the time of this estimate (see section C.2.9.4 of the 2014 Marginal Reclamation and Closure Security Estimate).  Recognized omission. Due to project changes, there will be three (3), 750,000 L Jet-A fuel tanks constructed at Milne Port at the completion of the 2014	Clarification accepted. AANDC agrees to the additional \$29,172
	indicated in Section 2.2 of the 2014 Work Plan is not allocated in the 2014 marginal security cost estimate. The 2013 Work Plan Marginal Cost Summary (Section D.2.6.5) already includes a cost to decommission a 0.75 ML fuel storage tank and re-contour the tank site. AANDC requests clarification on whether the 0.75 ML Jet A fuel storage tank indicated in Section 2.2 of the 2014 Work Plan is a second 0.75 ML storage tank.	Work Plan. One (1), 750,000L Jet-A was considered in the 2013 Work Plan Marginal Cost Summary. No additional Jet-A tanks were captured in the 2014 Marginal Closure and Reclamation Security Estimate or previous estimates. Therefore, an additional \$29,172 is estimated to be required in the 2014 Marginal Closure and Reclamation Security Estimate to account for the two (2) 750,000 L Jet-A fuel tanks not previously considered. This is based on the reclamation of a 750,000L fuel tank costing \$14,586 (including indirect costs of 10% for contingency and 5% for engineering). See Note 2 for more detail on cost calculation.	estimated to be required to account for the two (2) 750,000 L Jet-A fuel tanks not previously considered.

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No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)	AANDC COMMENT ON RESPONSE
8	Clarification of the Concordance Issue - It is understood that the work plan is divided into ERP, Type B, and Type A activities but as reviewers and enforcers of the water licences, it would be helpful if the ERP and Type B sections were further divided into activities that are approved vs those that are pending approval. So rather than having to focus a part of our review trying to distinguish between the two, we can concentrate more fully on our review of the estimate itself and more importantly it would be clear that Baffinland can show that they have a plan to carry out each activity. It needs to be clear what activities in the work plan are licenced and what revisions and approvals may be necessary in order to carry out all of the activities in the work plan. So in this way, a concordance table would be very helpful to show all this information. For an example of how a concordance could clarify how Baffinland plans to conduct their activities in the work plan, please refer to Table 1 below for some examples of activities where clarification would be appreciated. As stated yesterday, we are requesting a concordance table listing all the activities and cross-referencing them to a licence (Type A or Type B), where they are referenced in the cost estimate (Type A, Type B, ERP), and whether they are already approved, and if so whether a revised plan or other documentation is required (i.e. updated management plans, etc.), or whether the activity is pending approval.    Activity   Reference / Type A   Pending approval   Pending	As requested a concordance table is found in Table 4-1 below. It is recognised that all of the activities in the 2014 Work Plan have yet to receive regulatory approval as some activities are pending approval of an amendment of Project Certificate #005 by the Minister. However, the bulk of the 2014 Work Plan is approved under the existing Project Certificate as well as the Type A and Type B Water Licences.  Table 4-1 below describes which sections of the 2014 Work Plan correspond to which approval. All of the activities within that heading fall under the licence stated except 'Section 2.2 Construction Activities associated with the Early Revenue Phase'. Here the construction of the Ore Dock, Stockpile at Milne Port and the associated settling ponds are activities that are pending approval of the revised Project Certificate, however the dredging activities are already licenced under the Type A Licence (Part F, number 4b), requiring only an update to the Waste Management Plan. The drawings for these construction activities will be provided to the NWB upon approval of the amended Project Certificate.  The cost associated with the Early Revenue Phase activities, as differentiated in Section 2.10 of the 2014 Work Plan, will require an update to the Securities posted for 2014 of an estimated amount of \$279,000.	Clarification accepted.

No	AANDC ISSUE (December 6, 2013)	BIMC RESPONSE (December 13, 2013)  Table 4-1: Concordance Table of 2014 Work Plan Activities				AANDC COMMENT ON RESPONSE
		Activity per Section	Page number	Licence Scope	Approved / Pending approval	
		Section 2.2 Infrastructure and Construction Works	Pg. 6-9	A mix of Type A, pending ERP approval and Type B. Broken down below	Various	
		Section 2.2 Milne Inlet	Pg. 6-7	Within Scope of Type A	Approved	
		Section 2.2 Tote Road	Pg. 7	Within Scope of Type A	Approved	
		Section 2.2 Mine Site	Pg. 7-8	Within Scope of Type A	Approved	
		Section 2.2 Construction Activities associated with the Early Revenue Phase	Pg. 8-9	Pending approval of ERP (will fall within Type A)	Pending approval	
		Section 2.3 Infrastructure Layout at end of 2014	Pg. 9	Within Scope of Type A and including ERP	Type A approved, ERP activities pending approval (As per activities described in Section 2.2 above)	
		Section 2.4 Mining, Quarrying and Exploration Activities Part i Exploration Activity and drilling plan	Pg. 9-10	Within Scope of Type B	Approved/pending renewal	
		Section 2.4 Mining, Quarrying and	Pg. 10-11	Within Scope of Type A	Approved	
		Exploration Activities				
		Part ii An estimate of the amount and type of ore and waste to be mined in each month,				
		Section 2.4 Mining, Quarrying and Exploration Activities  Part III. An estimate of the amount	Pg. 11	Within Scope of Type A	Approved	
		and type of ore to be shipped each month,				
		Section 2.4 Mining, Quarrying and Exploration Activities  Part iv. Expected quarterly quantities				
		to be quarried of each Specified Substance including sand, gravel and construction stone, where possible, estimated by individual quarry site or borrow location;"	Pg. 11	Within Scope of Type A	Approved	
		Section 2.5 Solid Waste Disposal	Pg. 12	Within Scope of Type A	Approved	
		Section 2.6 Specified Substances	Pg. 12	Within Scope of Type A	Approved – none contemplated at this time	
		Section 2.7 Water Use	Pg. 13	Within Scope of Type A	Approved	
		Section 2.8 Materials Shipped out	Pg. 14-15	Within Scope of Type A	Approved	
		Section 2.9 Materials Shipped in	Pg. 16-18	Within Scope of Type A	Approved	
		Section 2.10 Closure and Reclamation Costs	Pg. 18	A mix of Type A, pending ERP approval and Type B.	Both	
		Section 2.11 Option Exercise Notices	Pg. 19	Associated with QIA lease	N/A	
		Section 2.12 Lease Schedule Updates	Pg. 19	Associated with QIA lease	N/A	
		Section 2.13 Lease Amendment Provisions	Pg. 19	Associated with QIA lease	N/A	